

Cheat Sheet PG(3, 16)

January 16, 2021

The projective space PG(3, 16)

$$q = 16$$

$$p = 2$$

$$e = 4$$

$$n = 3$$

$$\text{Number of points} = 4369$$

$$\text{Number of lines} = 70161$$

$$\text{Number of lines on a point} = 273$$

$$\text{Number of points on a line} = 17$$

The points of PG(3, 16)

PG(3, 16) has 4369 points:

$$P_0 = (1, 0, 0, 0) = (\alpha^{11}, 1, 0, 0)$$

$$P_1 = (0, 1, 0, 0) = (\alpha^8, 1, 0, 0)$$

$$P_2 = (0, 0, 1, 0) = (\alpha^6, 1, 0, 0)$$

$$P_3 = (0, 0, 0, 1) = (1, 0, 1, 0)$$

$$P_4 = (1, 1, 1, 1) = (\alpha, 0, 1, 0)$$

$$P_5 = (1, 1, 0, 0) = (\alpha^{12}, 0, 1, 0)$$

$$P_6 = (2, 1, 0, 0) = (\alpha^2, 0, 1, 0)$$

$$P_7 = (3, 1, 0, 0) = (\alpha^9, 0, 1, 0)$$

$$P_8 = (4, 1, 0, 0) = (\alpha^{13}, 0, 1, 0)$$

$$P_9 = (5, 1, 0, 0) = (\alpha^7, 0, 1, 0)$$

$$P_{10} = (6, 1, 0, 0) = (\alpha^3, 0, 1, 0)$$

$$P_{11} = (7, 1, 0, 0) = (\alpha^4, 0, 1, 0)$$

$$P_{12} = (8, 1, 0, 0) = (\alpha^{10}, 0, 1, 0)$$

$$P_{13} = (9, 1, 0, 0) = (\alpha^5, 0, 1, 0)$$

$$P_{14} = (10, 1, 0, 0) = (\alpha^{14}, 0, 1, 0)$$

$$P_{15} = (11, 1, 0, 0) = (\alpha^8, 0, 1, 0)$$

$$P_{16} = (12, 1, 0, 0) = (\alpha^6, 0, 1, 0)$$

$$P_{17} = (13, 1, 0, 0) = (\alpha^7, 0, 1, 0)$$

$$P_{18} = (14, 1, 0, 0) = (\alpha^9, 0, 1, 0)$$

$$P_{19} = (15, 1, 0, 0) = (\alpha^{13}, 0, 1, 0)$$

$$P_{20} = (1, 0, 1, 0) = (\alpha^4, 0, 1, 0)$$

$$P_{21} = (2, 0, 1, 0) = (\alpha^{10}, 0, 1, 0)$$

$$P_{22} = (3, 0, 1, 0) = (\alpha^5, 0, 1, 0)$$

$$P_{23} = (4, 0, 1, 0) = (\alpha^{14}, 0, 1, 0)$$

$$P_{24} = (5, 0, 1, 0) = (\alpha^8, 0, 1, 0)$$

$$P_{25} = (6, 0, 1, 0) = (\alpha^6, 0, 1, 0)$$

$$P_{26} = (7, 0, 1, 0) = (\alpha^7, 0, 1, 0)$$

$$P_{27} = (8, 0, 1, 0) = (\alpha^9, 0, 1, 0)$$

$$P_{28} = (9, 0, 1, 0) = (\alpha^{13}, 0, 1, 0)$$

$$P_{29} = (10, 0, 1, 0) = (\alpha^4, 0, 1, 0)$$

$$P_{30} = (11, 0, 1, 0) = (\alpha^{10}, 0, 1, 0)$$

$$P_{31} = (12, 0, 1, 0) = (\alpha^5, 0, 1, 0)$$

$$P_{32} = (13, 0, 1, 0) = (\alpha^{14}, 0, 1, 0)$$

$$P_{33} = (14, 0, 1, 0) = (\alpha^8, 0, 1, 0)$$

$$\begin{aligned}
P_{34} &= (15, 0, 1, 0) = (\alpha^6, 0, 1, 0) \\
P_{35} &= (0, 1, 1, 0) = (0, 1, 1, 0) \\
P_{36} &= (1, 1, 1, 0) = (1, 1, 1, 0) \\
P_{37} &= (2, 1, 1, 0) = (\alpha, 1, 1, 0) \\
P_{38} &= (3, 1, 1, 0) = (\alpha^{12}, 1, 1, 0) \\
P_{39} &= (4, 1, 1, 0) = (\alpha^2, 1, 1, 0) \\
P_{40} &= (5, 1, 1, 0) = (\alpha^9, 1, 1, 0) \\
P_{41} &= (6, 1, 1, 0) = (\alpha^{13}, 1, 1, 0) \\
P_{42} &= (7, 1, 1, 0) = (\alpha^7, 1, 1, 0) \\
P_{43} &= (8, 1, 1, 0) = (\alpha^3, 1, 1, 0) \\
P_{44} &= (9, 1, 1, 0) = (\alpha^4, 1, 1, 0) \\
P_{45} &= (10, 1, 1, 0) = (\alpha^{10}, 1, 1, 0) \\
P_{46} &= (11, 1, 1, 0) = (\alpha^5, 1, 1, 0) \\
P_{47} &= (12, 1, 1, 0) = (\alpha^{14}, 1, 1, 0) \\
P_{48} &= (13, 1, 1, 0) = (\alpha^{11}, 1, 1, 0) \\
P_{49} &= (14, 1, 1, 0) = (\alpha^8, 1, 1, 0) \\
P_{50} &= (15, 1, 1, 0) = (\alpha^6, 1, 1, 0) \\
P_{51} &= (0, 2, 1, 0) = (0, \alpha, 1, 0) \\
P_{52} &= (1, 2, 1, 0) = (1, \alpha, 1, 0) \\
P_{53} &= (2, 2, 1, 0) = (\alpha, \alpha, 1, 0) \\
P_{54} &= (3, 2, 1, 0) = (\alpha^{12}, \alpha, 1, 0) \\
P_{55} &= (4, 2, 1, 0) = (\alpha^2, \alpha, 1, 0) \\
P_{56} &= (5, 2, 1, 0) = (\alpha^9, \alpha, 1, 0) \\
P_{57} &= (6, 2, 1, 0) = (\alpha^{13}, \alpha, 1, 0) \\
P_{58} &= (7, 2, 1, 0) = (\alpha^7, \alpha, 1, 0) \\
P_{59} &= (8, 2, 1, 0) = (\alpha^3, \alpha, 1, 0) \\
P_{60} &= (9, 2, 1, 0) = (\alpha^4, \alpha, 1, 0) \\
P_{61} &= (10, 2, 1, 0) = (\alpha^{10}, \alpha, 1, 0) \\
P_{62} &= (11, 2, 1, 0) = (\alpha^5, \alpha, 1, 0) \\
P_{63} &= (12, 2, 1, 0) = (\alpha^{14}, \alpha, 1, 0) \\
P_{64} &= (13, 2, 1, 0) = (\alpha^{11}, \alpha, 1, 0) \\
P_{65} &= (14, 2, 1, 0) = (\alpha^8, \alpha, 1, 0) \\
P_{66} &= (15, 2, 1, 0) = (\alpha^6, \alpha, 1, 0) \\
P_{67} &= (0, 3, 1, 0) = (0, \alpha^{12}, 1, 0) \\
P_{68} &= (1, 3, 1, 0) = (1, \alpha^{12}, 1, 0) \\
P_{69} &= (2, 3, 1, 0) = (\alpha, \alpha^{12}, 1, 0) \\
P_{70} &= (3, 3, 1, 0) = (\alpha^{12}, \alpha^{12}, 1, 0) \\
P_{71} &= (4, 3, 1, 0) = (\alpha^2, \alpha^{12}, 1, 0) \\
P_{72} &= (5, 3, 1, 0) = (\alpha^9, \alpha^{12}, 1, 0) \\
P_{73} &= (6, 3, 1, 0) = (\alpha^{13}, \alpha^{12}, 1, 0) \\
P_{74} &= (7, 3, 1, 0) = (\alpha^7, \alpha^{12}, 1, 0) \\
P_{75} &= (8, 3, 1, 0) = (\alpha^3, \alpha^{12}, 1, 0) \\
P_{76} &= (9, 3, 1, 0) = (\alpha^4, \alpha^{12}, 1, 0) \\
P_{77} &= (10, 3, 1, 0) = (\alpha^{10}, \alpha^{12}, 1, 0) \\
P_{78} &= (11, 3, 1, 0) = (\alpha^5, \alpha^{12}, 1, 0)
\end{aligned}$$

$$\begin{aligned}
P_{79} &= (12, 3, 1, 0) = (\alpha^{14}, \alpha^{12}, 1, 0) \\
P_{80} &= (13, 3, 1, 0) = (\alpha^{11}, \alpha^{12}, 1, 0) \\
P_{81} &= (14, 3, 1, 0) = (\alpha^8, \alpha^{12}, 1, 0) \\
P_{82} &= (15, 3, 1, 0) = (\alpha^6, \alpha^{12}, 1, 0) \\
P_{83} &= (0, 4, 1, 0) = (0, \alpha^2, 1, 0) \\
P_{84} &= (1, 4, 1, 0) = (1, \alpha^2, 1, 0) \\
P_{85} &= (2, 4, 1, 0) = (\alpha, \alpha^2, 1, 0) \\
P_{86} &= (3, 4, 1, 0) = (\alpha^{12}, \alpha^2, 1, 0) \\
P_{87} &= (4, 4, 1, 0) = (\alpha^2, \alpha^2, 1, 0) \\
P_{88} &= (5, 4, 1, 0) = (\alpha^9, \alpha^2, 1, 0) \\
P_{89} &= (6, 4, 1, 0) = (\alpha^{13}, \alpha^2, 1, 0) \\
P_{90} &= (7, 4, 1, 0) = (\alpha^7, \alpha^2, 1, 0) \\
P_{91} &= (8, 4, 1, 0) = (\alpha^3, \alpha^2, 1, 0) \\
P_{92} &= (9, 4, 1, 0) = (\alpha^4, \alpha^2, 1, 0) \\
P_{93} &= (10, 4, 1, 0) = (\alpha^{10}, \alpha^2, 1, 0) \\
P_{94} &= (11, 4, 1, 0) = (\alpha^5, \alpha^2, 1, 0) \\
P_{95} &= (12, 4, 1, 0) = (\alpha^{14}, \alpha^2, 1, 0) \\
P_{96} &= (13, 4, 1, 0) = (\alpha^{11}, \alpha^2, 1, 0) \\
P_{97} &= (14, 4, 1, 0) = (\alpha^8, \alpha^2, 1, 0) \\
P_{98} &= (15, 4, 1, 0) = (\alpha^6, \alpha^2, 1, 0) \\
P_{99} &= (0, 5, 1, 0) = (0, \alpha^9, 1, 0) \\
P_{100} &= (1, 5, 1, 0) = (1, \alpha^9, 1, 0) \\
P_{101} &= (2, 5, 1, 0) = (\alpha, \alpha^9, 1, 0) \\
P_{102} &= (3, 5, 1, 0) = (\alpha^{12}, \alpha^9, 1, 0) \\
P_{103} &= (4, 5, 1, 0) = (\alpha^2, \alpha^9, 1, 0) \\
P_{104} &= (5, 5, 1, 0) = (\alpha^9, \alpha^9, 1, 0) \\
P_{105} &= (6, 5, 1, 0) = (\alpha^{13}, \alpha^9, 1, 0) \\
P_{106} &= (7, 5, 1, 0) = (\alpha^7, \alpha^9, 1, 0) \\
P_{107} &= (8, 5, 1, 0) = (\alpha^3, \alpha^9, 1, 0) \\
P_{108} &= (9, 5, 1, 0) = (\alpha^4, \alpha^9, 1, 0) \\
P_{109} &= (10, 5, 1, 0) = (\alpha^{10}, \alpha^9, 1, 0) \\
P_{110} &= (11, 5, 1, 0) = (\alpha^5, \alpha^9, 1, 0) \\
P_{111} &= (12, 5, 1, 0) = (\alpha^{14}, \alpha^9, 1, 0) \\
P_{112} &= (13, 5, 1, 0) = (\alpha^{11}, \alpha^9, 1, 0) \\
P_{113} &= (14, 5, 1, 0) = (\alpha^8, \alpha^9, 1, 0) \\
P_{114} &= (15, 5, 1, 0) = (\alpha^6, \alpha^9, 1, 0) \\
P_{115} &= (0, 6, 1, 0) = (0, \alpha^{13}, 1, 0) \\
P_{116} &= (1, 6, 1, 0) = (1, \alpha^{13}, 1, 0) \\
P_{117} &= (2, 6, 1, 0) = (\alpha, \alpha^{13}, 1, 0) \\
P_{118} &= (3, 6, 1, 0) = (\alpha^{12}, \alpha^{13}, 1, 0) \\
P_{119} &= (4, 6, 1, 0) = (\alpha^2, \alpha^{13}, 1, 0) \\
P_{120} &= (5, 6, 1, 0) = (\alpha^9, \alpha^{13}, 1, 0) \\
P_{121} &= (6, 6, 1, 0) = (\alpha^{13}, \alpha^{13}, 1, 0) \\
P_{122} &= (7, 6, 1, 0) = (\alpha^7, \alpha^{13}, 1, 0) \\
P_{123} &= (8, 6, 1, 0) = (\alpha^3, \alpha^{13}, 1, 0)
\end{aligned}$$

$$\begin{aligned}
P_{124} &= (9, 6, 1, 0) = (\alpha^4, \alpha^{13}, 1, 0) \\
P_{125} &= (10, 6, 1, 0) = (\alpha^{10}, \alpha^{13}, 1, 0) \\
P_{126} &= (11, 6, 1, 0) = (\alpha^5, \alpha^{13}, 1, 0) \\
P_{127} &= (12, 6, 1, 0) = (\alpha^{14}, \alpha^{13}, 1, 0) \\
P_{128} &= (13, 6, 1, 0) = (\alpha^{11}, \alpha^{13}, 1, 0) \\
P_{129} &= (14, 6, 1, 0) = (\alpha^8, \alpha^{13}, 1, 0) \\
P_{130} &= (15, 6, 1, 0) = (\alpha^6, \alpha^{13}, 1, 0) \\
P_{131} &= (0, 7, 1, 0) = (0, \alpha^7, 1, 0) \\
P_{132} &= (1, 7, 1, 0) = (1, \alpha^7, 1, 0) \\
P_{133} &= (2, 7, 1, 0) = (\alpha, \alpha^7, 1, 0) \\
P_{134} &= (3, 7, 1, 0) = (\alpha^{12}, \alpha^7, 1, 0) \\
P_{135} &= (4, 7, 1, 0) = (\alpha^2, \alpha^7, 1, 0) \\
P_{136} &= (5, 7, 1, 0) = (\alpha^9, \alpha^7, 1, 0) \\
P_{137} &= (6, 7, 1, 0) = (\alpha^{13}, \alpha^7, 1, 0) \\
P_{138} &= (7, 7, 1, 0) = (\alpha^7, \alpha^7, 1, 0) \\
P_{139} &= (8, 7, 1, 0) = (\alpha^3, \alpha^7, 1, 0) \\
P_{140} &= (9, 7, 1, 0) = (\alpha^4, \alpha^7, 1, 0) \\
P_{141} &= (10, 7, 1, 0) = (\alpha^{10}, \alpha^7, 1, 0) \\
P_{142} &= (11, 7, 1, 0) = (\alpha^5, \alpha^7, 1, 0) \\
P_{143} &= (12, 7, 1, 0) = (\alpha^{14}, \alpha^7, 1, 0) \\
P_{144} &= (13, 7, 1, 0) = (\alpha^{11}, \alpha^7, 1, 0) \\
P_{145} &= (14, 7, 1, 0) = (\alpha^8, \alpha^7, 1, 0) \\
P_{146} &= (15, 7, 1, 0) = (\alpha^6, \alpha^7, 1, 0) \\
P_{147} &= (0, 8, 1, 0) = (0, \alpha^3, 1, 0) \\
P_{148} &= (1, 8, 1, 0) = (1, \alpha^3, 1, 0) \\
P_{149} &= (2, 8, 1, 0) = (\alpha, \alpha^3, 1, 0) \\
P_{150} &= (3, 8, 1, 0) = (\alpha^{12}, \alpha^3, 1, 0) \\
P_{151} &= (4, 8, 1, 0) = (\alpha^2, \alpha^3, 1, 0) \\
P_{152} &= (5, 8, 1, 0) = (\alpha^9, \alpha^3, 1, 0) \\
P_{153} &= (6, 8, 1, 0) = (\alpha^{13}, \alpha^3, 1, 0) \\
P_{154} &= (7, 8, 1, 0) = (\alpha^7, \alpha^3, 1, 0) \\
P_{155} &= (8, 8, 1, 0) = (\alpha^3, \alpha^3, 1, 0) \\
P_{156} &= (9, 8, 1, 0) = (\alpha^4, \alpha^3, 1, 0) \\
P_{157} &= (10, 8, 1, 0) = (\alpha^{10}, \alpha^3, 1, 0) \\
P_{158} &= (11, 8, 1, 0) = (\alpha^5, \alpha^3, 1, 0) \\
P_{159} &= (12, 8, 1, 0) = (\alpha^{14}, \alpha^3, 1, 0) \\
P_{160} &= (13, 8, 1, 0) = (\alpha^{11}, \alpha^3, 1, 0) \\
P_{161} &= (14, 8, 1, 0) = (\alpha^8, \alpha^3, 1, 0) \\
P_{162} &= (15, 8, 1, 0) = (\alpha^6, \alpha^3, 1, 0) \\
P_{163} &= (0, 9, 1, 0) = (0, \alpha^4, 1, 0) \\
P_{164} &= (1, 9, 1, 0) = (1, \alpha^4, 1, 0) \\
P_{165} &= (2, 9, 1, 0) = (\alpha, \alpha^4, 1, 0) \\
P_{166} &= (3, 9, 1, 0) = (\alpha^{12}, \alpha^4, 1, 0) \\
P_{167} &= (4, 9, 1, 0) = (\alpha^2, \alpha^4, 1, 0) \\
P_{168} &= (5, 9, 1, 0) = (\alpha^9, \alpha^4, 1, 0)
\end{aligned}$$

$$\begin{aligned}
P_{169} &= (6, 9, 1, 0) = (\alpha^{13}, \alpha^4, 1, 0) \\
P_{170} &= (7, 9, 1, 0) = (\alpha^7, \alpha^4, 1, 0) \\
P_{171} &= (8, 9, 1, 0) = (\alpha^3, \alpha^4, 1, 0) \\
P_{172} &= (9, 9, 1, 0) = (\alpha^4, \alpha^4, 1, 0) \\
P_{173} &= (10, 9, 1, 0) = (\alpha^{10}, \alpha^4, 1, 0) \\
P_{174} &= (11, 9, 1, 0) = (\alpha^5, \alpha^4, 1, 0) \\
P_{175} &= (12, 9, 1, 0) = (\alpha^{14}, \alpha^4, 1, 0) \\
P_{176} &= (13, 9, 1, 0) = (\alpha^{11}, \alpha^4, 1, 0) \\
P_{177} &= (14, 9, 1, 0) = (\alpha^8, \alpha^4, 1, 0) \\
P_{178} &= (15, 9, 1, 0) = (\alpha^6, \alpha^4, 1, 0) \\
P_{179} &= (0, 10, 1, 0) = (0, \alpha^{10}, 1, 0) \\
P_{180} &= (1, 10, 1, 0) = (1, \alpha^{10}, 1, 0) \\
P_{181} &= (2, 10, 1, 0) = (\alpha, \alpha^{10}, 1, 0) \\
P_{182} &= (3, 10, 1, 0) = (\alpha^{12}, \alpha^{10}, 1, 0) \\
P_{183} &= (4, 10, 1, 0) = (\alpha^2, \alpha^{10}, 1, 0) \\
P_{184} &= (5, 10, 1, 0) = (\alpha^9, \alpha^{10}, 1, 0) \\
P_{185} &= (6, 10, 1, 0) = (\alpha^{13}, \alpha^{10}, 1, 0) \\
P_{186} &= (7, 10, 1, 0) = (\alpha^7, \alpha^{10}, 1, 0) \\
P_{187} &= (8, 10, 1, 0) = (\alpha^3, \alpha^{10}, 1, 0) \\
P_{188} &= (9, 10, 1, 0) = (\alpha^4, \alpha^{10}, 1, 0) \\
P_{189} &= (10, 10, 1, 0) = (\alpha^{10}, \alpha^{10}, 1, 0) \\
P_{190} &= (11, 10, 1, 0) = (\alpha^5, \alpha^{10}, 1, 0) \\
P_{191} &= (12, 10, 1, 0) = (\alpha^{14}, \alpha^{10}, 1, 0) \\
P_{192} &= (13, 10, 1, 0) = (\alpha^{11}, \alpha^{10}, 1, 0) \\
P_{193} &= (14, 10, 1, 0) = (\alpha^8, \alpha^{10}, 1, 0) \\
P_{194} &= (15, 10, 1, 0) = (\alpha^6, \alpha^{10}, 1, 0) \\
P_{195} &= (0, 11, 1, 0) = (0, \alpha^5, 1, 0) \\
P_{196} &= (1, 11, 1, 0) = (1, \alpha^5, 1, 0) \\
P_{197} &= (2, 11, 1, 0) = (\alpha, \alpha^5, 1, 0) \\
P_{198} &= (3, 11, 1, 0) = (\alpha^{12}, \alpha^5, 1, 0) \\
P_{199} &= (4, 11, 1, 0) = (\alpha^2, \alpha^5, 1, 0) \\
P_{200} &= (5, 11, 1, 0) = (\alpha^9, \alpha^5, 1, 0) \\
P_{201} &= (6, 11, 1, 0) = (\alpha^{13}, \alpha^5, 1, 0) \\
P_{202} &= (7, 11, 1, 0) = (\alpha^7, \alpha^5, 1, 0) \\
P_{203} &= (8, 11, 1, 0) = (\alpha^3, \alpha^5, 1, 0) \\
P_{204} &= (9, 11, 1, 0) = (\alpha^4, \alpha^5, 1, 0) \\
P_{205} &= (10, 11, 1, 0) = (\alpha^{10}, \alpha^5, 1, 0) \\
P_{206} &= (11, 11, 1, 0) = (\alpha^5, \alpha^5, 1, 0) \\
P_{207} &= (12, 11, 1, 0) = (\alpha^{14}, \alpha^5, 1, 0) \\
P_{208} &= (13, 11, 1, 0) = (\alpha^{11}, \alpha^5, 1, 0) \\
P_{209} &= (14, 11, 1, 0) = (\alpha^8, \alpha^5, 1, 0) \\
P_{210} &= (15, 11, 1, 0) = (\alpha^6, \alpha^5, 1, 0) \\
P_{211} &= (0, 12, 1, 0) = (0, \alpha^{14}, 1, 0) \\
P_{212} &= (1, 12, 1, 0) = (1, \alpha^{14}, 1, 0) \\
P_{213} &= (2, 12, 1, 0) = (\alpha, \alpha^{14}, 1, 0)
\end{aligned}$$

$$\begin{aligned}
P_{214} &= (3, 12, 1, 0) = (\alpha^{12}, \alpha^{14}, 1, 0) \\
P_{215} &= (4, 12, 1, 0) = (\alpha^2, \alpha^{14}, 1, 0) \\
P_{216} &= (5, 12, 1, 0) = (\alpha^9, \alpha^{14}, 1, 0) \\
P_{217} &= (6, 12, 1, 0) = (\alpha^{13}, \alpha^{14}, 1, 0) \\
P_{218} &= (7, 12, 1, 0) = (\alpha^7, \alpha^{14}, 1, 0) \\
P_{219} &= (8, 12, 1, 0) = (\alpha^3, \alpha^{14}, 1, 0) \\
P_{220} &= (9, 12, 1, 0) = (\alpha^4, \alpha^{14}, 1, 0) \\
P_{221} &= (10, 12, 1, 0) = (\alpha^{10}, \alpha^{14}, 1, 0) \\
P_{222} &= (11, 12, 1, 0) = (\alpha^5, \alpha^{14}, 1, 0) \\
P_{223} &= (12, 12, 1, 0) = (\alpha^{14}, \alpha^{14}, 1, 0) \\
P_{224} &= (13, 12, 1, 0) = (\alpha^{11}, \alpha^{14}, 1, 0) \\
P_{225} &= (14, 12, 1, 0) = (\alpha^8, \alpha^{14}, 1, 0) \\
P_{226} &= (15, 12, 1, 0) = (\alpha^6, \alpha^{14}, 1, 0) \\
P_{227} &= (0, 13, 1, 0) = (0, \alpha^{11}, 1, 0) \\
P_{228} &= (1, 13, 1, 0) = (1, \alpha^{11}, 1, 0) \\
P_{229} &= (2, 13, 1, 0) = (\alpha, \alpha^{11}, 1, 0) \\
P_{230} &= (3, 13, 1, 0) = (\alpha^{12}, \alpha^{11}, 1, 0) \\
P_{231} &= (4, 13, 1, 0) = (\alpha^2, \alpha^{11}, 1, 0) \\
P_{232} &= (5, 13, 1, 0) = (\alpha^9, \alpha^{11}, 1, 0) \\
P_{233} &= (6, 13, 1, 0) = (\alpha^{13}, \alpha^{11}, 1, 0) \\
P_{234} &= (7, 13, 1, 0) = (\alpha^7, \alpha^{11}, 1, 0) \\
P_{235} &= (8, 13, 1, 0) = (\alpha^3, \alpha^{11}, 1, 0) \\
P_{236} &= (9, 13, 1, 0) = (\alpha^4, \alpha^{11}, 1, 0) \\
P_{237} &= (10, 13, 1, 0) = (\alpha^{10}, \alpha^{11}, 1, 0) \\
P_{238} &= (11, 13, 1, 0) = (\alpha^5, \alpha^{11}, 1, 0) \\
P_{239} &= (12, 13, 1, 0) = (\alpha^{14}, \alpha^{11}, 1, 0) \\
P_{240} &= (13, 13, 1, 0) = (\alpha^{11}, \alpha^{11}, 1, 0) \\
P_{241} &= (14, 13, 1, 0) = (\alpha^8, \alpha^{11}, 1, 0) \\
P_{242} &= (15, 13, 1, 0) = (\alpha^6, \alpha^{11}, 1, 0) \\
P_{243} &= (0, 14, 1, 0) = (0, \alpha^8, 1, 0) \\
P_{244} &= (1, 14, 1, 0) = (1, \alpha^8, 1, 0) \\
P_{245} &= (2, 14, 1, 0) = (\alpha, \alpha^8, 1, 0) \\
P_{246} &= (3, 14, 1, 0) = (\alpha^{12}, \alpha^8, 1, 0) \\
P_{247} &= (4, 14, 1, 0) = (\alpha^2, \alpha^8, 1, 0) \\
P_{248} &= (5, 14, 1, 0) = (\alpha^9, \alpha^8, 1, 0) \\
P_{249} &= (6, 14, 1, 0) = (\alpha^{13}, \alpha^8, 1, 0) \\
P_{250} &= (7, 14, 1, 0) = (\alpha^7, \alpha^8, 1, 0) \\
P_{251} &= (8, 14, 1, 0) = (\alpha^3, \alpha^8, 1, 0) \\
P_{252} &= (9, 14, 1, 0) = (\alpha^4, \alpha^8, 1, 0) \\
P_{253} &= (10, 14, 1, 0) = (\alpha^{10}, \alpha^8, 1, 0) \\
P_{254} &= (11, 14, 1, 0) = (\alpha^5, \alpha^8, 1, 0) \\
P_{255} &= (12, 14, 1, 0) = (\alpha^{14}, \alpha^8, 1, 0) \\
P_{256} &= (13, 14, 1, 0) = (\alpha^{11}, \alpha^8, 1, 0) \\
P_{257} &= (14, 14, 1, 0) = (\alpha^8, \alpha^8, 1, 0) \\
P_{258} &= (15, 14, 1, 0) = (\alpha^6, \alpha^8, 1, 0)
\end{aligned}$$

$$\begin{aligned}
P_{259} &= (0, 15, 1, 0) = (0, \alpha^6, 1, 0) \\
P_{260} &= (1, 15, 1, 0) = (1, \alpha^6, 1, 0) \\
P_{261} &= (2, 15, 1, 0) = (\alpha, \alpha^6, 1, 0) \\
P_{262} &= (3, 15, 1, 0) = (\alpha^{12}, \alpha^6, 1, 0) \\
P_{263} &= (4, 15, 1, 0) = (\alpha^2, \alpha^6, 1, 0) \\
P_{264} &= (5, 15, 1, 0) = (\alpha^9, \alpha^6, 1, 0) \\
P_{265} &= (6, 15, 1, 0) = (\alpha^{13}, \alpha^6, 1, 0) \\
P_{266} &= (7, 15, 1, 0) = (\alpha^7, \alpha^6, 1, 0) \\
P_{267} &= (8, 15, 1, 0) = (\alpha^3, \alpha^6, 1, 0) \\
P_{268} &= (9, 15, 1, 0) = (\alpha^4, \alpha^6, 1, 0) \\
P_{269} &= (10, 15, 1, 0) = (\alpha^{10}, \alpha^6, 1, 0) \\
P_{270} &= (11, 15, 1, 0) = (\alpha^5, \alpha^6, 1, 0) \\
P_{271} &= (12, 15, 1, 0) = (\alpha^{14}, \alpha^6, 1, 0) \\
P_{272} &= (13, 15, 1, 0) = (\alpha^{11}, \alpha^6, 1, 0) \\
P_{273} &= (14, 15, 1, 0) = (\alpha^8, \alpha^6, 1, 0) \\
P_{274} &= (15, 15, 1, 0) = (\alpha^6, \alpha^6, 1, 0) \\
P_{275} &= (1, 0, 0, 1) = (1, 0, 0, 1) \\
P_{276} &= (2, 0, 0, 1) = (\alpha, 0, 0, 1) \\
P_{277} &= (3, 0, 0, 1) = (\alpha^{12}, 0, 0, 1) \\
P_{278} &= (4, 0, 0, 1) = (\alpha^2, 0, 0, 1) \\
P_{279} &= (5, 0, 0, 1) = (\alpha^9, 0, 0, 1) \\
P_{280} &= (6, 0, 0, 1) = (\alpha^{13}, 0, 0, 1) \\
P_{281} &= (7, 0, 0, 1) = (\alpha^7, 0, 0, 1) \\
P_{282} &= (8, 0, 0, 1) = (\alpha^3, 0, 0, 1) \\
P_{283} &= (9, 0, 0, 1) = (\alpha^4, 0, 0, 1) \\
P_{284} &= (10, 0, 0, 1) = (\alpha^{10}, 0, 0, 1) \\
P_{285} &= (11, 0, 0, 1) = (\alpha^5, 0, 0, 1) \\
P_{286} &= (12, 0, 0, 1) = (\alpha^{14}, 0, 0, 1) \\
P_{287} &= (13, 0, 0, 1) = (\alpha^{11}, 0, 0, 1) \\
P_{288} &= (14, 0, 0, 1) = (\alpha^8, 0, 0, 1) \\
P_{289} &= (15, 0, 0, 1) = (\alpha^6, 0, 0, 1) \\
P_{290} &= (0, 1, 0, 1) = (0, 1, 0, 1) \\
P_{291} &= (1, 1, 0, 1) = (1, 1, 0, 1) \\
P_{292} &= (2, 1, 0, 1) = (\alpha, 1, 0, 1) \\
P_{293} &= (3, 1, 0, 1) = (\alpha^{12}, 1, 0, 1) \\
P_{294} &= (4, 1, 0, 1) = (\alpha^2, 1, 0, 1) \\
P_{295} &= (5, 1, 0, 1) = (\alpha^9, 1, 0, 1) \\
P_{296} &= (6, 1, 0, 1) = (\alpha^{13}, 1, 0, 1) \\
P_{297} &= (7, 1, 0, 1) = (\alpha^7, 1, 0, 1) \\
P_{298} &= (8, 1, 0, 1) = (\alpha^3, 1, 0, 1) \\
P_{299} &= (9, 1, 0, 1) = (\alpha^4, 1, 0, 1) \\
P_{300} &= (10, 1, 0, 1) = (\alpha^{10}, 1, 0, 1) \\
P_{301} &= (11, 1, 0, 1) = (\alpha^5, 1, 0, 1) \\
P_{302} &= (12, 1, 0, 1) = (\alpha^{14}, 1, 0, 1) \\
P_{303} &= (13, 1, 0, 1) = (\alpha^{11}, 1, 0, 1)
\end{aligned}$$

$$\begin{aligned}
P_{304} &= (14, 1, 0, 1) = (\alpha^8, 1, 0, 1) \\
P_{305} &= (15, 1, 0, 1) = (\alpha^6, 1, 0, 1) \\
P_{306} &= (0, 2, 0, 1) = (0, \alpha, 0, 1) \\
P_{307} &= (1, 2, 0, 1) = (1, \alpha, 0, 1) \\
P_{308} &= (2, 2, 0, 1) = (\alpha, \alpha, 0, 1) \\
P_{309} &= (3, 2, 0, 1) = (\alpha^{12}, \alpha, 0, 1) \\
P_{310} &= (4, 2, 0, 1) = (\alpha^2, \alpha, 0, 1) \\
P_{311} &= (5, 2, 0, 1) = (\alpha^9, \alpha, 0, 1) \\
P_{312} &= (6, 2, 0, 1) = (\alpha^{13}, \alpha, 0, 1) \\
P_{313} &= (7, 2, 0, 1) = (\alpha^7, \alpha, 0, 1) \\
P_{314} &= (8, 2, 0, 1) = (\alpha^3, \alpha, 0, 1) \\
P_{315} &= (9, 2, 0, 1) = (\alpha^4, \alpha, 0, 1) \\
P_{316} &= (10, 2, 0, 1) = (\alpha^{10}, \alpha, 0, 1) \\
P_{317} &= (11, 2, 0, 1) = (\alpha^5, \alpha, 0, 1) \\
P_{318} &= (12, 2, 0, 1) = (\alpha^{14}, \alpha, 0, 1) \\
P_{319} &= (13, 2, 0, 1) = (\alpha^{11}, \alpha, 0, 1) \\
P_{320} &= (14, 2, 0, 1) = (\alpha^8, \alpha, 0, 1) \\
P_{321} &= (15, 2, 0, 1) = (\alpha^6, \alpha, 0, 1) \\
P_{322} &= (0, 3, 0, 1) = (0, \alpha^{12}, 0, 1) \\
P_{323} &= (1, 3, 0, 1) = (1, \alpha^{12}, 0, 1) \\
P_{324} &= (2, 3, 0, 1) = (\alpha, \alpha^{12}, 0, 1) \\
P_{325} &= (3, 3, 0, 1) = (\alpha^{12}, \alpha^{12}, 0, 1) \\
P_{326} &= (4, 3, 0, 1) = (\alpha^2, \alpha^{12}, 0, 1) \\
P_{327} &= (5, 3, 0, 1) = (\alpha^9, \alpha^{12}, 0, 1) \\
P_{328} &= (6, 3, 0, 1) = (\alpha^{13}, \alpha^{12}, 0, 1) \\
P_{329} &= (7, 3, 0, 1) = (\alpha^7, \alpha^{12}, 0, 1) \\
P_{330} &= (8, 3, 0, 1) = (\alpha^3, \alpha^{12}, 0, 1) \\
P_{331} &= (9, 3, 0, 1) = (\alpha^4, \alpha^{12}, 0, 1) \\
P_{332} &= (10, 3, 0, 1) = (\alpha^{10}, \alpha^{12}, 0, 1) \\
P_{333} &= (11, 3, 0, 1) = (\alpha^5, \alpha^{12}, 0, 1) \\
P_{334} &= (12, 3, 0, 1) = (\alpha^{14}, \alpha^{12}, 0, 1) \\
P_{335} &= (13, 3, 0, 1) = (\alpha^{11}, \alpha^{12}, 0, 1) \\
P_{336} &= (14, 3, 0, 1) = (\alpha^8, \alpha^{12}, 0, 1) \\
P_{337} &= (15, 3, 0, 1) = (\alpha^6, \alpha^{12}, 0, 1) \\
P_{338} &= (0, 4, 0, 1) = (0, \alpha^2, 0, 1) \\
P_{339} &= (1, 4, 0, 1) = (1, \alpha^2, 0, 1) \\
P_{340} &= (2, 4, 0, 1) = (\alpha, \alpha^2, 0, 1) \\
P_{341} &= (3, 4, 0, 1) = (\alpha^{12}, \alpha^2, 0, 1) \\
P_{342} &= (4, 4, 0, 1) = (\alpha^2, \alpha^2, 0, 1) \\
P_{343} &= (5, 4, 0, 1) = (\alpha^9, \alpha^2, 0, 1) \\
P_{344} &= (6, 4, 0, 1) = (\alpha^{13}, \alpha^2, 0, 1) \\
P_{345} &= (7, 4, 0, 1) = (\alpha^7, \alpha^2, 0, 1) \\
P_{346} &= (8, 4, 0, 1) = (\alpha^3, \alpha^2, 0, 1) \\
P_{347} &= (9, 4, 0, 1) = (\alpha^4, \alpha^2, 0, 1) \\
P_{348} &= (10, 4, 0, 1) = (\alpha^{10}, \alpha^2, 0, 1)
\end{aligned}$$

$$\begin{aligned}
P_{349} &= (11, 4, 0, 1) = (\alpha^5, \alpha^2, 0, 1) \\
P_{350} &= (12, 4, 0, 1) = (\alpha^{14}, \alpha^2, 0, 1) \\
P_{351} &= (13, 4, 0, 1) = (\alpha^{11}, \alpha^2, 0, 1) \\
P_{352} &= (14, 4, 0, 1) = (\alpha^8, \alpha^2, 0, 1) \\
P_{353} &= (15, 4, 0, 1) = (\alpha^6, \alpha^2, 0, 1) \\
P_{354} &= (0, 5, 0, 1) = (0, \alpha^9, 0, 1) \\
P_{355} &= (1, 5, 0, 1) = (1, \alpha^9, 0, 1) \\
P_{356} &= (2, 5, 0, 1) = (\alpha, \alpha^9, 0, 1) \\
P_{357} &= (3, 5, 0, 1) = (\alpha^{12}, \alpha^9, 0, 1) \\
P_{358} &= (4, 5, 0, 1) = (\alpha^2, \alpha^9, 0, 1) \\
P_{359} &= (5, 5, 0, 1) = (\alpha^9, \alpha^9, 0, 1) \\
P_{360} &= (6, 5, 0, 1) = (\alpha^{13}, \alpha^9, 0, 1) \\
P_{361} &= (7, 5, 0, 1) = (\alpha^7, \alpha^9, 0, 1) \\
P_{362} &= (8, 5, 0, 1) = (\alpha^3, \alpha^9, 0, 1) \\
P_{363} &= (9, 5, 0, 1) = (\alpha^4, \alpha^9, 0, 1) \\
P_{364} &= (10, 5, 0, 1) = (\alpha^{10}, \alpha^9, 0, 1) \\
P_{365} &= (11, 5, 0, 1) = (\alpha^5, \alpha^9, 0, 1) \\
P_{366} &= (12, 5, 0, 1) = (\alpha^{14}, \alpha^9, 0, 1) \\
P_{367} &= (13, 5, 0, 1) = (\alpha^{11}, \alpha^9, 0, 1) \\
P_{368} &= (14, 5, 0, 1) = (\alpha^8, \alpha^9, 0, 1) \\
P_{369} &= (15, 5, 0, 1) = (\alpha^6, \alpha^9, 0, 1) \\
P_{370} &= (0, 6, 0, 1) = (0, \alpha^{13}, 0, 1) \\
P_{371} &= (1, 6, 0, 1) = (1, \alpha^{13}, 0, 1) \\
P_{372} &= (2, 6, 0, 1) = (\alpha, \alpha^{13}, 0, 1) \\
P_{373} &= (3, 6, 0, 1) = (\alpha^{12}, \alpha^{13}, 0, 1) \\
P_{374} &= (4, 6, 0, 1) = (\alpha^2, \alpha^{13}, 0, 1) \\
P_{375} &= (5, 6, 0, 1) = (\alpha^9, \alpha^{13}, 0, 1) \\
P_{376} &= (6, 6, 0, 1) = (\alpha^{13}, \alpha^{13}, 0, 1) \\
P_{377} &= (7, 6, 0, 1) = (\alpha^7, \alpha^{13}, 0, 1) \\
P_{378} &= (8, 6, 0, 1) = (\alpha^3, \alpha^{13}, 0, 1) \\
P_{379} &= (9, 6, 0, 1) = (\alpha^4, \alpha^{13}, 0, 1) \\
P_{380} &= (10, 6, 0, 1) = (\alpha^{10}, \alpha^{13}, 0, 1) \\
P_{381} &= (11, 6, 0, 1) = (\alpha^5, \alpha^{13}, 0, 1) \\
P_{382} &= (12, 6, 0, 1) = (\alpha^{14}, \alpha^{13}, 0, 1) \\
P_{383} &= (13, 6, 0, 1) = (\alpha^{11}, \alpha^{13}, 0, 1) \\
P_{384} &= (14, 6, 0, 1) = (\alpha^8, \alpha^{13}, 0, 1) \\
P_{385} &= (15, 6, 0, 1) = (\alpha^6, \alpha^{13}, 0, 1) \\
P_{386} &= (0, 7, 0, 1) = (0, \alpha^7, 0, 1) \\
P_{387} &= (1, 7, 0, 1) = (1, \alpha^7, 0, 1) \\
P_{388} &= (2, 7, 0, 1) = (\alpha, \alpha^7, 0, 1) \\
P_{389} &= (3, 7, 0, 1) = (\alpha^{12}, \alpha^7, 0, 1) \\
P_{390} &= (4, 7, 0, 1) = (\alpha^2, \alpha^7, 0, 1) \\
P_{391} &= (5, 7, 0, 1) = (\alpha^9, \alpha^7, 0, 1) \\
P_{392} &= (6, 7, 0, 1) = (\alpha^{13}, \alpha^7, 0, 1) \\
P_{393} &= (7, 7, 0, 1) = (\alpha^7, \alpha^7, 0, 1)
\end{aligned}$$

$$\begin{aligned}
P_{394} &= (8, 7, 0, 1) = (\alpha^3, \alpha^7, 0, 1) \\
P_{395} &= (9, 7, 0, 1) = (\alpha^4, \alpha^7, 0, 1) \\
P_{396} &= (10, 7, 0, 1) = (\alpha^{10}, \alpha^7, 0, 1) \\
P_{397} &= (11, 7, 0, 1) = (\alpha^5, \alpha^7, 0, 1) \\
P_{398} &= (12, 7, 0, 1) = (\alpha^{14}, \alpha^7, 0, 1) \\
P_{399} &= (13, 7, 0, 1) = (\alpha^{11}, \alpha^7, 0, 1) \\
P_{400} &= (14, 7, 0, 1) = (\alpha^8, \alpha^7, 0, 1) \\
P_{401} &= (15, 7, 0, 1) = (\alpha^6, \alpha^7, 0, 1) \\
P_{402} &= (0, 8, 0, 1) = (0, \alpha^3, 0, 1) \\
P_{403} &= (1, 8, 0, 1) = (1, \alpha^3, 0, 1) \\
P_{404} &= (2, 8, 0, 1) = (\alpha, \alpha^3, 0, 1) \\
P_{405} &= (3, 8, 0, 1) = (\alpha^{12}, \alpha^3, 0, 1) \\
P_{406} &= (4, 8, 0, 1) = (\alpha^2, \alpha^3, 0, 1) \\
P_{407} &= (5, 8, 0, 1) = (\alpha^9, \alpha^3, 0, 1) \\
P_{408} &= (6, 8, 0, 1) = (\alpha^{13}, \alpha^3, 0, 1) \\
P_{409} &= (7, 8, 0, 1) = (\alpha^7, \alpha^3, 0, 1) \\
P_{410} &= (8, 8, 0, 1) = (\alpha^3, \alpha^3, 0, 1) \\
P_{411} &= (9, 8, 0, 1) = (\alpha^4, \alpha^3, 0, 1) \\
P_{412} &= (10, 8, 0, 1) = (\alpha^{10}, \alpha^3, 0, 1) \\
P_{413} &= (11, 8, 0, 1) = (\alpha^5, \alpha^3, 0, 1) \\
P_{414} &= (12, 8, 0, 1) = (\alpha^{14}, \alpha^3, 0, 1) \\
P_{415} &= (13, 8, 0, 1) = (\alpha^{11}, \alpha^3, 0, 1) \\
P_{416} &= (14, 8, 0, 1) = (\alpha^8, \alpha^3, 0, 1) \\
P_{417} &= (15, 8, 0, 1) = (\alpha^6, \alpha^3, 0, 1) \\
P_{418} &= (0, 9, 0, 1) = (0, \alpha^4, 0, 1) \\
P_{419} &= (1, 9, 0, 1) = (1, \alpha^4, 0, 1) \\
P_{420} &= (2, 9, 0, 1) = (\alpha, \alpha^4, 0, 1) \\
P_{421} &= (3, 9, 0, 1) = (\alpha^{12}, \alpha^4, 0, 1) \\
P_{422} &= (4, 9, 0, 1) = (\alpha^2, \alpha^4, 0, 1) \\
P_{423} &= (5, 9, 0, 1) = (\alpha^9, \alpha^4, 0, 1) \\
P_{424} &= (6, 9, 0, 1) = (\alpha^{13}, \alpha^4, 0, 1) \\
P_{425} &= (7, 9, 0, 1) = (\alpha^7, \alpha^4, 0, 1) \\
P_{426} &= (8, 9, 0, 1) = (\alpha^3, \alpha^4, 0, 1) \\
P_{427} &= (9, 9, 0, 1) = (\alpha^4, \alpha^4, 0, 1) \\
P_{428} &= (10, 9, 0, 1) = (\alpha^{10}, \alpha^4, 0, 1) \\
P_{429} &= (11, 9, 0, 1) = (\alpha^5, \alpha^4, 0, 1) \\
P_{430} &= (12, 9, 0, 1) = (\alpha^{14}, \alpha^4, 0, 1) \\
P_{431} &= (13, 9, 0, 1) = (\alpha^{11}, \alpha^4, 0, 1) \\
P_{432} &= (14, 9, 0, 1) = (\alpha^8, \alpha^4, 0, 1) \\
P_{433} &= (15, 9, 0, 1) = (\alpha^6, \alpha^4, 0, 1) \\
P_{434} &= (0, 10, 0, 1) = (0, \alpha^{10}, 0, 1) \\
P_{435} &= (1, 10, 0, 1) = (1, \alpha^{10}, 0, 1) \\
P_{436} &= (2, 10, 0, 1) = (\alpha, \alpha^{10}, 0, 1) \\
P_{437} &= (3, 10, 0, 1) = (\alpha^{12}, \alpha^{10}, 0, 1) \\
P_{438} &= (4, 10, 0, 1) = (\alpha^2, \alpha^{10}, 0, 1)
\end{aligned}$$

$$\begin{aligned}
P_{439} &= (5, 10, 0, 1) = (\alpha^9, \alpha^{10}, 0, 1) \\
P_{440} &= (6, 10, 0, 1) = (\alpha^{13}, \alpha^{10}, 0, 1) \\
P_{441} &= (7, 10, 0, 1) = (\alpha^7, \alpha^{10}, 0, 1) \\
P_{442} &= (8, 10, 0, 1) = (\alpha^3, \alpha^{10}, 0, 1) \\
P_{443} &= (9, 10, 0, 1) = (\alpha^4, \alpha^{10}, 0, 1) \\
P_{444} &= (10, 10, 0, 1) = (\alpha^{10}, \alpha^{10}, 0, 1) \\
P_{445} &= (11, 10, 0, 1) = (\alpha^5, \alpha^{10}, 0, 1) \\
P_{446} &= (12, 10, 0, 1) = (\alpha^{14}, \alpha^{10}, 0, 1) \\
P_{447} &= (13, 10, 0, 1) = (\alpha^{11}, \alpha^{10}, 0, 1) \\
P_{448} &= (14, 10, 0, 1) = (\alpha^8, \alpha^{10}, 0, 1) \\
P_{449} &= (15, 10, 0, 1) = (\alpha^6, \alpha^{10}, 0, 1) \\
P_{450} &= (0, 11, 0, 1) = (0, \alpha^5, 0, 1) \\
P_{451} &= (1, 11, 0, 1) = (1, \alpha^5, 0, 1) \\
P_{452} &= (2, 11, 0, 1) = (\alpha, \alpha^5, 0, 1) \\
P_{453} &= (3, 11, 0, 1) = (\alpha^{12}, \alpha^5, 0, 1) \\
P_{454} &= (4, 11, 0, 1) = (\alpha^2, \alpha^5, 0, 1) \\
P_{455} &= (5, 11, 0, 1) = (\alpha^9, \alpha^5, 0, 1) \\
P_{456} &= (6, 11, 0, 1) = (\alpha^{13}, \alpha^5, 0, 1) \\
P_{457} &= (7, 11, 0, 1) = (\alpha^7, \alpha^5, 0, 1) \\
P_{458} &= (8, 11, 0, 1) = (\alpha^3, \alpha^5, 0, 1) \\
P_{459} &= (9, 11, 0, 1) = (\alpha^4, \alpha^5, 0, 1) \\
P_{460} &= (10, 11, 0, 1) = (\alpha^{10}, \alpha^5, 0, 1) \\
P_{461} &= (11, 11, 0, 1) = (\alpha^5, \alpha^5, 0, 1) \\
P_{462} &= (12, 11, 0, 1) = (\alpha^{14}, \alpha^5, 0, 1) \\
P_{463} &= (13, 11, 0, 1) = (\alpha^{11}, \alpha^5, 0, 1) \\
P_{464} &= (14, 11, 0, 1) = (\alpha^8, \alpha^5, 0, 1) \\
P_{465} &= (15, 11, 0, 1) = (\alpha^6, \alpha^5, 0, 1) \\
P_{466} &= (0, 12, 0, 1) = (0, \alpha^{14}, 0, 1) \\
P_{467} &= (1, 12, 0, 1) = (1, \alpha^{14}, 0, 1) \\
P_{468} &= (2, 12, 0, 1) = (\alpha, \alpha^{14}, 0, 1) \\
P_{469} &= (3, 12, 0, 1) = (\alpha^{12}, \alpha^{14}, 0, 1) \\
P_{470} &= (4, 12, 0, 1) = (\alpha^2, \alpha^{14}, 0, 1) \\
P_{471} &= (5, 12, 0, 1) = (\alpha^9, \alpha^{14}, 0, 1) \\
P_{472} &= (6, 12, 0, 1) = (\alpha^{13}, \alpha^{14}, 0, 1) \\
P_{473} &= (7, 12, 0, 1) = (\alpha^7, \alpha^{14}, 0, 1) \\
P_{474} &= (8, 12, 0, 1) = (\alpha^3, \alpha^{14}, 0, 1) \\
P_{475} &= (9, 12, 0, 1) = (\alpha^4, \alpha^{14}, 0, 1) \\
P_{476} &= (10, 12, 0, 1) = (\alpha^{10}, \alpha^{14}, 0, 1) \\
P_{477} &= (11, 12, 0, 1) = (\alpha^5, \alpha^{14}, 0, 1) \\
P_{478} &= (12, 12, 0, 1) = (\alpha^{14}, \alpha^{14}, 0, 1) \\
P_{479} &= (13, 12, 0, 1) = (\alpha^{11}, \alpha^{14}, 0, 1) \\
P_{480} &= (14, 12, 0, 1) = (\alpha^8, \alpha^{14}, 0, 1) \\
P_{481} &= (15, 12, 0, 1) = (\alpha^6, \alpha^{14}, 0, 1) \\
P_{482} &= (0, 13, 0, 1) = (0, \alpha^{11}, 0, 1) \\
P_{483} &= (1, 13, 0, 1) = (1, \alpha^{11}, 0, 1)
\end{aligned}$$

$$\begin{aligned}
P_{484} &= (2, 13, 0, 1) = (\alpha, \alpha^{11}, 0, 1) \\
P_{485} &= (3, 13, 0, 1) = (\alpha^{12}, \alpha^{11}, 0, 1) \\
P_{486} &= (4, 13, 0, 1) = (\alpha^2, \alpha^{11}, 0, 1) \\
P_{487} &= (5, 13, 0, 1) = (\alpha^9, \alpha^{11}, 0, 1) \\
P_{488} &= (6, 13, 0, 1) = (\alpha^{13}, \alpha^{11}, 0, 1) \\
P_{489} &= (7, 13, 0, 1) = (\alpha^7, \alpha^{11}, 0, 1) \\
P_{490} &= (8, 13, 0, 1) = (\alpha^3, \alpha^{11}, 0, 1) \\
P_{491} &= (9, 13, 0, 1) = (\alpha^4, \alpha^{11}, 0, 1) \\
P_{492} &= (10, 13, 0, 1) = (\alpha^{10}, \alpha^{11}, 0, 1) \\
P_{493} &= (11, 13, 0, 1) = (\alpha^5, \alpha^{11}, 0, 1) \\
P_{494} &= (12, 13, 0, 1) = (\alpha^{14}, \alpha^{11}, 0, 1) \\
P_{495} &= (13, 13, 0, 1) = (\alpha^{11}, \alpha^{11}, 0, 1) \\
P_{496} &= (14, 13, 0, 1) = (\alpha^8, \alpha^{11}, 0, 1) \\
P_{497} &= (15, 13, 0, 1) = (\alpha^6, \alpha^{11}, 0, 1) \\
P_{498} &= (0, 14, 0, 1) = (0, \alpha^8, 0, 1) \\
P_{499} &= (1, 14, 0, 1) = (1, \alpha^8, 0, 1) \\
P_{500} &= (2, 14, 0, 1) = (\alpha, \alpha^8, 0, 1) \\
P_{501} &= (3, 14, 0, 1) = (\alpha^{12}, \alpha^8, 0, 1) \\
P_{502} &= (4, 14, 0, 1) = (\alpha^2, \alpha^8, 0, 1) \\
P_{503} &= (5, 14, 0, 1) = (\alpha^9, \alpha^8, 0, 1) \\
P_{504} &= (6, 14, 0, 1) = (\alpha^{13}, \alpha^8, 0, 1) \\
P_{505} &= (7, 14, 0, 1) = (\alpha^7, \alpha^8, 0, 1) \\
P_{506} &= (8, 14, 0, 1) = (\alpha^3, \alpha^8, 0, 1) \\
P_{507} &= (9, 14, 0, 1) = (\alpha^4, \alpha^8, 0, 1) \\
P_{508} &= (10, 14, 0, 1) = (\alpha^{10}, \alpha^8, 0, 1) \\
P_{509} &= (11, 14, 0, 1) = (\alpha^5, \alpha^8, 0, 1) \\
P_{510} &= (12, 14, 0, 1) = (\alpha^{14}, \alpha^8, 0, 1) \\
P_{511} &= (13, 14, 0, 1) = (\alpha^{11}, \alpha^8, 0, 1) \\
P_{512} &= (14, 14, 0, 1) = (\alpha^8, \alpha^8, 0, 1) \\
P_{513} &= (15, 14, 0, 1) = (\alpha^6, \alpha^8, 0, 1) \\
P_{514} &= (0, 15, 0, 1) = (0, \alpha^6, 0, 1) \\
P_{515} &= (1, 15, 0, 1) = (1, \alpha^6, 0, 1) \\
P_{516} &= (2, 15, 0, 1) = (\alpha, \alpha^6, 0, 1) \\
P_{517} &= (3, 15, 0, 1) = (\alpha^{12}, \alpha^6, 0, 1) \\
P_{518} &= (4, 15, 0, 1) = (\alpha^2, \alpha^6, 0, 1) \\
P_{519} &= (5, 15, 0, 1) = (\alpha^9, \alpha^6, 0, 1) \\
P_{520} &= (6, 15, 0, 1) = (\alpha^{13}, \alpha^6, 0, 1) \\
P_{521} &= (7, 15, 0, 1) = (\alpha^7, \alpha^6, 0, 1) \\
P_{522} &= (8, 15, 0, 1) = (\alpha^3, \alpha^6, 0, 1) \\
P_{523} &= (9, 15, 0, 1) = (\alpha^4, \alpha^6, 0, 1) \\
P_{524} &= (10, 15, 0, 1) = (\alpha^{10}, \alpha^6, 0, 1) \\
P_{525} &= (11, 15, 0, 1) = (\alpha^5, \alpha^6, 0, 1) \\
P_{526} &= (12, 15, 0, 1) = (\alpha^{14}, \alpha^6, 0, 1) \\
P_{527} &= (13, 15, 0, 1) = (\alpha^{11}, \alpha^6, 0, 1) \\
P_{528} &= (14, 15, 0, 1) = (\alpha^8, \alpha^6, 0, 1)
\end{aligned}$$

$$\begin{aligned}
P_{529} &= (15, 15, 0, 1) = (\alpha^6, \alpha^6, 0, 1) \\
P_{530} &= (0, 0, 1, 1) = (0, 0, 1, 1) \\
P_{531} &= (1, 0, 1, 1) = (1, 0, 1, 1) \\
P_{532} &= (2, 0, 1, 1) = (\alpha, 0, 1, 1) \\
P_{533} &= (3, 0, 1, 1) = (\alpha^{12}, 0, 1, 1) \\
P_{534} &= (4, 0, 1, 1) = (\alpha^2, 0, 1, 1) \\
P_{535} &= (5, 0, 1, 1) = (\alpha^9, 0, 1, 1) \\
P_{536} &= (6, 0, 1, 1) = (\alpha^{13}, 0, 1, 1) \\
P_{537} &= (7, 0, 1, 1) = (\alpha^7, 0, 1, 1) \\
P_{538} &= (8, 0, 1, 1) = (\alpha^3, 0, 1, 1) \\
P_{539} &= (9, 0, 1, 1) = (\alpha^4, 0, 1, 1) \\
P_{540} &= (10, 0, 1, 1) = (\alpha^{10}, 0, 1, 1) \\
P_{541} &= (11, 0, 1, 1) = (\alpha^5, 0, 1, 1) \\
P_{542} &= (12, 0, 1, 1) = (\alpha^{14}, 0, 1, 1) \\
P_{543} &= (13, 0, 1, 1) = (\alpha^{11}, 0, 1, 1) \\
P_{544} &= (14, 0, 1, 1) = (\alpha^8, 0, 1, 1) \\
P_{545} &= (15, 0, 1, 1) = (\alpha^6, 0, 1, 1) \\
P_{546} &= (0, 1, 1, 1) = (0, 1, 1, 1) \\
P_{547} &= (2, 1, 1, 1) = (\alpha, 1, 1, 1) \\
P_{548} &= (3, 1, 1, 1) = (\alpha^{12}, 1, 1, 1) \\
P_{549} &= (4, 1, 1, 1) = (\alpha^2, 1, 1, 1) \\
P_{550} &= (5, 1, 1, 1) = (\alpha^9, 1, 1, 1) \\
P_{551} &= (6, 1, 1, 1) = (\alpha^{13}, 1, 1, 1) \\
P_{552} &= (7, 1, 1, 1) = (\alpha^7, 1, 1, 1) \\
P_{553} &= (8, 1, 1, 1) = (\alpha^3, 1, 1, 1) \\
P_{554} &= (9, 1, 1, 1) = (\alpha^4, 1, 1, 1) \\
P_{555} &= (10, 1, 1, 1) = (\alpha^{10}, 1, 1, 1) \\
P_{556} &= (11, 1, 1, 1) = (\alpha^5, 1, 1, 1) \\
P_{557} &= (12, 1, 1, 1) = (\alpha^{14}, 1, 1, 1) \\
P_{558} &= (13, 1, 1, 1) = (\alpha^{11}, 1, 1, 1) \\
P_{559} &= (14, 1, 1, 1) = (\alpha^8, 1, 1, 1) \\
P_{560} &= (15, 1, 1, 1) = (\alpha^6, 1, 1, 1) \\
P_{561} &= (0, 2, 1, 1) = (0, \alpha, 1, 1) \\
P_{562} &= (1, 2, 1, 1) = (1, \alpha, 1, 1) \\
P_{563} &= (2, 2, 1, 1) = (\alpha, \alpha, 1, 1) \\
P_{564} &= (3, 2, 1, 1) = (\alpha^{12}, \alpha, 1, 1) \\
P_{565} &= (4, 2, 1, 1) = (\alpha^2, \alpha, 1, 1) \\
P_{566} &= (5, 2, 1, 1) = (\alpha^9, \alpha, 1, 1) \\
P_{567} &= (6, 2, 1, 1) = (\alpha^{13}, \alpha, 1, 1) \\
P_{568} &= (7, 2, 1, 1) = (\alpha^7, \alpha, 1, 1) \\
P_{569} &= (8, 2, 1, 1) = (\alpha^3, \alpha, 1, 1) \\
P_{570} &= (9, 2, 1, 1) = (\alpha^4, \alpha, 1, 1) \\
P_{571} &= (10, 2, 1, 1) = (\alpha^{10}, \alpha, 1, 1) \\
P_{572} &= (11, 2, 1, 1) = (\alpha^5, \alpha, 1, 1) \\
P_{573} &= (12, 2, 1, 1) = (\alpha^{14}, \alpha, 1, 1)
\end{aligned}$$

$$\begin{aligned}
P_{574} &= (13, 2, 1, 1) = (\alpha^{11}, \alpha, 1, 1) \\
P_{575} &= (14, 2, 1, 1) = (\alpha^8, \alpha, 1, 1) \\
P_{576} &= (15, 2, 1, 1) = (\alpha^6, \alpha, 1, 1) \\
P_{577} &= (0, 3, 1, 1) = (0, \alpha^{12}, 1, 1) \\
P_{578} &= (1, 3, 1, 1) = (1, \alpha^{12}, 1, 1) \\
P_{579} &= (2, 3, 1, 1) = (\alpha, \alpha^{12}, 1, 1) \\
P_{580} &= (3, 3, 1, 1) = (\alpha^{12}, \alpha^{12}, 1, 1) \\
P_{581} &= (4, 3, 1, 1) = (\alpha^2, \alpha^{12}, 1, 1) \\
P_{582} &= (5, 3, 1, 1) = (\alpha^9, \alpha^{12}, 1, 1) \\
P_{583} &= (6, 3, 1, 1) = (\alpha^{13}, \alpha^{12}, 1, 1) \\
P_{584} &= (7, 3, 1, 1) = (\alpha^7, \alpha^{12}, 1, 1) \\
P_{585} &= (8, 3, 1, 1) = (\alpha^3, \alpha^{12}, 1, 1) \\
P_{586} &= (9, 3, 1, 1) = (\alpha^4, \alpha^{12}, 1, 1) \\
P_{587} &= (10, 3, 1, 1) = (\alpha^{10}, \alpha^{12}, 1, 1) \\
P_{588} &= (11, 3, 1, 1) = (\alpha^5, \alpha^{12}, 1, 1) \\
P_{589} &= (12, 3, 1, 1) = (\alpha^{14}, \alpha^{12}, 1, 1) \\
P_{590} &= (13, 3, 1, 1) = (\alpha^{11}, \alpha^{12}, 1, 1) \\
P_{591} &= (14, 3, 1, 1) = (\alpha^8, \alpha^{12}, 1, 1) \\
P_{592} &= (15, 3, 1, 1) = (\alpha^6, \alpha^{12}, 1, 1) \\
P_{593} &= (0, 4, 1, 1) = (0, \alpha^2, 1, 1) \\
P_{594} &= (1, 4, 1, 1) = (1, \alpha^2, 1, 1) \\
P_{595} &= (2, 4, 1, 1) = (\alpha, \alpha^2, 1, 1) \\
P_{596} &= (3, 4, 1, 1) = (\alpha^{12}, \alpha^2, 1, 1) \\
P_{597} &= (4, 4, 1, 1) = (\alpha^2, \alpha^2, 1, 1) \\
P_{598} &= (5, 4, 1, 1) = (\alpha^9, \alpha^2, 1, 1) \\
P_{599} &= (6, 4, 1, 1) = (\alpha^{13}, \alpha^2, 1, 1) \\
P_{600} &= (7, 4, 1, 1) = (\alpha^7, \alpha^2, 1, 1) \\
P_{601} &= (8, 4, 1, 1) = (\alpha^3, \alpha^2, 1, 1) \\
P_{602} &= (9, 4, 1, 1) = (\alpha^4, \alpha^2, 1, 1) \\
P_{603} &= (10, 4, 1, 1) = (\alpha^{10}, \alpha^2, 1, 1) \\
P_{604} &= (11, 4, 1, 1) = (\alpha^5, \alpha^2, 1, 1) \\
P_{605} &= (12, 4, 1, 1) = (\alpha^{14}, \alpha^2, 1, 1) \\
P_{606} &= (13, 4, 1, 1) = (\alpha^{11}, \alpha^2, 1, 1) \\
P_{607} &= (14, 4, 1, 1) = (\alpha^8, \alpha^2, 1, 1) \\
P_{608} &= (15, 4, 1, 1) = (\alpha^6, \alpha^2, 1, 1) \\
P_{609} &= (0, 5, 1, 1) = (0, \alpha^9, 1, 1) \\
P_{610} &= (1, 5, 1, 1) = (1, \alpha^9, 1, 1) \\
P_{611} &= (2, 5, 1, 1) = (\alpha, \alpha^9, 1, 1) \\
P_{612} &= (3, 5, 1, 1) = (\alpha^{12}, \alpha^9, 1, 1) \\
P_{613} &= (4, 5, 1, 1) = (\alpha^2, \alpha^9, 1, 1) \\
P_{614} &= (5, 5, 1, 1) = (\alpha^9, \alpha^9, 1, 1) \\
P_{615} &= (6, 5, 1, 1) = (\alpha^{13}, \alpha^9, 1, 1) \\
P_{616} &= (7, 5, 1, 1) = (\alpha^7, \alpha^9, 1, 1) \\
P_{617} &= (8, 5, 1, 1) = (\alpha^3, \alpha^9, 1, 1) \\
P_{618} &= (9, 5, 1, 1) = (\alpha^4, \alpha^9, 1, 1)
\end{aligned}$$

$$\begin{aligned}
P_{619} &= (10, 5, 1, 1) = (\alpha^{10}, \alpha^9, 1, 1) \\
P_{620} &= (11, 5, 1, 1) = (\alpha^5, \alpha^9, 1, 1) \\
P_{621} &= (12, 5, 1, 1) = (\alpha^{14}, \alpha^9, 1, 1) \\
P_{622} &= (13, 5, 1, 1) = (\alpha^{11}, \alpha^9, 1, 1) \\
P_{623} &= (14, 5, 1, 1) = (\alpha^8, \alpha^9, 1, 1) \\
P_{624} &= (15, 5, 1, 1) = (\alpha^6, \alpha^9, 1, 1) \\
P_{625} &= (0, 6, 1, 1) = (0, \alpha^{13}, 1, 1) \\
P_{626} &= (1, 6, 1, 1) = (1, \alpha^{13}, 1, 1) \\
P_{627} &= (2, 6, 1, 1) = (\alpha, \alpha^{13}, 1, 1) \\
P_{628} &= (3, 6, 1, 1) = (\alpha^{12}, \alpha^{13}, 1, 1) \\
P_{629} &= (4, 6, 1, 1) = (\alpha^2, \alpha^{13}, 1, 1) \\
P_{630} &= (5, 6, 1, 1) = (\alpha^9, \alpha^{13}, 1, 1) \\
P_{631} &= (6, 6, 1, 1) = (\alpha^{13}, \alpha^{13}, 1, 1) \\
P_{632} &= (7, 6, 1, 1) = (\alpha^7, \alpha^{13}, 1, 1) \\
P_{633} &= (8, 6, 1, 1) = (\alpha^3, \alpha^{13}, 1, 1) \\
P_{634} &= (9, 6, 1, 1) = (\alpha^4, \alpha^{13}, 1, 1) \\
P_{635} &= (10, 6, 1, 1) = (\alpha^{10}, \alpha^{13}, 1, 1) \\
P_{636} &= (11, 6, 1, 1) = (\alpha^5, \alpha^{13}, 1, 1) \\
P_{637} &= (12, 6, 1, 1) = (\alpha^{14}, \alpha^{13}, 1, 1) \\
P_{638} &= (13, 6, 1, 1) = (\alpha^{11}, \alpha^{13}, 1, 1) \\
P_{639} &= (14, 6, 1, 1) = (\alpha^8, \alpha^{13}, 1, 1) \\
P_{640} &= (15, 6, 1, 1) = (\alpha^6, \alpha^{13}, 1, 1) \\
P_{641} &= (0, 7, 1, 1) = (0, \alpha^7, 1, 1) \\
P_{642} &= (1, 7, 1, 1) = (1, \alpha^7, 1, 1) \\
P_{643} &= (2, 7, 1, 1) = (\alpha, \alpha^7, 1, 1) \\
P_{644} &= (3, 7, 1, 1) = (\alpha^{12}, \alpha^7, 1, 1) \\
P_{645} &= (4, 7, 1, 1) = (\alpha^2, \alpha^7, 1, 1) \\
P_{646} &= (5, 7, 1, 1) = (\alpha^9, \alpha^7, 1, 1) \\
P_{647} &= (6, 7, 1, 1) = (\alpha^{13}, \alpha^7, 1, 1) \\
P_{648} &= (7, 7, 1, 1) = (\alpha^7, \alpha^7, 1, 1) \\
P_{649} &= (8, 7, 1, 1) = (\alpha^3, \alpha^7, 1, 1) \\
P_{650} &= (9, 7, 1, 1) = (\alpha^4, \alpha^7, 1, 1) \\
P_{651} &= (10, 7, 1, 1) = (\alpha^{10}, \alpha^7, 1, 1) \\
P_{652} &= (11, 7, 1, 1) = (\alpha^5, \alpha^7, 1, 1) \\
P_{653} &= (12, 7, 1, 1) = (\alpha^{14}, \alpha^7, 1, 1) \\
P_{654} &= (13, 7, 1, 1) = (\alpha^{11}, \alpha^7, 1, 1) \\
P_{655} &= (14, 7, 1, 1) = (\alpha^8, \alpha^7, 1, 1) \\
P_{656} &= (15, 7, 1, 1) = (\alpha^6, \alpha^7, 1, 1) \\
P_{657} &= (0, 8, 1, 1) = (0, \alpha^3, 1, 1) \\
P_{658} &= (1, 8, 1, 1) = (1, \alpha^3, 1, 1) \\
P_{659} &= (2, 8, 1, 1) = (\alpha, \alpha^3, 1, 1) \\
P_{660} &= (3, 8, 1, 1) = (\alpha^{12}, \alpha^3, 1, 1) \\
P_{661} &= (4, 8, 1, 1) = (\alpha^2, \alpha^3, 1, 1) \\
P_{662} &= (5, 8, 1, 1) = (\alpha^9, \alpha^3, 1, 1) \\
P_{663} &= (6, 8, 1, 1) = (\alpha^{13}, \alpha^3, 1, 1)
\end{aligned}$$

$$\begin{aligned}
P_{664} &= (7, 8, 1, 1) = (\alpha^7, \alpha^3, 1, 1) \\
P_{665} &= (8, 8, 1, 1) = (\alpha^3, \alpha^3, 1, 1) \\
P_{666} &= (9, 8, 1, 1) = (\alpha^4, \alpha^3, 1, 1) \\
P_{667} &= (10, 8, 1, 1) = (\alpha^{10}, \alpha^3, 1, 1) \\
P_{668} &= (11, 8, 1, 1) = (\alpha^5, \alpha^3, 1, 1) \\
P_{669} &= (12, 8, 1, 1) = (\alpha^{14}, \alpha^3, 1, 1) \\
P_{670} &= (13, 8, 1, 1) = (\alpha^{11}, \alpha^3, 1, 1) \\
P_{671} &= (14, 8, 1, 1) = (\alpha^8, \alpha^3, 1, 1) \\
P_{672} &= (15, 8, 1, 1) = (\alpha^6, \alpha^3, 1, 1) \\
P_{673} &= (0, 9, 1, 1) = (0, \alpha^4, 1, 1) \\
P_{674} &= (1, 9, 1, 1) = (1, \alpha^4, 1, 1) \\
P_{675} &= (2, 9, 1, 1) = (\alpha, \alpha^4, 1, 1) \\
P_{676} &= (3, 9, 1, 1) = (\alpha^{12}, \alpha^4, 1, 1) \\
P_{677} &= (4, 9, 1, 1) = (\alpha^2, \alpha^4, 1, 1) \\
P_{678} &= (5, 9, 1, 1) = (\alpha^9, \alpha^4, 1, 1) \\
P_{679} &= (6, 9, 1, 1) = (\alpha^{13}, \alpha^4, 1, 1) \\
P_{680} &= (7, 9, 1, 1) = (\alpha^7, \alpha^4, 1, 1) \\
P_{681} &= (8, 9, 1, 1) = (\alpha^3, \alpha^4, 1, 1) \\
P_{682} &= (9, 9, 1, 1) = (\alpha^4, \alpha^4, 1, 1) \\
P_{683} &= (10, 9, 1, 1) = (\alpha^{10}, \alpha^4, 1, 1) \\
P_{684} &= (11, 9, 1, 1) = (\alpha^5, \alpha^4, 1, 1) \\
P_{685} &= (12, 9, 1, 1) = (\alpha^{14}, \alpha^4, 1, 1) \\
P_{686} &= (13, 9, 1, 1) = (\alpha^{11}, \alpha^4, 1, 1) \\
P_{687} &= (14, 9, 1, 1) = (\alpha^8, \alpha^4, 1, 1) \\
P_{688} &= (15, 9, 1, 1) = (\alpha^6, \alpha^4, 1, 1) \\
P_{689} &= (0, 10, 1, 1) = (0, \alpha^{10}, 1, 1) \\
P_{690} &= (1, 10, 1, 1) = (1, \alpha^{10}, 1, 1) \\
P_{691} &= (2, 10, 1, 1) = (\alpha, \alpha^{10}, 1, 1) \\
P_{692} &= (3, 10, 1, 1) = (\alpha^{12}, \alpha^{10}, 1, 1) \\
P_{693} &= (4, 10, 1, 1) = (\alpha^2, \alpha^{10}, 1, 1) \\
P_{694} &= (5, 10, 1, 1) = (\alpha^9, \alpha^{10}, 1, 1) \\
P_{695} &= (6, 10, 1, 1) = (\alpha^{13}, \alpha^{10}, 1, 1) \\
P_{696} &= (7, 10, 1, 1) = (\alpha^7, \alpha^{10}, 1, 1) \\
P_{697} &= (8, 10, 1, 1) = (\alpha^3, \alpha^{10}, 1, 1) \\
P_{698} &= (9, 10, 1, 1) = (\alpha^4, \alpha^{10}, 1, 1) \\
P_{699} &= (10, 10, 1, 1) = (\alpha^{10}, \alpha^{10}, 1, 1) \\
P_{700} &= (11, 10, 1, 1) = (\alpha^5, \alpha^{10}, 1, 1) \\
P_{701} &= (12, 10, 1, 1) = (\alpha^{14}, \alpha^{10}, 1, 1) \\
P_{702} &= (13, 10, 1, 1) = (\alpha^{11}, \alpha^{10}, 1, 1) \\
P_{703} &= (14, 10, 1, 1) = (\alpha^8, \alpha^{10}, 1, 1) \\
P_{704} &= (15, 10, 1, 1) = (\alpha^6, \alpha^{10}, 1, 1) \\
P_{705} &= (0, 11, 1, 1) = (0, \alpha^5, 1, 1) \\
P_{706} &= (1, 11, 1, 1) = (1, \alpha^5, 1, 1) \\
P_{707} &= (2, 11, 1, 1) = (\alpha, \alpha^5, 1, 1) \\
P_{708} &= (3, 11, 1, 1) = (\alpha^{12}, \alpha^5, 1, 1)
\end{aligned}$$

$$\begin{aligned}
P_{709} &= (4, 11, 1, 1) = (\alpha^2, \alpha^5, 1, 1) \\
P_{710} &= (5, 11, 1, 1) = (\alpha^9, \alpha^5, 1, 1) \\
P_{711} &= (6, 11, 1, 1) = (\alpha^{13}, \alpha^5, 1, 1) \\
P_{712} &= (7, 11, 1, 1) = (\alpha^7, \alpha^5, 1, 1) \\
P_{713} &= (8, 11, 1, 1) = (\alpha^3, \alpha^5, 1, 1) \\
P_{714} &= (9, 11, 1, 1) = (\alpha^4, \alpha^5, 1, 1) \\
P_{715} &= (10, 11, 1, 1) = (\alpha^{10}, \alpha^5, 1, 1) \\
P_{716} &= (11, 11, 1, 1) = (\alpha^5, \alpha^5, 1, 1) \\
P_{717} &= (12, 11, 1, 1) = (\alpha^{14}, \alpha^5, 1, 1) \\
P_{718} &= (13, 11, 1, 1) = (\alpha^{11}, \alpha^5, 1, 1) \\
P_{719} &= (14, 11, 1, 1) = (\alpha^8, \alpha^5, 1, 1) \\
P_{720} &= (15, 11, 1, 1) = (\alpha^6, \alpha^5, 1, 1) \\
P_{721} &= (0, 12, 1, 1) = (0, \alpha^{14}, 1, 1) \\
P_{722} &= (1, 12, 1, 1) = (1, \alpha^{14}, 1, 1) \\
P_{723} &= (2, 12, 1, 1) = (\alpha, \alpha^{14}, 1, 1) \\
P_{724} &= (3, 12, 1, 1) = (\alpha^{12}, \alpha^{14}, 1, 1) \\
P_{725} &= (4, 12, 1, 1) = (\alpha^2, \alpha^{14}, 1, 1) \\
P_{726} &= (5, 12, 1, 1) = (\alpha^9, \alpha^{14}, 1, 1) \\
P_{727} &= (6, 12, 1, 1) = (\alpha^{13}, \alpha^{14}, 1, 1) \\
P_{728} &= (7, 12, 1, 1) = (\alpha^7, \alpha^{14}, 1, 1) \\
P_{729} &= (8, 12, 1, 1) = (\alpha^3, \alpha^{14}, 1, 1) \\
P_{730} &= (9, 12, 1, 1) = (\alpha^4, \alpha^{14}, 1, 1) \\
P_{731} &= (10, 12, 1, 1) = (\alpha^{10}, \alpha^{14}, 1, 1) \\
P_{732} &= (11, 12, 1, 1) = (\alpha^5, \alpha^{14}, 1, 1) \\
P_{733} &= (12, 12, 1, 1) = (\alpha^{14}, \alpha^{14}, 1, 1) \\
P_{734} &= (13, 12, 1, 1) = (\alpha^{11}, \alpha^{14}, 1, 1) \\
P_{735} &= (14, 12, 1, 1) = (\alpha^8, \alpha^{14}, 1, 1) \\
P_{736} &= (15, 12, 1, 1) = (\alpha^6, \alpha^{14}, 1, 1) \\
P_{737} &= (0, 13, 1, 1) = (0, \alpha^{11}, 1, 1) \\
P_{738} &= (1, 13, 1, 1) = (1, \alpha^{11}, 1, 1) \\
P_{739} &= (2, 13, 1, 1) = (\alpha, \alpha^{11}, 1, 1) \\
P_{740} &= (3, 13, 1, 1) = (\alpha^{12}, \alpha^{11}, 1, 1) \\
P_{741} &= (4, 13, 1, 1) = (\alpha^2, \alpha^{11}, 1, 1) \\
P_{742} &= (5, 13, 1, 1) = (\alpha^9, \alpha^{11}, 1, 1) \\
P_{743} &= (6, 13, 1, 1) = (\alpha^{13}, \alpha^{11}, 1, 1) \\
P_{744} &= (7, 13, 1, 1) = (\alpha^7, \alpha^{11}, 1, 1) \\
P_{745} &= (8, 13, 1, 1) = (\alpha^3, \alpha^{11}, 1, 1) \\
P_{746} &= (9, 13, 1, 1) = (\alpha^4, \alpha^{11}, 1, 1) \\
P_{747} &= (10, 13, 1, 1) = (\alpha^{10}, \alpha^{11}, 1, 1) \\
P_{748} &= (11, 13, 1, 1) = (\alpha^5, \alpha^{11}, 1, 1) \\
P_{749} &= (12, 13, 1, 1) = (\alpha^{14}, \alpha^{11}, 1, 1) \\
P_{750} &= (13, 13, 1, 1) = (\alpha^{11}, \alpha^{11}, 1, 1) \\
P_{751} &= (14, 13, 1, 1) = (\alpha^8, \alpha^{11}, 1, 1) \\
P_{752} &= (15, 13, 1, 1) = (\alpha^6, \alpha^{11}, 1, 1) \\
P_{753} &= (0, 14, 1, 1) = (0, \alpha^8, 1, 1)
\end{aligned}$$

$$\begin{aligned}
P_{754} &= (1, 14, 1, 1) = (1, \alpha^8, 1, 1) \\
P_{755} &= (2, 14, 1, 1) = (\alpha, \alpha^8, 1, 1) \\
P_{756} &= (3, 14, 1, 1) = (\alpha^{12}, \alpha^8, 1, 1) \\
P_{757} &= (4, 14, 1, 1) = (\alpha^2, \alpha^8, 1, 1) \\
P_{758} &= (5, 14, 1, 1) = (\alpha^9, \alpha^8, 1, 1) \\
P_{759} &= (6, 14, 1, 1) = (\alpha^{13}, \alpha^8, 1, 1) \\
P_{760} &= (7, 14, 1, 1) = (\alpha^7, \alpha^8, 1, 1) \\
P_{761} &= (8, 14, 1, 1) = (\alpha^3, \alpha^8, 1, 1) \\
P_{762} &= (9, 14, 1, 1) = (\alpha^4, \alpha^8, 1, 1) \\
P_{763} &= (10, 14, 1, 1) = (\alpha^{10}, \alpha^8, 1, 1) \\
P_{764} &= (11, 14, 1, 1) = (\alpha^5, \alpha^8, 1, 1) \\
P_{765} &= (12, 14, 1, 1) = (\alpha^{14}, \alpha^8, 1, 1) \\
P_{766} &= (13, 14, 1, 1) = (\alpha^{11}, \alpha^8, 1, 1) \\
P_{767} &= (14, 14, 1, 1) = (\alpha^8, \alpha^8, 1, 1) \\
P_{768} &= (15, 14, 1, 1) = (\alpha^6, \alpha^8, 1, 1) \\
P_{769} &= (0, 15, 1, 1) = (0, \alpha^6, 1, 1) \\
P_{770} &= (1, 15, 1, 1) = (1, \alpha^6, 1, 1) \\
P_{771} &= (2, 15, 1, 1) = (\alpha, \alpha^6, 1, 1) \\
P_{772} &= (3, 15, 1, 1) = (\alpha^{12}, \alpha^6, 1, 1) \\
P_{773} &= (4, 15, 1, 1) = (\alpha^2, \alpha^6, 1, 1) \\
P_{774} &= (5, 15, 1, 1) = (\alpha^9, \alpha^6, 1, 1) \\
P_{775} &= (6, 15, 1, 1) = (\alpha^{13}, \alpha^6, 1, 1) \\
P_{776} &= (7, 15, 1, 1) = (\alpha^7, \alpha^6, 1, 1) \\
P_{777} &= (8, 15, 1, 1) = (\alpha^3, \alpha^6, 1, 1) \\
P_{778} &= (9, 15, 1, 1) = (\alpha^4, \alpha^6, 1, 1) \\
P_{779} &= (10, 15, 1, 1) = (\alpha^{10}, \alpha^6, 1, 1) \\
P_{780} &= (11, 15, 1, 1) = (\alpha^5, \alpha^6, 1, 1) \\
P_{781} &= (12, 15, 1, 1) = (\alpha^{14}, \alpha^6, 1, 1) \\
P_{782} &= (13, 15, 1, 1) = (\alpha^{11}, \alpha^6, 1, 1) \\
P_{783} &= (14, 15, 1, 1) = (\alpha^8, \alpha^6, 1, 1) \\
P_{784} &= (15, 15, 1, 1) = (\alpha^6, \alpha^6, 1, 1) \\
P_{785} &= (0, 0, 2, 1) = (0, 0, \alpha, 1) \\
P_{786} &= (1, 0, 2, 1) = (1, 0, \alpha, 1) \\
P_{787} &= (2, 0, 2, 1) = (\alpha, 0, \alpha, 1) \\
P_{788} &= (3, 0, 2, 1) = (\alpha^{12}, 0, \alpha, 1) \\
P_{789} &= (4, 0, 2, 1) = (\alpha^2, 0, \alpha, 1) \\
P_{790} &= (5, 0, 2, 1) = (\alpha^9, 0, \alpha, 1) \\
P_{791} &= (6, 0, 2, 1) = (\alpha^{13}, 0, \alpha, 1) \\
P_{792} &= (7, 0, 2, 1) = (\alpha^7, 0, \alpha, 1) \\
P_{793} &= (8, 0, 2, 1) = (\alpha^3, 0, \alpha, 1) \\
P_{794} &= (9, 0, 2, 1) = (\alpha^4, 0, \alpha, 1) \\
P_{795} &= (10, 0, 2, 1) = (\alpha^{10}, 0, \alpha, 1) \\
P_{796} &= (11, 0, 2, 1) = (\alpha^5, 0, \alpha, 1) \\
P_{797} &= (12, 0, 2, 1) = (\alpha^{14}, 0, \alpha, 1) \\
P_{798} &= (13, 0, 2, 1) = (\alpha^{11}, 0, \alpha, 1)
\end{aligned}$$

$$\begin{aligned}
P_{799} &= (14, 0, 2, 1) = (\alpha^8, 0, \alpha, 1) \\
P_{800} &= (15, 0, 2, 1) = (\alpha^6, 0, \alpha, 1) \\
P_{801} &= (0, 1, 2, 1) = (0, 1, \alpha, 1) \\
P_{802} &= (1, 1, 2, 1) = (1, 1, \alpha, 1) \\
P_{803} &= (2, 1, 2, 1) = (\alpha, 1, \alpha, 1) \\
P_{804} &= (3, 1, 2, 1) = (\alpha^{12}, 1, \alpha, 1) \\
P_{805} &= (4, 1, 2, 1) = (\alpha^2, 1, \alpha, 1) \\
P_{806} &= (5, 1, 2, 1) = (\alpha^9, 1, \alpha, 1) \\
P_{807} &= (6, 1, 2, 1) = (\alpha^{13}, 1, \alpha, 1) \\
P_{808} &= (7, 1, 2, 1) = (\alpha^7, 1, \alpha, 1) \\
P_{809} &= (8, 1, 2, 1) = (\alpha^3, 1, \alpha, 1) \\
P_{810} &= (9, 1, 2, 1) = (\alpha^4, 1, \alpha, 1) \\
P_{811} &= (10, 1, 2, 1) = (\alpha^{10}, 1, \alpha, 1) \\
P_{812} &= (11, 1, 2, 1) = (\alpha^5, 1, \alpha, 1) \\
P_{813} &= (12, 1, 2, 1) = (\alpha^{14}, 1, \alpha, 1) \\
P_{814} &= (13, 1, 2, 1) = (\alpha^{11}, 1, \alpha, 1) \\
P_{815} &= (14, 1, 2, 1) = (\alpha^8, 1, \alpha, 1) \\
P_{816} &= (15, 1, 2, 1) = (\alpha^6, 1, \alpha, 1) \\
P_{817} &= (0, 2, 2, 1) = (0, \alpha, \alpha, 1) \\
P_{818} &= (1, 2, 2, 1) = (1, \alpha, \alpha, 1) \\
P_{819} &= (2, 2, 2, 1) = (\alpha, \alpha, \alpha, 1) \\
P_{820} &= (3, 2, 2, 1) = (\alpha^{12}, \alpha, \alpha, 1) \\
P_{821} &= (4, 2, 2, 1) = (\alpha^2, \alpha, \alpha, 1) \\
P_{822} &= (5, 2, 2, 1) = (\alpha^9, \alpha, \alpha, 1) \\
P_{823} &= (6, 2, 2, 1) = (\alpha^{13}, \alpha, \alpha, 1) \\
P_{824} &= (7, 2, 2, 1) = (\alpha^7, \alpha, \alpha, 1) \\
P_{825} &= (8, 2, 2, 1) = (\alpha^3, \alpha, \alpha, 1) \\
P_{826} &= (9, 2, 2, 1) = (\alpha^4, \alpha, \alpha, 1) \\
P_{827} &= (10, 2, 2, 1) = (\alpha^{10}, \alpha, \alpha, 1) \\
P_{828} &= (11, 2, 2, 1) = (\alpha^5, \alpha, \alpha, 1) \\
P_{829} &= (12, 2, 2, 1) = (\alpha^{14}, \alpha, \alpha, 1) \\
P_{830} &= (13, 2, 2, 1) = (\alpha^{11}, \alpha, \alpha, 1) \\
P_{831} &= (14, 2, 2, 1) = (\alpha^8, \alpha, \alpha, 1) \\
P_{832} &= (15, 2, 2, 1) = (\alpha^6, \alpha, \alpha, 1) \\
P_{833} &= (0, 3, 2, 1) = (0, \alpha^{12}, \alpha, 1) \\
P_{834} &= (1, 3, 2, 1) = (1, \alpha^{12}, \alpha, 1) \\
P_{835} &= (2, 3, 2, 1) = (\alpha, \alpha^{12}, \alpha, 1) \\
P_{836} &= (3, 3, 2, 1) = (\alpha^{12}, \alpha^{12}, \alpha, 1) \\
P_{837} &= (4, 3, 2, 1) = (\alpha^2, \alpha^{12}, \alpha, 1) \\
P_{838} &= (5, 3, 2, 1) = (\alpha^9, \alpha^{12}, \alpha, 1) \\
P_{839} &= (6, 3, 2, 1) = (\alpha^{13}, \alpha^{12}, \alpha, 1) \\
P_{840} &= (7, 3, 2, 1) = (\alpha^7, \alpha^{12}, \alpha, 1) \\
P_{841} &= (8, 3, 2, 1) = (\alpha^3, \alpha^{12}, \alpha, 1) \\
P_{842} &= (9, 3, 2, 1) = (\alpha^4, \alpha^{12}, \alpha, 1) \\
P_{843} &= (10, 3, 2, 1) = (\alpha^{10}, \alpha^{12}, \alpha, 1)
\end{aligned}$$

$$\begin{aligned}
P_{844} &= (11, 3, 2, 1) = (\alpha^5, \alpha^{12}, \alpha, 1) \\
P_{845} &= (12, 3, 2, 1) = (\alpha^{14}, \alpha^{12}, \alpha, 1) \\
P_{846} &= (13, 3, 2, 1) = (\alpha^{11}, \alpha^{12}, \alpha, 1) \\
P_{847} &= (14, 3, 2, 1) = (\alpha^8, \alpha^{12}, \alpha, 1) \\
P_{848} &= (15, 3, 2, 1) = (\alpha^6, \alpha^{12}, \alpha, 1) \\
P_{849} &= (0, 4, 2, 1) = (0, \alpha^2, \alpha, 1) \\
P_{850} &= (1, 4, 2, 1) = (1, \alpha^2, \alpha, 1) \\
P_{851} &= (2, 4, 2, 1) = (\alpha, \alpha^2, \alpha, 1) \\
P_{852} &= (3, 4, 2, 1) = (\alpha^{12}, \alpha^2, \alpha, 1) \\
P_{853} &= (4, 4, 2, 1) = (\alpha^2, \alpha^2, \alpha, 1) \\
P_{854} &= (5, 4, 2, 1) = (\alpha^9, \alpha^2, \alpha, 1) \\
P_{855} &= (6, 4, 2, 1) = (\alpha^{13}, \alpha^2, \alpha, 1) \\
P_{856} &= (7, 4, 2, 1) = (\alpha^7, \alpha^2, \alpha, 1) \\
P_{857} &= (8, 4, 2, 1) = (\alpha^3, \alpha^2, \alpha, 1) \\
P_{858} &= (9, 4, 2, 1) = (\alpha^4, \alpha^2, \alpha, 1) \\
P_{859} &= (10, 4, 2, 1) = (\alpha^{10}, \alpha^2, \alpha, 1) \\
P_{860} &= (11, 4, 2, 1) = (\alpha^5, \alpha^2, \alpha, 1) \\
P_{861} &= (12, 4, 2, 1) = (\alpha^{14}, \alpha^2, \alpha, 1) \\
P_{862} &= (13, 4, 2, 1) = (\alpha^{11}, \alpha^2, \alpha, 1) \\
P_{863} &= (14, 4, 2, 1) = (\alpha^8, \alpha^2, \alpha, 1) \\
P_{864} &= (15, 4, 2, 1) = (\alpha^6, \alpha^2, \alpha, 1) \\
P_{865} &= (0, 5, 2, 1) = (0, \alpha^9, \alpha, 1) \\
P_{866} &= (1, 5, 2, 1) = (1, \alpha^9, \alpha, 1) \\
P_{867} &= (2, 5, 2, 1) = (\alpha, \alpha^9, \alpha, 1) \\
P_{868} &= (3, 5, 2, 1) = (\alpha^{12}, \alpha^9, \alpha, 1) \\
P_{869} &= (4, 5, 2, 1) = (\alpha^2, \alpha^9, \alpha, 1) \\
P_{870} &= (5, 5, 2, 1) = (\alpha^9, \alpha^9, \alpha, 1) \\
P_{871} &= (6, 5, 2, 1) = (\alpha^{13}, \alpha^9, \alpha, 1) \\
P_{872} &= (7, 5, 2, 1) = (\alpha^7, \alpha^9, \alpha, 1) \\
P_{873} &= (8, 5, 2, 1) = (\alpha^3, \alpha^9, \alpha, 1) \\
P_{874} &= (9, 5, 2, 1) = (\alpha^4, \alpha^9, \alpha, 1) \\
P_{875} &= (10, 5, 2, 1) = (\alpha^{10}, \alpha^9, \alpha, 1) \\
P_{876} &= (11, 5, 2, 1) = (\alpha^5, \alpha^9, \alpha, 1) \\
P_{877} &= (12, 5, 2, 1) = (\alpha^{14}, \alpha^9, \alpha, 1) \\
P_{878} &= (13, 5, 2, 1) = (\alpha^{11}, \alpha^9, \alpha, 1) \\
P_{879} &= (14, 5, 2, 1) = (\alpha^8, \alpha^9, \alpha, 1) \\
P_{880} &= (15, 5, 2, 1) = (\alpha^6, \alpha^9, \alpha, 1) \\
P_{881} &= (0, 6, 2, 1) = (0, \alpha^{13}, \alpha, 1) \\
P_{882} &= (1, 6, 2, 1) = (1, \alpha^{13}, \alpha, 1) \\
P_{883} &= (2, 6, 2, 1) = (\alpha, \alpha^{13}, \alpha, 1) \\
P_{884} &= (3, 6, 2, 1) = (\alpha^{12}, \alpha^{13}, \alpha, 1) \\
P_{885} &= (4, 6, 2, 1) = (\alpha^2, \alpha^{13}, \alpha, 1) \\
P_{886} &= (5, 6, 2, 1) = (\alpha^9, \alpha^{13}, \alpha, 1) \\
P_{887} &= (6, 6, 2, 1) = (\alpha^{13}, \alpha^{13}, \alpha, 1) \\
P_{888} &= (7, 6, 2, 1) = (\alpha^7, \alpha^{13}, \alpha, 1)
\end{aligned}$$

$$\begin{aligned}
P_{889} &= (8, 6, 2, 1) = (\alpha^3, \alpha^{13}, \alpha, 1) \\
P_{890} &= (9, 6, 2, 1) = (\alpha^4, \alpha^{13}, \alpha, 1) \\
P_{891} &= (10, 6, 2, 1) = (\alpha^{10}, \alpha^{13}, \alpha, 1) \\
P_{892} &= (11, 6, 2, 1) = (\alpha^5, \alpha^{13}, \alpha, 1) \\
P_{893} &= (12, 6, 2, 1) = (\alpha^{14}, \alpha^{13}, \alpha, 1) \\
P_{894} &= (13, 6, 2, 1) = (\alpha^{11}, \alpha^{13}, \alpha, 1) \\
P_{895} &= (14, 6, 2, 1) = (\alpha^8, \alpha^{13}, \alpha, 1) \\
P_{896} &= (15, 6, 2, 1) = (\alpha^6, \alpha^{13}, \alpha, 1) \\
P_{897} &= (0, 7, 2, 1) = (0, \alpha^7, \alpha, 1) \\
P_{898} &= (1, 7, 2, 1) = (1, \alpha^7, \alpha, 1) \\
P_{899} &= (2, 7, 2, 1) = (\alpha, \alpha^7, \alpha, 1) \\
P_{900} &= (3, 7, 2, 1) = (\alpha^{12}, \alpha^7, \alpha, 1) \\
P_{901} &= (4, 7, 2, 1) = (\alpha^2, \alpha^7, \alpha, 1) \\
P_{902} &= (5, 7, 2, 1) = (\alpha^9, \alpha^7, \alpha, 1) \\
P_{903} &= (6, 7, 2, 1) = (\alpha^{13}, \alpha^7, \alpha, 1) \\
P_{904} &= (7, 7, 2, 1) = (\alpha^7, \alpha^7, \alpha, 1) \\
P_{905} &= (8, 7, 2, 1) = (\alpha^3, \alpha^7, \alpha, 1) \\
P_{906} &= (9, 7, 2, 1) = (\alpha^4, \alpha^7, \alpha, 1) \\
P_{907} &= (10, 7, 2, 1) = (\alpha^{10}, \alpha^7, \alpha, 1) \\
P_{908} &= (11, 7, 2, 1) = (\alpha^5, \alpha^7, \alpha, 1) \\
P_{909} &= (12, 7, 2, 1) = (\alpha^{14}, \alpha^7, \alpha, 1) \\
P_{910} &= (13, 7, 2, 1) = (\alpha^{11}, \alpha^7, \alpha, 1) \\
P_{911} &= (14, 7, 2, 1) = (\alpha^8, \alpha^7, \alpha, 1) \\
P_{912} &= (15, 7, 2, 1) = (\alpha^6, \alpha^7, \alpha, 1) \\
P_{913} &= (0, 8, 2, 1) = (0, \alpha^3, \alpha, 1) \\
P_{914} &= (1, 8, 2, 1) = (1, \alpha^3, \alpha, 1) \\
P_{915} &= (2, 8, 2, 1) = (\alpha, \alpha^3, \alpha, 1) \\
P_{916} &= (3, 8, 2, 1) = (\alpha^{12}, \alpha^3, \alpha, 1) \\
P_{917} &= (4, 8, 2, 1) = (\alpha^2, \alpha^3, \alpha, 1) \\
P_{918} &= (5, 8, 2, 1) = (\alpha^9, \alpha^3, \alpha, 1) \\
P_{919} &= (6, 8, 2, 1) = (\alpha^{13}, \alpha^3, \alpha, 1) \\
P_{920} &= (7, 8, 2, 1) = (\alpha^7, \alpha^3, \alpha, 1) \\
P_{921} &= (8, 8, 2, 1) = (\alpha^3, \alpha^3, \alpha, 1) \\
P_{922} &= (9, 8, 2, 1) = (\alpha^4, \alpha^3, \alpha, 1) \\
P_{923} &= (10, 8, 2, 1) = (\alpha^{10}, \alpha^3, \alpha, 1) \\
P_{924} &= (11, 8, 2, 1) = (\alpha^5, \alpha^3, \alpha, 1) \\
P_{925} &= (12, 8, 2, 1) = (\alpha^{14}, \alpha^3, \alpha, 1) \\
P_{926} &= (13, 8, 2, 1) = (\alpha^{11}, \alpha^3, \alpha, 1) \\
P_{927} &= (14, 8, 2, 1) = (\alpha^8, \alpha^3, \alpha, 1) \\
P_{928} &= (15, 8, 2, 1) = (\alpha^6, \alpha^3, \alpha, 1) \\
P_{929} &= (0, 9, 2, 1) = (0, \alpha^4, \alpha, 1) \\
P_{930} &= (1, 9, 2, 1) = (1, \alpha^4, \alpha, 1) \\
P_{931} &= (2, 9, 2, 1) = (\alpha, \alpha^4, \alpha, 1) \\
P_{932} &= (3, 9, 2, 1) = (\alpha^{12}, \alpha^4, \alpha, 1) \\
P_{933} &= (4, 9, 2, 1) = (\alpha^2, \alpha^4, \alpha, 1)
\end{aligned}$$

$$\begin{aligned}
P_{934} &= (5, 9, 2, 1) = (\alpha^9, \alpha^4, \alpha, 1) \\
P_{935} &= (6, 9, 2, 1) = (\alpha^{13}, \alpha^4, \alpha, 1) \\
P_{936} &= (7, 9, 2, 1) = (\alpha^7, \alpha^4, \alpha, 1) \\
P_{937} &= (8, 9, 2, 1) = (\alpha^3, \alpha^4, \alpha, 1) \\
P_{938} &= (9, 9, 2, 1) = (\alpha^4, \alpha^4, \alpha, 1) \\
P_{939} &= (10, 9, 2, 1) = (\alpha^{10}, \alpha^4, \alpha, 1) \\
P_{940} &= (11, 9, 2, 1) = (\alpha^5, \alpha^4, \alpha, 1) \\
P_{941} &= (12, 9, 2, 1) = (\alpha^{14}, \alpha^4, \alpha, 1) \\
P_{942} &= (13, 9, 2, 1) = (\alpha^{11}, \alpha^4, \alpha, 1) \\
P_{943} &= (14, 9, 2, 1) = (\alpha^8, \alpha^4, \alpha, 1) \\
P_{944} &= (15, 9, 2, 1) = (\alpha^6, \alpha^4, \alpha, 1) \\
P_{945} &= (0, 10, 2, 1) = (0, \alpha^{10}, \alpha, 1) \\
P_{946} &= (1, 10, 2, 1) = (1, \alpha^{10}, \alpha, 1) \\
P_{947} &= (2, 10, 2, 1) = (\alpha, \alpha^{10}, \alpha, 1) \\
P_{948} &= (3, 10, 2, 1) = (\alpha^{12}, \alpha^{10}, \alpha, 1) \\
P_{949} &= (4, 10, 2, 1) = (\alpha^2, \alpha^{10}, \alpha, 1) \\
P_{950} &= (5, 10, 2, 1) = (\alpha^9, \alpha^{10}, \alpha, 1) \\
P_{951} &= (6, 10, 2, 1) = (\alpha^{13}, \alpha^{10}, \alpha, 1) \\
P_{952} &= (7, 10, 2, 1) = (\alpha^7, \alpha^{10}, \alpha, 1) \\
P_{953} &= (8, 10, 2, 1) = (\alpha^3, \alpha^{10}, \alpha, 1) \\
P_{954} &= (9, 10, 2, 1) = (\alpha^4, \alpha^{10}, \alpha, 1) \\
P_{955} &= (10, 10, 2, 1) = (\alpha^{10}, \alpha^{10}, \alpha, 1) \\
P_{956} &= (11, 10, 2, 1) = (\alpha^5, \alpha^{10}, \alpha, 1) \\
P_{957} &= (12, 10, 2, 1) = (\alpha^{14}, \alpha^{10}, \alpha, 1) \\
P_{958} &= (13, 10, 2, 1) = (\alpha^{11}, \alpha^{10}, \alpha, 1) \\
P_{959} &= (14, 10, 2, 1) = (\alpha^8, \alpha^{10}, \alpha, 1) \\
P_{960} &= (15, 10, 2, 1) = (\alpha^6, \alpha^{10}, \alpha, 1) \\
P_{961} &= (0, 11, 2, 1) = (0, \alpha^5, \alpha, 1) \\
P_{962} &= (1, 11, 2, 1) = (1, \alpha^5, \alpha, 1) \\
P_{963} &= (2, 11, 2, 1) = (\alpha, \alpha^5, \alpha, 1) \\
P_{964} &= (3, 11, 2, 1) = (\alpha^{12}, \alpha^5, \alpha, 1) \\
P_{965} &= (4, 11, 2, 1) = (\alpha^2, \alpha^5, \alpha, 1) \\
P_{966} &= (5, 11, 2, 1) = (\alpha^9, \alpha^5, \alpha, 1) \\
P_{967} &= (6, 11, 2, 1) = (\alpha^{13}, \alpha^5, \alpha, 1) \\
P_{968} &= (7, 11, 2, 1) = (\alpha^7, \alpha^5, \alpha, 1) \\
P_{969} &= (8, 11, 2, 1) = (\alpha^3, \alpha^5, \alpha, 1) \\
P_{970} &= (9, 11, 2, 1) = (\alpha^4, \alpha^5, \alpha, 1) \\
P_{971} &= (10, 11, 2, 1) = (\alpha^{10}, \alpha^5, \alpha, 1) \\
P_{972} &= (11, 11, 2, 1) = (\alpha^5, \alpha^5, \alpha, 1) \\
P_{973} &= (12, 11, 2, 1) = (\alpha^{14}, \alpha^5, \alpha, 1) \\
P_{974} &= (13, 11, 2, 1) = (\alpha^{11}, \alpha^5, \alpha, 1) \\
P_{975} &= (14, 11, 2, 1) = (\alpha^8, \alpha^5, \alpha, 1) \\
P_{976} &= (15, 11, 2, 1) = (\alpha^6, \alpha^5, \alpha, 1) \\
P_{977} &= (0, 12, 2, 1) = (0, \alpha^{14}, \alpha, 1) \\
P_{978} &= (1, 12, 2, 1) = (1, \alpha^{14}, \alpha, 1)
\end{aligned}$$

$$\begin{aligned}
P_{979} &= (2, 12, 2, 1) = (\alpha, \alpha^{14}, \alpha, 1) \\
P_{980} &= (3, 12, 2, 1) = (\alpha^{12}, \alpha^{14}, \alpha, 1) \\
P_{981} &= (4, 12, 2, 1) = (\alpha^2, \alpha^{14}, \alpha, 1) \\
P_{982} &= (5, 12, 2, 1) = (\alpha^9, \alpha^{14}, \alpha, 1) \\
P_{983} &= (6, 12, 2, 1) = (\alpha^{13}, \alpha^{14}, \alpha, 1) \\
P_{984} &= (7, 12, 2, 1) = (\alpha^7, \alpha^{14}, \alpha, 1) \\
P_{985} &= (8, 12, 2, 1) = (\alpha^3, \alpha^{14}, \alpha, 1) \\
P_{986} &= (9, 12, 2, 1) = (\alpha^4, \alpha^{14}, \alpha, 1) \\
P_{987} &= (10, 12, 2, 1) = (\alpha^{10}, \alpha^{14}, \alpha, 1) \\
P_{988} &= (11, 12, 2, 1) = (\alpha^5, \alpha^{14}, \alpha, 1) \\
P_{989} &= (12, 12, 2, 1) = (\alpha^{14}, \alpha^{14}, \alpha, 1) \\
P_{990} &= (13, 12, 2, 1) = (\alpha^{11}, \alpha^{14}, \alpha, 1) \\
P_{991} &= (14, 12, 2, 1) = (\alpha^8, \alpha^{14}, \alpha, 1) \\
P_{992} &= (15, 12, 2, 1) = (\alpha^6, \alpha^{14}, \alpha, 1) \\
P_{993} &= (0, 13, 2, 1) = (0, \alpha^{11}, \alpha, 1) \\
P_{994} &= (1, 13, 2, 1) = (1, \alpha^{11}, \alpha, 1) \\
P_{995} &= (2, 13, 2, 1) = (\alpha, \alpha^{11}, \alpha, 1) \\
P_{996} &= (3, 13, 2, 1) = (\alpha^{12}, \alpha^{11}, \alpha, 1) \\
P_{997} &= (4, 13, 2, 1) = (\alpha^2, \alpha^{11}, \alpha, 1) \\
P_{998} &= (5, 13, 2, 1) = (\alpha^9, \alpha^{11}, \alpha, 1) \\
P_{999} &= (6, 13, 2, 1) = (\alpha^{13}, \alpha^{11}, \alpha, 1) \\
P_{1000} &= (7, 13, 2, 1) = (\alpha^7, \alpha^{11}, \alpha, 1) \\
P_{1001} &= (8, 13, 2, 1) = (\alpha^3, \alpha^{11}, \alpha, 1) \\
P_{1002} &= (9, 13, 2, 1) = (\alpha^4, \alpha^{11}, \alpha, 1) \\
P_{1003} &= (10, 13, 2, 1) = (\alpha^{10}, \alpha^{11}, \alpha, 1) \\
P_{1004} &= (11, 13, 2, 1) = (\alpha^5, \alpha^{11}, \alpha, 1) \\
P_{1005} &= (12, 13, 2, 1) = (\alpha^{14}, \alpha^{11}, \alpha, 1) \\
P_{1006} &= (13, 13, 2, 1) = (\alpha^{11}, \alpha^{11}, \alpha, 1) \\
P_{1007} &= (14, 13, 2, 1) = (\alpha^8, \alpha^{11}, \alpha, 1) \\
P_{1008} &= (15, 13, 2, 1) = (\alpha^6, \alpha^{11}, \alpha, 1) \\
P_{1009} &= (0, 14, 2, 1) = (0, \alpha^8, \alpha, 1) \\
P_{1010} &= (1, 14, 2, 1) = (1, \alpha^8, \alpha, 1) \\
P_{1011} &= (2, 14, 2, 1) = (\alpha, \alpha^8, \alpha, 1) \\
P_{1012} &= (3, 14, 2, 1) = (\alpha^{12}, \alpha^8, \alpha, 1) \\
P_{1013} &= (4, 14, 2, 1) = (\alpha^2, \alpha^8, \alpha, 1) \\
P_{1014} &= (5, 14, 2, 1) = (\alpha^9, \alpha^8, \alpha, 1) \\
P_{1015} &= (6, 14, 2, 1) = (\alpha^{13}, \alpha^8, \alpha, 1) \\
P_{1016} &= (7, 14, 2, 1) = (\alpha^7, \alpha^8, \alpha, 1) \\
P_{1017} &= (8, 14, 2, 1) = (\alpha^3, \alpha^8, \alpha, 1) \\
P_{1018} &= (9, 14, 2, 1) = (\alpha^4, \alpha^8, \alpha, 1) \\
P_{1019} &= (10, 14, 2, 1) = (\alpha^{10}, \alpha^8, \alpha, 1) \\
P_{1020} &= (11, 14, 2, 1) = (\alpha^5, \alpha^8, \alpha, 1) \\
P_{1021} &= (12, 14, 2, 1) = (\alpha^{14}, \alpha^8, \alpha, 1) \\
P_{1022} &= (13, 14, 2, 1) = (\alpha^{11}, \alpha^8, \alpha, 1) \\
P_{1023} &= (14, 14, 2, 1) = (\alpha^8, \alpha^8, \alpha, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1024} &= (15, 14, 2, 1) = (\alpha^6, \alpha^8, \alpha, 1) \\
P_{1025} &= (0, 15, 2, 1) = (0, \alpha^6, \alpha, 1) \\
P_{1026} &= (1, 15, 2, 1) = (1, \alpha^6, \alpha, 1) \\
P_{1027} &= (2, 15, 2, 1) = (\alpha, \alpha^6, \alpha, 1) \\
P_{1028} &= (3, 15, 2, 1) = (\alpha^{12}, \alpha^6, \alpha, 1) \\
P_{1029} &= (4, 15, 2, 1) = (\alpha^2, \alpha^6, \alpha, 1) \\
P_{1030} &= (5, 15, 2, 1) = (\alpha^9, \alpha^6, \alpha, 1) \\
P_{1031} &= (6, 15, 2, 1) = (\alpha^{13}, \alpha^6, \alpha, 1) \\
P_{1032} &= (7, 15, 2, 1) = (\alpha^7, \alpha^6, \alpha, 1) \\
P_{1033} &= (8, 15, 2, 1) = (\alpha^3, \alpha^6, \alpha, 1) \\
P_{1034} &= (9, 15, 2, 1) = (\alpha^4, \alpha^6, \alpha, 1) \\
P_{1035} &= (10, 15, 2, 1) = (\alpha^{10}, \alpha^6, \alpha, 1) \\
P_{1036} &= (11, 15, 2, 1) = (\alpha^5, \alpha^6, \alpha, 1) \\
P_{1037} &= (12, 15, 2, 1) = (\alpha^{14}, \alpha^6, \alpha, 1) \\
P_{1038} &= (13, 15, 2, 1) = (\alpha^{11}, \alpha^6, \alpha, 1) \\
P_{1039} &= (14, 15, 2, 1) = (\alpha^8, \alpha^6, \alpha, 1) \\
P_{1040} &= (15, 15, 2, 1) = (\alpha^6, \alpha^6, \alpha, 1) \\
P_{1041} &= (0, 0, 3, 1) = (0, 0, \alpha^{12}, 1) \\
P_{1042} &= (1, 0, 3, 1) = (1, 0, \alpha^{12}, 1) \\
P_{1043} &= (2, 0, 3, 1) = (\alpha, 0, \alpha^{12}, 1) \\
P_{1044} &= (3, 0, 3, 1) = (\alpha^{12}, 0, \alpha^{12}, 1) \\
P_{1045} &= (4, 0, 3, 1) = (\alpha^2, 0, \alpha^{12}, 1) \\
P_{1046} &= (5, 0, 3, 1) = (\alpha^9, 0, \alpha^{12}, 1) \\
P_{1047} &= (6, 0, 3, 1) = (\alpha^{13}, 0, \alpha^{12}, 1) \\
P_{1048} &= (7, 0, 3, 1) = (\alpha^7, 0, \alpha^{12}, 1) \\
P_{1049} &= (8, 0, 3, 1) = (\alpha^3, 0, \alpha^{12}, 1) \\
P_{1050} &= (9, 0, 3, 1) = (\alpha^4, 0, \alpha^{12}, 1) \\
P_{1051} &= (10, 0, 3, 1) = (\alpha^{10}, 0, \alpha^{12}, 1) \\
P_{1052} &= (11, 0, 3, 1) = (\alpha^5, 0, \alpha^{12}, 1) \\
P_{1053} &= (12, 0, 3, 1) = (\alpha^{14}, 0, \alpha^{12}, 1) \\
P_{1054} &= (13, 0, 3, 1) = (\alpha^{11}, 0, \alpha^{12}, 1) \\
P_{1055} &= (14, 0, 3, 1) = (\alpha^8, 0, \alpha^{12}, 1) \\
P_{1056} &= (15, 0, 3, 1) = (\alpha^6, 0, \alpha^{12}, 1) \\
P_{1057} &= (0, 1, 3, 1) = (0, 1, \alpha^{12}, 1) \\
P_{1058} &= (1, 1, 3, 1) = (1, 1, \alpha^{12}, 1) \\
P_{1059} &= (2, 1, 3, 1) = (\alpha, 1, \alpha^{12}, 1) \\
P_{1060} &= (3, 1, 3, 1) = (\alpha^{12}, 1, \alpha^{12}, 1) \\
P_{1061} &= (4, 1, 3, 1) = (\alpha^2, 1, \alpha^{12}, 1) \\
P_{1062} &= (5, 1, 3, 1) = (\alpha^9, 1, \alpha^{12}, 1) \\
P_{1063} &= (6, 1, 3, 1) = (\alpha^{13}, 1, \alpha^{12}, 1) \\
P_{1064} &= (7, 1, 3, 1) = (\alpha^7, 1, \alpha^{12}, 1) \\
P_{1065} &= (8, 1, 3, 1) = (\alpha^3, 1, \alpha^{12}, 1) \\
P_{1066} &= (9, 1, 3, 1) = (\alpha^4, 1, \alpha^{12}, 1) \\
P_{1067} &= (10, 1, 3, 1) = (\alpha^{10}, 1, \alpha^{12}, 1) \\
P_{1068} &= (11, 1, 3, 1) = (\alpha^5, 1, \alpha^{12}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1069} &= (12, 1, 3, 1) = (\alpha^{14}, 1, \alpha^{12}, 1) \\
P_{1070} &= (13, 1, 3, 1) = (\alpha^{11}, 1, \alpha^{12}, 1) \\
P_{1071} &= (14, 1, 3, 1) = (\alpha^8, 1, \alpha^{12}, 1) \\
P_{1072} &= (15, 1, 3, 1) = (\alpha^6, 1, \alpha^{12}, 1) \\
P_{1073} &= (0, 2, 3, 1) = (0, \alpha, \alpha^{12}, 1) \\
P_{1074} &= (1, 2, 3, 1) = (1, \alpha, \alpha^{12}, 1) \\
P_{1075} &= (2, 2, 3, 1) = (\alpha, \alpha, \alpha^{12}, 1) \\
P_{1076} &= (3, 2, 3, 1) = (\alpha^{12}, \alpha, \alpha^{12}, 1) \\
P_{1077} &= (4, 2, 3, 1) = (\alpha^2, \alpha, \alpha^{12}, 1) \\
P_{1078} &= (5, 2, 3, 1) = (\alpha^9, \alpha, \alpha^{12}, 1) \\
P_{1079} &= (6, 2, 3, 1) = (\alpha^{13}, \alpha, \alpha^{12}, 1) \\
P_{1080} &= (7, 2, 3, 1) = (\alpha^7, \alpha, \alpha^{12}, 1) \\
P_{1081} &= (8, 2, 3, 1) = (\alpha^3, \alpha, \alpha^{12}, 1) \\
P_{1082} &= (9, 2, 3, 1) = (\alpha^4, \alpha, \alpha^{12}, 1) \\
P_{1083} &= (10, 2, 3, 1) = (\alpha^{10}, \alpha, \alpha^{12}, 1) \\
P_{1084} &= (11, 2, 3, 1) = (\alpha^5, \alpha, \alpha^{12}, 1) \\
P_{1085} &= (12, 2, 3, 1) = (\alpha^{14}, \alpha, \alpha^{12}, 1) \\
P_{1086} &= (13, 2, 3, 1) = (\alpha^{11}, \alpha, \alpha^{12}, 1) \\
P_{1087} &= (14, 2, 3, 1) = (\alpha^8, \alpha, \alpha^{12}, 1) \\
P_{1088} &= (15, 2, 3, 1) = (\alpha^6, \alpha, \alpha^{12}, 1) \\
P_{1089} &= (0, 3, 3, 1) = (0, \alpha^{12}, \alpha^{12}, 1) \\
P_{1090} &= (1, 3, 3, 1) = (1, \alpha^{12}, \alpha^{12}, 1) \\
P_{1091} &= (2, 3, 3, 1) = (\alpha, \alpha^{12}, \alpha^{12}, 1) \\
P_{1092} &= (3, 3, 3, 1) = (\alpha^{12}, \alpha^{12}, \alpha^{12}, 1) \\
P_{1093} &= (4, 3, 3, 1) = (\alpha^2, \alpha^{12}, \alpha^{12}, 1) \\
P_{1094} &= (5, 3, 3, 1) = (\alpha^9, \alpha^{12}, \alpha^{12}, 1) \\
P_{1095} &= (6, 3, 3, 1) = (\alpha^{13}, \alpha^{12}, \alpha^{12}, 1) \\
P_{1096} &= (7, 3, 3, 1) = (\alpha^7, \alpha^{12}, \alpha^{12}, 1) \\
P_{1097} &= (8, 3, 3, 1) = (\alpha^3, \alpha^{12}, \alpha^{12}, 1) \\
P_{1098} &= (9, 3, 3, 1) = (\alpha^4, \alpha^{12}, \alpha^{12}, 1) \\
P_{1099} &= (10, 3, 3, 1) = (\alpha^{10}, \alpha^{12}, \alpha^{12}, 1) \\
P_{1100} &= (11, 3, 3, 1) = (\alpha^5, \alpha^{12}, \alpha^{12}, 1) \\
P_{1101} &= (12, 3, 3, 1) = (\alpha^{14}, \alpha^{12}, \alpha^{12}, 1) \\
P_{1102} &= (13, 3, 3, 1) = (\alpha^{11}, \alpha^{12}, \alpha^{12}, 1) \\
P_{1103} &= (14, 3, 3, 1) = (\alpha^8, \alpha^{12}, \alpha^{12}, 1) \\
P_{1104} &= (15, 3, 3, 1) = (\alpha^6, \alpha^{12}, \alpha^{12}, 1) \\
P_{1105} &= (0, 4, 3, 1) = (0, \alpha^2, \alpha^{12}, 1) \\
P_{1106} &= (1, 4, 3, 1) = (1, \alpha^2, \alpha^{12}, 1) \\
P_{1107} &= (2, 4, 3, 1) = (\alpha, \alpha^2, \alpha^{12}, 1) \\
P_{1108} &= (3, 4, 3, 1) = (\alpha^{12}, \alpha^2, \alpha^{12}, 1) \\
P_{1109} &= (4, 4, 3, 1) = (\alpha^2, \alpha^2, \alpha^{12}, 1) \\
P_{1110} &= (5, 4, 3, 1) = (\alpha^9, \alpha^2, \alpha^{12}, 1) \\
P_{1111} &= (6, 4, 3, 1) = (\alpha^{13}, \alpha^2, \alpha^{12}, 1) \\
P_{1112} &= (7, 4, 3, 1) = (\alpha^7, \alpha^2, \alpha^{12}, 1) \\
P_{1113} &= (8, 4, 3, 1) = (\alpha^3, \alpha^2, \alpha^{12}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1294} &= (13, 15, 3, 1) = (\alpha^{11}, \alpha^6, \alpha^{12}, 1) \\
P_{1295} &= (14, 15, 3, 1) = (\alpha^8, \alpha^6, \alpha^{12}, 1) \\
P_{1296} &= (15, 15, 3, 1) = (\alpha^6, \alpha^6, \alpha^{12}, 1) \\
P_{1297} &= (0, 0, 4, 1) = (0, 0, \alpha^2, 1) \\
P_{1298} &= (1, 0, 4, 1) = (1, 0, \alpha^2, 1) \\
P_{1299} &= (2, 0, 4, 1) = (\alpha, 0, \alpha^2, 1) \\
P_{1300} &= (3, 0, 4, 1) = (\alpha^{12}, 0, \alpha^2, 1) \\
P_{1301} &= (4, 0, 4, 1) = (\alpha^2, 0, \alpha^2, 1) \\
P_{1302} &= (5, 0, 4, 1) = (\alpha^9, 0, \alpha^2, 1) \\
P_{1303} &= (6, 0, 4, 1) = (\alpha^{13}, 0, \alpha^2, 1) \\
P_{1304} &= (7, 0, 4, 1) = (\alpha^7, 0, \alpha^2, 1) \\
P_{1305} &= (8, 0, 4, 1) = (\alpha^3, 0, \alpha^2, 1) \\
P_{1306} &= (9, 0, 4, 1) = (\alpha^4, 0, \alpha^2, 1) \\
P_{1307} &= (10, 0, 4, 1) = (\alpha^{10}, 0, \alpha^2, 1) \\
P_{1308} &= (11, 0, 4, 1) = (\alpha^5, 0, \alpha^2, 1) \\
P_{1309} &= (12, 0, 4, 1) = (\alpha^{14}, 0, \alpha^2, 1) \\
P_{1310} &= (13, 0, 4, 1) = (\alpha^{11}, 0, \alpha^2, 1) \\
P_{1311} &= (14, 0, 4, 1) = (\alpha^8, 0, \alpha^2, 1) \\
P_{1312} &= (15, 0, 4, 1) = (\alpha^6, 0, \alpha^2, 1) \\
P_{1313} &= (0, 1, 4, 1) = (0, 1, \alpha^2, 1) \\
P_{1314} &= (1, 1, 4, 1) = (1, 1, \alpha^2, 1) \\
P_{1315} &= (2, 1, 4, 1) = (\alpha, 1, \alpha^2, 1) \\
P_{1316} &= (3, 1, 4, 1) = (\alpha^{12}, 1, \alpha^2, 1) \\
P_{1317} &= (4, 1, 4, 1) = (\alpha^2, 1, \alpha^2, 1) \\
P_{1318} &= (5, 1, 4, 1) = (\alpha^9, 1, \alpha^2, 1) \\
P_{1319} &= (6, 1, 4, 1) = (\alpha^{13}, 1, \alpha^2, 1) \\
P_{1320} &= (7, 1, 4, 1) = (\alpha^7, 1, \alpha^2, 1) \\
P_{1321} &= (8, 1, 4, 1) = (\alpha^3, 1, \alpha^2, 1) \\
P_{1322} &= (9, 1, 4, 1) = (\alpha^4, 1, \alpha^2, 1) \\
P_{1323} &= (10, 1, 4, 1) = (\alpha^{10}, 1, \alpha^2, 1) \\
P_{1324} &= (11, 1, 4, 1) = (\alpha^5, 1, \alpha^2, 1) \\
P_{1325} &= (12, 1, 4, 1) = (\alpha^{14}, 1, \alpha^2, 1) \\
P_{1326} &= (13, 1, 4, 1) = (\alpha^{11}, 1, \alpha^2, 1) \\
P_{1327} &= (14, 1, 4, 1) = (\alpha^8, 1, \alpha^2, 1) \\
P_{1328} &= (15, 1, 4, 1) = (\alpha^6, 1, \alpha^2, 1) \\
P_{1329} &= (0, 2, 4, 1) = (0, \alpha, \alpha^2, 1) \\
P_{1330} &= (1, 2, 4, 1) = (1, \alpha, \alpha^2, 1) \\
P_{1331} &= (2, 2, 4, 1) = (\alpha, \alpha, \alpha^2, 1) \\
P_{1332} &= (3, 2, 4, 1) = (\alpha^{12}, \alpha, \alpha^2, 1) \\
P_{1333} &= (4, 2, 4, 1) = (\alpha^2, \alpha, \alpha^2, 1) \\
P_{1334} &= (5, 2, 4, 1) = (\alpha^9, \alpha, \alpha^2, 1) \\
P_{1335} &= (6, 2, 4, 1) = (\alpha^{13}, \alpha, \alpha^2, 1) \\
P_{1336} &= (7, 2, 4, 1) = (\alpha^7, \alpha, \alpha^2, 1) \\
P_{1337} &= (8, 2, 4, 1) = (\alpha^3, \alpha, \alpha^2, 1) \\
P_{1338} &= (9, 2, 4, 1) = (\alpha^4, \alpha, \alpha^2, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1339} &= (10, 2, 4, 1) = (\alpha^{10}, \alpha, \alpha^2, 1) \\
P_{1340} &= (11, 2, 4, 1) = (\alpha^5, \alpha, \alpha^2, 1) \\
P_{1341} &= (12, 2, 4, 1) = (\alpha^{14}, \alpha, \alpha^2, 1) \\
P_{1342} &= (13, 2, 4, 1) = (\alpha^{11}, \alpha, \alpha^2, 1) \\
P_{1343} &= (14, 2, 4, 1) = (\alpha^8, \alpha, \alpha^2, 1) \\
P_{1344} &= (15, 2, 4, 1) = (\alpha^6, \alpha, \alpha^2, 1) \\
P_{1345} &= (0, 3, 4, 1) = (0, \alpha^{12}, \alpha^2, 1) \\
P_{1346} &= (1, 3, 4, 1) = (1, \alpha^{12}, \alpha^2, 1) \\
P_{1347} &= (2, 3, 4, 1) = (\alpha, \alpha^{12}, \alpha^2, 1) \\
P_{1348} &= (3, 3, 4, 1) = (\alpha^{12}, \alpha^{12}, \alpha^2, 1) \\
P_{1349} &= (4, 3, 4, 1) = (\alpha^2, \alpha^{12}, \alpha^2, 1) \\
P_{1350} &= (5, 3, 4, 1) = (\alpha^9, \alpha^{12}, \alpha^2, 1) \\
P_{1351} &= (6, 3, 4, 1) = (\alpha^{13}, \alpha^{12}, \alpha^2, 1) \\
P_{1352} &= (7, 3, 4, 1) = (\alpha^7, \alpha^{12}, \alpha^2, 1) \\
P_{1353} &= (8, 3, 4, 1) = (\alpha^3, \alpha^{12}, \alpha^2, 1) \\
P_{1354} &= (9, 3, 4, 1) = (\alpha^4, \alpha^{12}, \alpha^2, 1) \\
P_{1355} &= (10, 3, 4, 1) = (\alpha^{10}, \alpha^{12}, \alpha^2, 1) \\
P_{1356} &= (11, 3, 4, 1) = (\alpha^5, \alpha^{12}, \alpha^2, 1) \\
P_{1357} &= (12, 3, 4, 1) = (\alpha^{14}, \alpha^{12}, \alpha^2, 1) \\
P_{1358} &= (13, 3, 4, 1) = (\alpha^{11}, \alpha^{12}, \alpha^2, 1) \\
P_{1359} &= (14, 3, 4, 1) = (\alpha^8, \alpha^{12}, \alpha^2, 1) \\
P_{1360} &= (15, 3, 4, 1) = (\alpha^6, \alpha^{12}, \alpha^2, 1) \\
P_{1361} &= (0, 4, 4, 1) = (0, \alpha^2, \alpha^2, 1) \\
P_{1362} &= (1, 4, 4, 1) = (1, \alpha^2, \alpha^2, 1) \\
P_{1363} &= (2, 4, 4, 1) = (\alpha, \alpha^2, \alpha^2, 1) \\
P_{1364} &= (3, 4, 4, 1) = (\alpha^{12}, \alpha^2, \alpha^2, 1) \\
P_{1365} &= (4, 4, 4, 1) = (\alpha^2, \alpha^2, \alpha^2, 1) \\
P_{1366} &= (5, 4, 4, 1) = (\alpha^9, \alpha^2, \alpha^2, 1) \\
P_{1367} &= (6, 4, 4, 1) = (\alpha^{13}, \alpha^2, \alpha^2, 1) \\
P_{1368} &= (7, 4, 4, 1) = (\alpha^7, \alpha^2, \alpha^2, 1) \\
P_{1369} &= (8, 4, 4, 1) = (\alpha^3, \alpha^2, \alpha^2, 1) \\
P_{1370} &= (9, 4, 4, 1) = (\alpha^4, \alpha^2, \alpha^2, 1) \\
P_{1371} &= (10, 4, 4, 1) = (\alpha^{10}, \alpha^2, \alpha^2, 1) \\
P_{1372} &= (11, 4, 4, 1) = (\alpha^5, \alpha^2, \alpha^2, 1) \\
P_{1373} &= (12, 4, 4, 1) = (\alpha^{14}, \alpha^2, \alpha^2, 1) \\
P_{1374} &= (13, 4, 4, 1) = (\alpha^{11}, \alpha^2, \alpha^2, 1) \\
P_{1375} &= (14, 4, 4, 1) = (\alpha^8, \alpha^2, \alpha^2, 1) \\
P_{1376} &= (15, 4, 4, 1) = (\alpha^6, \alpha^2, \alpha^2, 1) \\
P_{1377} &= (0, 5, 4, 1) = (0, \alpha^9, \alpha^2, 1) \\
P_{1378} &= (1, 5, 4, 1) = (1, \alpha^9, \alpha^2, 1) \\
P_{1379} &= (2, 5, 4, 1) = (\alpha, \alpha^9, \alpha^2, 1) \\
P_{1380} &= (3, 5, 4, 1) = (\alpha^{12}, \alpha^9, \alpha^2, 1) \\
P_{1381} &= (4, 5, 4, 1) = (\alpha^2, \alpha^9, \alpha^2, 1) \\
P_{1382} &= (5, 5, 4, 1) = (\alpha^9, \alpha^9, \alpha^2, 1) \\
P_{1383} &= (6, 5, 4, 1) = (\alpha^{13}, \alpha^9, \alpha^2, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1384} &= (7, 5, 4, 1) = (\alpha^7, \alpha^9, \alpha^2, 1) \\
P_{1385} &= (8, 5, 4, 1) = (\alpha^3, \alpha^9, \alpha^2, 1) \\
P_{1386} &= (9, 5, 4, 1) = (\alpha^4, \alpha^9, \alpha^2, 1) \\
P_{1387} &= (10, 5, 4, 1) = (\alpha^{10}, \alpha^9, \alpha^2, 1) \\
P_{1388} &= (11, 5, 4, 1) = (\alpha^5, \alpha^9, \alpha^2, 1) \\
P_{1389} &= (12, 5, 4, 1) = (\alpha^{14}, \alpha^9, \alpha^2, 1) \\
P_{1390} &= (13, 5, 4, 1) = (\alpha^{11}, \alpha^9, \alpha^2, 1) \\
P_{1391} &= (14, 5, 4, 1) = (\alpha^8, \alpha^9, \alpha^2, 1) \\
P_{1392} &= (15, 5, 4, 1) = (\alpha^6, \alpha^9, \alpha^2, 1) \\
P_{1393} &= (0, 6, 4, 1) = (0, \alpha^{13}, \alpha^2, 1) \\
P_{1394} &= (1, 6, 4, 1) = (1, \alpha^{13}, \alpha^2, 1) \\
P_{1395} &= (2, 6, 4, 1) = (\alpha, \alpha^{13}, \alpha^2, 1) \\
P_{1396} &= (3, 6, 4, 1) = (\alpha^{12}, \alpha^{13}, \alpha^2, 1) \\
P_{1397} &= (4, 6, 4, 1) = (\alpha^2, \alpha^{13}, \alpha^2, 1) \\
P_{1398} &= (5, 6, 4, 1) = (\alpha^9, \alpha^{13}, \alpha^2, 1) \\
P_{1399} &= (6, 6, 4, 1) = (\alpha^{13}, \alpha^{13}, \alpha^2, 1) \\
P_{1400} &= (7, 6, 4, 1) = (\alpha^7, \alpha^{13}, \alpha^2, 1) \\
P_{1401} &= (8, 6, 4, 1) = (\alpha^3, \alpha^{13}, \alpha^2, 1) \\
P_{1402} &= (9, 6, 4, 1) = (\alpha^4, \alpha^{13}, \alpha^2, 1) \\
P_{1403} &= (10, 6, 4, 1) = (\alpha^{10}, \alpha^{13}, \alpha^2, 1) \\
P_{1404} &= (11, 6, 4, 1) = (\alpha^5, \alpha^{13}, \alpha^2, 1) \\
P_{1405} &= (12, 6, 4, 1) = (\alpha^{14}, \alpha^{13}, \alpha^2, 1) \\
P_{1406} &= (13, 6, 4, 1) = (\alpha^{11}, \alpha^{13}, \alpha^2, 1) \\
P_{1407} &= (14, 6, 4, 1) = (\alpha^8, \alpha^{13}, \alpha^2, 1) \\
P_{1408} &= (15, 6, 4, 1) = (\alpha^6, \alpha^{13}, \alpha^2, 1) \\
P_{1409} &= (0, 7, 4, 1) = (0, \alpha^7, \alpha^2, 1) \\
P_{1410} &= (1, 7, 4, 1) = (1, \alpha^7, \alpha^2, 1) \\
P_{1411} &= (2, 7, 4, 1) = (\alpha, \alpha^7, \alpha^2, 1) \\
P_{1412} &= (3, 7, 4, 1) = (\alpha^{12}, \alpha^7, \alpha^2, 1) \\
P_{1413} &= (4, 7, 4, 1) = (\alpha^2, \alpha^7, \alpha^2, 1) \\
P_{1414} &= (5, 7, 4, 1) = (\alpha^9, \alpha^7, \alpha^2, 1) \\
P_{1415} &= (6, 7, 4, 1) = (\alpha^{13}, \alpha^7, \alpha^2, 1) \\
P_{1416} &= (7, 7, 4, 1) = (\alpha^7, \alpha^7, \alpha^2, 1) \\
P_{1417} &= (8, 7, 4, 1) = (\alpha^3, \alpha^7, \alpha^2, 1) \\
P_{1418} &= (9, 7, 4, 1) = (\alpha^4, \alpha^7, \alpha^2, 1) \\
P_{1419} &= (10, 7, 4, 1) = (\alpha^{10}, \alpha^7, \alpha^2, 1) \\
P_{1420} &= (11, 7, 4, 1) = (\alpha^5, \alpha^7, \alpha^2, 1) \\
P_{1421} &= (12, 7, 4, 1) = (\alpha^{14}, \alpha^7, \alpha^2, 1) \\
P_{1422} &= (13, 7, 4, 1) = (\alpha^{11}, \alpha^7, \alpha^2, 1) \\
P_{1423} &= (14, 7, 4, 1) = (\alpha^8, \alpha^7, \alpha^2, 1) \\
P_{1424} &= (15, 7, 4, 1) = (\alpha^6, \alpha^7, \alpha^2, 1) \\
P_{1425} &= (0, 8, 4, 1) = (0, \alpha^3, \alpha^2, 1) \\
P_{1426} &= (1, 8, 4, 1) = (1, \alpha^3, \alpha^2, 1) \\
P_{1427} &= (2, 8, 4, 1) = (\alpha, \alpha^3, \alpha^2, 1) \\
P_{1428} &= (3, 8, 4, 1) = (\alpha^{12}, \alpha^3, \alpha^2, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1429} &= (4, 8, 4, 1) = (\alpha^2, \alpha^3, \alpha^2, 1) \\
P_{1430} &= (5, 8, 4, 1) = (\alpha^9, \alpha^3, \alpha^2, 1) \\
P_{1431} &= (6, 8, 4, 1) = (\alpha^{13}, \alpha^3, \alpha^2, 1) \\
P_{1432} &= (7, 8, 4, 1) = (\alpha^7, \alpha^3, \alpha^2, 1) \\
P_{1433} &= (8, 8, 4, 1) = (\alpha^3, \alpha^3, \alpha^2, 1) \\
P_{1434} &= (9, 8, 4, 1) = (\alpha^4, \alpha^3, \alpha^2, 1) \\
P_{1435} &= (10, 8, 4, 1) = (\alpha^{10}, \alpha^3, \alpha^2, 1) \\
P_{1436} &= (11, 8, 4, 1) = (\alpha^5, \alpha^3, \alpha^2, 1) \\
P_{1437} &= (12, 8, 4, 1) = (\alpha^{14}, \alpha^3, \alpha^2, 1) \\
P_{1438} &= (13, 8, 4, 1) = (\alpha^{11}, \alpha^3, \alpha^2, 1) \\
P_{1439} &= (14, 8, 4, 1) = (\alpha^8, \alpha^3, \alpha^2, 1) \\
P_{1440} &= (15, 8, 4, 1) = (\alpha^6, \alpha^3, \alpha^2, 1) \\
P_{1441} &= (0, 9, 4, 1) = (0, \alpha^4, \alpha^2, 1) \\
P_{1442} &= (1, 9, 4, 1) = (1, \alpha^4, \alpha^2, 1) \\
P_{1443} &= (2, 9, 4, 1) = (\alpha, \alpha^4, \alpha^2, 1) \\
P_{1444} &= (3, 9, 4, 1) = (\alpha^{12}, \alpha^4, \alpha^2, 1) \\
P_{1445} &= (4, 9, 4, 1) = (\alpha^2, \alpha^4, \alpha^2, 1) \\
P_{1446} &= (5, 9, 4, 1) = (\alpha^9, \alpha^4, \alpha^2, 1) \\
P_{1447} &= (6, 9, 4, 1) = (\alpha^{13}, \alpha^4, \alpha^2, 1) \\
P_{1448} &= (7, 9, 4, 1) = (\alpha^7, \alpha^4, \alpha^2, 1) \\
P_{1449} &= (8, 9, 4, 1) = (\alpha^3, \alpha^4, \alpha^2, 1) \\
P_{1450} &= (9, 9, 4, 1) = (\alpha^4, \alpha^4, \alpha^2, 1) \\
P_{1451} &= (10, 9, 4, 1) = (\alpha^{10}, \alpha^4, \alpha^2, 1) \\
P_{1452} &= (11, 9, 4, 1) = (\alpha^5, \alpha^4, \alpha^2, 1) \\
P_{1453} &= (12, 9, 4, 1) = (\alpha^{14}, \alpha^4, \alpha^2, 1) \\
P_{1454} &= (13, 9, 4, 1) = (\alpha^{11}, \alpha^4, \alpha^2, 1) \\
P_{1455} &= (14, 9, 4, 1) = (\alpha^8, \alpha^4, \alpha^2, 1) \\
P_{1456} &= (15, 9, 4, 1) = (\alpha^6, \alpha^4, \alpha^2, 1) \\
P_{1457} &= (0, 10, 4, 1) = (0, \alpha^{10}, \alpha^2, 1) \\
P_{1458} &= (1, 10, 4, 1) = (1, \alpha^{10}, \alpha^2, 1) \\
P_{1459} &= (2, 10, 4, 1) = (\alpha, \alpha^{10}, \alpha^2, 1) \\
P_{1460} &= (3, 10, 4, 1) = (\alpha^{12}, \alpha^{10}, \alpha^2, 1) \\
P_{1461} &= (4, 10, 4, 1) = (\alpha^2, \alpha^{10}, \alpha^2, 1) \\
P_{1462} &= (5, 10, 4, 1) = (\alpha^9, \alpha^{10}, \alpha^2, 1) \\
P_{1463} &= (6, 10, 4, 1) = (\alpha^{13}, \alpha^{10}, \alpha^2, 1) \\
P_{1464} &= (7, 10, 4, 1) = (\alpha^7, \alpha^{10}, \alpha^2, 1) \\
P_{1465} &= (8, 10, 4, 1) = (\alpha^3, \alpha^{10}, \alpha^2, 1) \\
P_{1466} &= (9, 10, 4, 1) = (\alpha^4, \alpha^{10}, \alpha^2, 1) \\
P_{1467} &= (10, 10, 4, 1) = (\alpha^{10}, \alpha^{10}, \alpha^2, 1) \\
P_{1468} &= (11, 10, 4, 1) = (\alpha^5, \alpha^{10}, \alpha^2, 1) \\
P_{1469} &= (12, 10, 4, 1) = (\alpha^{14}, \alpha^{10}, \alpha^2, 1) \\
P_{1470} &= (13, 10, 4, 1) = (\alpha^{11}, \alpha^{10}, \alpha^2, 1) \\
P_{1471} &= (14, 10, 4, 1) = (\alpha^8, \alpha^{10}, \alpha^2, 1) \\
P_{1472} &= (15, 10, 4, 1) = (\alpha^6, \alpha^{10}, \alpha^2, 1) \\
P_{1473} &= (0, 11, 4, 1) = (0, \alpha^5, \alpha^2, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1474} &= (1, 11, 4, 1) = (1, \alpha^5, \alpha^2, 1) \\
P_{1475} &= (2, 11, 4, 1) = (\alpha, \alpha^5, \alpha^2, 1) \\
P_{1476} &= (3, 11, 4, 1) = (\alpha^{12}, \alpha^5, \alpha^2, 1) \\
P_{1477} &= (4, 11, 4, 1) = (\alpha^2, \alpha^5, \alpha^2, 1) \\
P_{1478} &= (5, 11, 4, 1) = (\alpha^9, \alpha^5, \alpha^2, 1) \\
P_{1479} &= (6, 11, 4, 1) = (\alpha^{13}, \alpha^5, \alpha^2, 1) \\
P_{1480} &= (7, 11, 4, 1) = (\alpha^7, \alpha^5, \alpha^2, 1) \\
P_{1481} &= (8, 11, 4, 1) = (\alpha^3, \alpha^5, \alpha^2, 1) \\
P_{1482} &= (9, 11, 4, 1) = (\alpha^4, \alpha^5, \alpha^2, 1) \\
P_{1483} &= (10, 11, 4, 1) = (\alpha^{10}, \alpha^5, \alpha^2, 1) \\
P_{1484} &= (11, 11, 4, 1) = (\alpha^5, \alpha^5, \alpha^2, 1) \\
P_{1485} &= (12, 11, 4, 1) = (\alpha^{14}, \alpha^5, \alpha^2, 1) \\
P_{1486} &= (13, 11, 4, 1) = (\alpha^{11}, \alpha^5, \alpha^2, 1) \\
P_{1487} &= (14, 11, 4, 1) = (\alpha^8, \alpha^5, \alpha^2, 1) \\
P_{1488} &= (15, 11, 4, 1) = (\alpha^6, \alpha^5, \alpha^2, 1) \\
P_{1489} &= (0, 12, 4, 1) = (0, \alpha^{14}, \alpha^2, 1) \\
P_{1490} &= (1, 12, 4, 1) = (1, \alpha^{14}, \alpha^2, 1) \\
P_{1491} &= (2, 12, 4, 1) = (\alpha, \alpha^{14}, \alpha^2, 1) \\
P_{1492} &= (3, 12, 4, 1) = (\alpha^{12}, \alpha^{14}, \alpha^2, 1) \\
P_{1493} &= (4, 12, 4, 1) = (\alpha^2, \alpha^{14}, \alpha^2, 1) \\
P_{1494} &= (5, 12, 4, 1) = (\alpha^9, \alpha^{14}, \alpha^2, 1) \\
P_{1495} &= (6, 12, 4, 1) = (\alpha^{13}, \alpha^{14}, \alpha^2, 1) \\
P_{1496} &= (7, 12, 4, 1) = (\alpha^7, \alpha^{14}, \alpha^2, 1) \\
P_{1497} &= (8, 12, 4, 1) = (\alpha^3, \alpha^{14}, \alpha^2, 1) \\
P_{1498} &= (9, 12, 4, 1) = (\alpha^4, \alpha^{14}, \alpha^2, 1) \\
P_{1499} &= (10, 12, 4, 1) = (\alpha^{10}, \alpha^{14}, \alpha^2, 1) \\
P_{1500} &= (11, 12, 4, 1) = (\alpha^5, \alpha^{14}, \alpha^2, 1) \\
P_{1501} &= (12, 12, 4, 1) = (\alpha^{14}, \alpha^{14}, \alpha^2, 1) \\
P_{1502} &= (13, 12, 4, 1) = (\alpha^{11}, \alpha^{14}, \alpha^2, 1) \\
P_{1503} &= (14, 12, 4, 1) = (\alpha^8, \alpha^{14}, \alpha^2, 1) \\
P_{1504} &= (15, 12, 4, 1) = (\alpha^6, \alpha^{14}, \alpha^2, 1) \\
P_{1505} &= (0, 13, 4, 1) = (0, \alpha^{11}, \alpha^2, 1) \\
P_{1506} &= (1, 13, 4, 1) = (1, \alpha^{11}, \alpha^2, 1) \\
P_{1507} &= (2, 13, 4, 1) = (\alpha, \alpha^{11}, \alpha^2, 1) \\
P_{1508} &= (3, 13, 4, 1) = (\alpha^{12}, \alpha^{11}, \alpha^2, 1) \\
P_{1509} &= (4, 13, 4, 1) = (\alpha^2, \alpha^{11}, \alpha^2, 1) \\
P_{1510} &= (5, 13, 4, 1) = (\alpha^9, \alpha^{11}, \alpha^2, 1) \\
P_{1511} &= (6, 13, 4, 1) = (\alpha^{13}, \alpha^{11}, \alpha^2, 1) \\
P_{1512} &= (7, 13, 4, 1) = (\alpha^7, \alpha^{11}, \alpha^2, 1) \\
P_{1513} &= (8, 13, 4, 1) = (\alpha^3, \alpha^{11}, \alpha^2, 1) \\
P_{1514} &= (9, 13, 4, 1) = (\alpha^4, \alpha^{11}, \alpha^2, 1) \\
P_{1515} &= (10, 13, 4, 1) = (\alpha^{10}, \alpha^{11}, \alpha^2, 1) \\
P_{1516} &= (11, 13, 4, 1) = (\alpha^5, \alpha^{11}, \alpha^2, 1) \\
P_{1517} &= (12, 13, 4, 1) = (\alpha^{14}, \alpha^{11}, \alpha^2, 1) \\
P_{1518} &= (13, 13, 4, 1) = (\alpha^{11}, \alpha^{11}, \alpha^2, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1519} &= (14, 13, 4, 1) = (\alpha^8, \alpha^{11}, \alpha^2, 1) \\
P_{1520} &= (15, 13, 4, 1) = (\alpha^6, \alpha^{11}, \alpha^2, 1) \\
P_{1521} &= (0, 14, 4, 1) = (0, \alpha^8, \alpha^2, 1) \\
P_{1522} &= (1, 14, 4, 1) = (1, \alpha^8, \alpha^2, 1) \\
P_{1523} &= (2, 14, 4, 1) = (\alpha, \alpha^8, \alpha^2, 1) \\
P_{1524} &= (3, 14, 4, 1) = (\alpha^{12}, \alpha^8, \alpha^2, 1) \\
P_{1525} &= (4, 14, 4, 1) = (\alpha^2, \alpha^8, \alpha^2, 1) \\
P_{1526} &= (5, 14, 4, 1) = (\alpha^9, \alpha^8, \alpha^2, 1) \\
P_{1527} &= (6, 14, 4, 1) = (\alpha^{13}, \alpha^8, \alpha^2, 1) \\
P_{1528} &= (7, 14, 4, 1) = (\alpha^7, \alpha^8, \alpha^2, 1) \\
P_{1529} &= (8, 14, 4, 1) = (\alpha^3, \alpha^8, \alpha^2, 1) \\
P_{1530} &= (9, 14, 4, 1) = (\alpha^4, \alpha^8, \alpha^2, 1) \\
P_{1531} &= (10, 14, 4, 1) = (\alpha^{10}, \alpha^8, \alpha^2, 1) \\
P_{1532} &= (11, 14, 4, 1) = (\alpha^5, \alpha^8, \alpha^2, 1) \\
P_{1533} &= (12, 14, 4, 1) = (\alpha^{14}, \alpha^8, \alpha^2, 1) \\
P_{1534} &= (13, 14, 4, 1) = (\alpha^{11}, \alpha^8, \alpha^2, 1) \\
P_{1535} &= (14, 14, 4, 1) = (\alpha^8, \alpha^8, \alpha^2, 1) \\
P_{1536} &= (15, 14, 4, 1) = (\alpha^6, \alpha^8, \alpha^2, 1) \\
P_{1537} &= (0, 15, 4, 1) = (0, \alpha^6, \alpha^2, 1) \\
P_{1538} &= (1, 15, 4, 1) = (1, \alpha^6, \alpha^2, 1) \\
P_{1539} &= (2, 15, 4, 1) = (\alpha, \alpha^6, \alpha^2, 1) \\
P_{1540} &= (3, 15, 4, 1) = (\alpha^{12}, \alpha^6, \alpha^2, 1) \\
P_{1541} &= (4, 15, 4, 1) = (\alpha^2, \alpha^6, \alpha^2, 1) \\
P_{1542} &= (5, 15, 4, 1) = (\alpha^9, \alpha^6, \alpha^2, 1) \\
P_{1543} &= (6, 15, 4, 1) = (\alpha^{13}, \alpha^6, \alpha^2, 1) \\
P_{1544} &= (7, 15, 4, 1) = (\alpha^7, \alpha^6, \alpha^2, 1) \\
P_{1545} &= (8, 15, 4, 1) = (\alpha^3, \alpha^6, \alpha^2, 1) \\
P_{1546} &= (9, 15, 4, 1) = (\alpha^4, \alpha^6, \alpha^2, 1) \\
P_{1547} &= (10, 15, 4, 1) = (\alpha^{10}, \alpha^6, \alpha^2, 1) \\
P_{1548} &= (11, 15, 4, 1) = (\alpha^5, \alpha^6, \alpha^2, 1) \\
P_{1549} &= (12, 15, 4, 1) = (\alpha^{14}, \alpha^6, \alpha^2, 1) \\
P_{1550} &= (13, 15, 4, 1) = (\alpha^{11}, \alpha^6, \alpha^2, 1) \\
P_{1551} &= (14, 15, 4, 1) = (\alpha^8, \alpha^6, \alpha^2, 1) \\
P_{1552} &= (15, 15, 4, 1) = (\alpha^6, \alpha^6, \alpha^2, 1) \\
P_{1553} &= (0, 0, 5, 1) = (0, 0, \alpha^9, 1) \\
P_{1554} &= (1, 0, 5, 1) = (1, 0, \alpha^9, 1) \\
P_{1555} &= (2, 0, 5, 1) = (\alpha, 0, \alpha^9, 1) \\
P_{1556} &= (3, 0, 5, 1) = (\alpha^{12}, 0, \alpha^9, 1) \\
P_{1557} &= (4, 0, 5, 1) = (\alpha^2, 0, \alpha^9, 1) \\
P_{1558} &= (5, 0, 5, 1) = (\alpha^9, 0, \alpha^9, 1) \\
P_{1559} &= (6, 0, 5, 1) = (\alpha^{13}, 0, \alpha^9, 1) \\
P_{1560} &= (7, 0, 5, 1) = (\alpha^7, 0, \alpha^9, 1) \\
P_{1561} &= (8, 0, 5, 1) = (\alpha^3, 0, \alpha^9, 1) \\
P_{1562} &= (9, 0, 5, 1) = (\alpha^4, 0, \alpha^9, 1) \\
P_{1563} &= (10, 0, 5, 1) = (\alpha^{10}, 0, \alpha^9, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1564} &= (11, 0, 5, 1) = (\alpha^5, 0, \alpha^9, 1) \\
P_{1565} &= (12, 0, 5, 1) = (\alpha^{14}, 0, \alpha^9, 1) \\
P_{1566} &= (13, 0, 5, 1) = (\alpha^{11}, 0, \alpha^9, 1) \\
P_{1567} &= (14, 0, 5, 1) = (\alpha^8, 0, \alpha^9, 1) \\
P_{1568} &= (15, 0, 5, 1) = (\alpha^6, 0, \alpha^9, 1) \\
P_{1569} &= (0, 1, 5, 1) = (0, 1, \alpha^9, 1) \\
P_{1570} &= (1, 1, 5, 1) = (1, 1, \alpha^9, 1) \\
P_{1571} &= (2, 1, 5, 1) = (\alpha, 1, \alpha^9, 1) \\
P_{1572} &= (3, 1, 5, 1) = (\alpha^{12}, 1, \alpha^9, 1) \\
P_{1573} &= (4, 1, 5, 1) = (\alpha^2, 1, \alpha^9, 1) \\
P_{1574} &= (5, 1, 5, 1) = (\alpha^9, 1, \alpha^9, 1) \\
P_{1575} &= (6, 1, 5, 1) = (\alpha^{13}, 1, \alpha^9, 1) \\
P_{1576} &= (7, 1, 5, 1) = (\alpha^7, 1, \alpha^9, 1) \\
P_{1577} &= (8, 1, 5, 1) = (\alpha^3, 1, \alpha^9, 1) \\
P_{1578} &= (9, 1, 5, 1) = (\alpha^4, 1, \alpha^9, 1) \\
P_{1579} &= (10, 1, 5, 1) = (\alpha^{10}, 1, \alpha^9, 1) \\
P_{1580} &= (11, 1, 5, 1) = (\alpha^5, 1, \alpha^9, 1) \\
P_{1581} &= (12, 1, 5, 1) = (\alpha^{14}, 1, \alpha^9, 1) \\
P_{1582} &= (13, 1, 5, 1) = (\alpha^{11}, 1, \alpha^9, 1) \\
P_{1583} &= (14, 1, 5, 1) = (\alpha^8, 1, \alpha^9, 1) \\
P_{1584} &= (15, 1, 5, 1) = (\alpha^6, 1, \alpha^9, 1) \\
P_{1585} &= (0, 2, 5, 1) = (0, \alpha, \alpha^9, 1) \\
P_{1586} &= (1, 2, 5, 1) = (1, \alpha, \alpha^9, 1) \\
P_{1587} &= (2, 2, 5, 1) = (\alpha, \alpha, \alpha^9, 1) \\
P_{1588} &= (3, 2, 5, 1) = (\alpha^{12}, \alpha, \alpha^9, 1) \\
P_{1589} &= (4, 2, 5, 1) = (\alpha^2, \alpha, \alpha^9, 1) \\
P_{1590} &= (5, 2, 5, 1) = (\alpha^9, \alpha, \alpha^9, 1) \\
P_{1591} &= (6, 2, 5, 1) = (\alpha^{13}, \alpha, \alpha^9, 1) \\
P_{1592} &= (7, 2, 5, 1) = (\alpha^7, \alpha, \alpha^9, 1) \\
P_{1593} &= (8, 2, 5, 1) = (\alpha^3, \alpha, \alpha^9, 1) \\
P_{1594} &= (9, 2, 5, 1) = (\alpha^4, \alpha, \alpha^9, 1) \\
P_{1595} &= (10, 2, 5, 1) = (\alpha^{10}, \alpha, \alpha^9, 1) \\
P_{1596} &= (11, 2, 5, 1) = (\alpha^5, \alpha, \alpha^9, 1) \\
P_{1597} &= (12, 2, 5, 1) = (\alpha^{14}, \alpha, \alpha^9, 1) \\
P_{1598} &= (13, 2, 5, 1) = (\alpha^{11}, \alpha, \alpha^9, 1) \\
P_{1599} &= (14, 2, 5, 1) = (\alpha^8, \alpha, \alpha^9, 1) \\
P_{1600} &= (15, 2, 5, 1) = (\alpha^6, \alpha, \alpha^9, 1) \\
P_{1601} &= (0, 3, 5, 1) = (0, \alpha^{12}, \alpha^9, 1) \\
P_{1602} &= (1, 3, 5, 1) = (1, \alpha^{12}, \alpha^9, 1) \\
P_{1603} &= (2, 3, 5, 1) = (\alpha, \alpha^{12}, \alpha^9, 1) \\
P_{1604} &= (3, 3, 5, 1) = (\alpha^{12}, \alpha^{12}, \alpha^9, 1) \\
P_{1605} &= (4, 3, 5, 1) = (\alpha^2, \alpha^{12}, \alpha^9, 1) \\
P_{1606} &= (5, 3, 5, 1) = (\alpha^9, \alpha^{12}, \alpha^9, 1) \\
P_{1607} &= (6, 3, 5, 1) = (\alpha^{13}, \alpha^{12}, \alpha^9, 1) \\
P_{1608} &= (7, 3, 5, 1) = (\alpha^7, \alpha^{12}, \alpha^9, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1609} &= (8, 3, 5, 1) = (\alpha^3, \alpha^{12}, \alpha^9, 1) \\
P_{1610} &= (9, 3, 5, 1) = (\alpha^4, \alpha^{12}, \alpha^9, 1) \\
P_{1611} &= (10, 3, 5, 1) = (\alpha^{10}, \alpha^{12}, \alpha^9, 1) \\
P_{1612} &= (11, 3, 5, 1) = (\alpha^5, \alpha^{12}, \alpha^9, 1) \\
P_{1613} &= (12, 3, 5, 1) = (\alpha^{14}, \alpha^{12}, \alpha^9, 1) \\
P_{1614} &= (13, 3, 5, 1) = (\alpha^{11}, \alpha^{12}, \alpha^9, 1) \\
P_{1615} &= (14, 3, 5, 1) = (\alpha^8, \alpha^{12}, \alpha^9, 1) \\
P_{1616} &= (15, 3, 5, 1) = (\alpha^6, \alpha^{12}, \alpha^9, 1) \\
P_{1617} &= (0, 4, 5, 1) = (0, \alpha^2, \alpha^9, 1) \\
P_{1618} &= (1, 4, 5, 1) = (1, \alpha^2, \alpha^9, 1) \\
P_{1619} &= (2, 4, 5, 1) = (\alpha, \alpha^2, \alpha^9, 1) \\
P_{1620} &= (3, 4, 5, 1) = (\alpha^{12}, \alpha^2, \alpha^9, 1) \\
P_{1621} &= (4, 4, 5, 1) = (\alpha^2, \alpha^2, \alpha^9, 1) \\
P_{1622} &= (5, 4, 5, 1) = (\alpha^9, \alpha^2, \alpha^9, 1) \\
P_{1623} &= (6, 4, 5, 1) = (\alpha^{13}, \alpha^2, \alpha^9, 1) \\
P_{1624} &= (7, 4, 5, 1) = (\alpha^7, \alpha^2, \alpha^9, 1) \\
P_{1625} &= (8, 4, 5, 1) = (\alpha^3, \alpha^2, \alpha^9, 1) \\
P_{1626} &= (9, 4, 5, 1) = (\alpha^4, \alpha^2, \alpha^9, 1) \\
P_{1627} &= (10, 4, 5, 1) = (\alpha^{10}, \alpha^2, \alpha^9, 1) \\
P_{1628} &= (11, 4, 5, 1) = (\alpha^5, \alpha^2, \alpha^9, 1) \\
P_{1629} &= (12, 4, 5, 1) = (\alpha^{14}, \alpha^2, \alpha^9, 1) \\
P_{1630} &= (13, 4, 5, 1) = (\alpha^{11}, \alpha^2, \alpha^9, 1) \\
P_{1631} &= (14, 4, 5, 1) = (\alpha^8, \alpha^2, \alpha^9, 1) \\
P_{1632} &= (15, 4, 5, 1) = (\alpha^6, \alpha^2, \alpha^9, 1) \\
P_{1633} &= (0, 5, 5, 1) = (0, \alpha^9, \alpha^9, 1) \\
P_{1634} &= (1, 5, 5, 1) = (1, \alpha^9, \alpha^9, 1) \\
P_{1635} &= (2, 5, 5, 1) = (\alpha, \alpha^9, \alpha^9, 1) \\
P_{1636} &= (3, 5, 5, 1) = (\alpha^{12}, \alpha^9, \alpha^9, 1) \\
P_{1637} &= (4, 5, 5, 1) = (\alpha^2, \alpha^9, \alpha^9, 1) \\
P_{1638} &= (5, 5, 5, 1) = (\alpha^9, \alpha^9, \alpha^9, 1) \\
P_{1639} &= (6, 5, 5, 1) = (\alpha^{13}, \alpha^9, \alpha^9, 1) \\
P_{1640} &= (7, 5, 5, 1) = (\alpha^7, \alpha^9, \alpha^9, 1) \\
P_{1641} &= (8, 5, 5, 1) = (\alpha^3, \alpha^9, \alpha^9, 1) \\
P_{1642} &= (9, 5, 5, 1) = (\alpha^4, \alpha^9, \alpha^9, 1) \\
P_{1643} &= (10, 5, 5, 1) = (\alpha^{10}, \alpha^9, \alpha^9, 1) \\
P_{1644} &= (11, 5, 5, 1) = (\alpha^5, \alpha^9, \alpha^9, 1) \\
P_{1645} &= (12, 5, 5, 1) = (\alpha^{14}, \alpha^9, \alpha^9, 1) \\
P_{1646} &= (13, 5, 5, 1) = (\alpha^{11}, \alpha^9, \alpha^9, 1) \\
P_{1647} &= (14, 5, 5, 1) = (\alpha^8, \alpha^9, \alpha^9, 1) \\
P_{1648} &= (15, 5, 5, 1) = (\alpha^6, \alpha^9, \alpha^9, 1) \\
P_{1649} &= (0, 6, 5, 1) = (0, \alpha^{13}, \alpha^9, 1) \\
P_{1650} &= (1, 6, 5, 1) = (1, \alpha^{13}, \alpha^9, 1) \\
P_{1651} &= (2, 6, 5, 1) = (\alpha, \alpha^{13}, \alpha^9, 1) \\
P_{1652} &= (3, 6, 5, 1) = (\alpha^{12}, \alpha^{13}, \alpha^9, 1) \\
P_{1653} &= (4, 6, 5, 1) = (\alpha^2, \alpha^{13}, \alpha^9, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1654} &= (5, 6, 5, 1) = (\alpha^9, \alpha^{13}, \alpha^9, 1) \\
P_{1655} &= (6, 6, 5, 1) = (\alpha^{13}, \alpha^{13}, \alpha^9, 1) \\
P_{1656} &= (7, 6, 5, 1) = (\alpha^7, \alpha^{13}, \alpha^9, 1) \\
P_{1657} &= (8, 6, 5, 1) = (\alpha^3, \alpha^{13}, \alpha^9, 1) \\
P_{1658} &= (9, 6, 5, 1) = (\alpha^4, \alpha^{13}, \alpha^9, 1) \\
P_{1659} &= (10, 6, 5, 1) = (\alpha^{10}, \alpha^{13}, \alpha^9, 1) \\
P_{1660} &= (11, 6, 5, 1) = (\alpha^5, \alpha^{13}, \alpha^9, 1) \\
P_{1661} &= (12, 6, 5, 1) = (\alpha^{14}, \alpha^{13}, \alpha^9, 1) \\
P_{1662} &= (13, 6, 5, 1) = (\alpha^{11}, \alpha^{13}, \alpha^9, 1) \\
P_{1663} &= (14, 6, 5, 1) = (\alpha^8, \alpha^{13}, \alpha^9, 1) \\
P_{1664} &= (15, 6, 5, 1) = (\alpha^6, \alpha^{13}, \alpha^9, 1) \\
P_{1665} &= (0, 7, 5, 1) = (0, \alpha^7, \alpha^9, 1) \\
P_{1666} &= (1, 7, 5, 1) = (1, \alpha^7, \alpha^9, 1) \\
P_{1667} &= (2, 7, 5, 1) = (\alpha, \alpha^7, \alpha^9, 1) \\
P_{1668} &= (3, 7, 5, 1) = (\alpha^{12}, \alpha^7, \alpha^9, 1) \\
P_{1669} &= (4, 7, 5, 1) = (\alpha^2, \alpha^7, \alpha^9, 1) \\
P_{1670} &= (5, 7, 5, 1) = (\alpha^9, \alpha^7, \alpha^9, 1) \\
P_{1671} &= (6, 7, 5, 1) = (\alpha^{13}, \alpha^7, \alpha^9, 1) \\
P_{1672} &= (7, 7, 5, 1) = (\alpha^7, \alpha^7, \alpha^9, 1) \\
P_{1673} &= (8, 7, 5, 1) = (\alpha^3, \alpha^7, \alpha^9, 1) \\
P_{1674} &= (9, 7, 5, 1) = (\alpha^4, \alpha^7, \alpha^9, 1) \\
P_{1675} &= (10, 7, 5, 1) = (\alpha^{10}, \alpha^7, \alpha^9, 1) \\
P_{1676} &= (11, 7, 5, 1) = (\alpha^5, \alpha^7, \alpha^9, 1) \\
P_{1677} &= (12, 7, 5, 1) = (\alpha^{14}, \alpha^7, \alpha^9, 1) \\
P_{1678} &= (13, 7, 5, 1) = (\alpha^{11}, \alpha^7, \alpha^9, 1) \\
P_{1679} &= (14, 7, 5, 1) = (\alpha^8, \alpha^7, \alpha^9, 1) \\
P_{1680} &= (15, 7, 5, 1) = (\alpha^6, \alpha^7, \alpha^9, 1) \\
P_{1681} &= (0, 8, 5, 1) = (0, \alpha^3, \alpha^9, 1) \\
P_{1682} &= (1, 8, 5, 1) = (1, \alpha^3, \alpha^9, 1) \\
P_{1683} &= (2, 8, 5, 1) = (\alpha, \alpha^3, \alpha^9, 1) \\
P_{1684} &= (3, 8, 5, 1) = (\alpha^{12}, \alpha^3, \alpha^9, 1) \\
P_{1685} &= (4, 8, 5, 1) = (\alpha^2, \alpha^3, \alpha^9, 1) \\
P_{1686} &= (5, 8, 5, 1) = (\alpha^9, \alpha^3, \alpha^9, 1) \\
P_{1687} &= (6, 8, 5, 1) = (\alpha^{13}, \alpha^3, \alpha^9, 1) \\
P_{1688} &= (7, 8, 5, 1) = (\alpha^7, \alpha^3, \alpha^9, 1) \\
P_{1689} &= (8, 8, 5, 1) = (\alpha^3, \alpha^3, \alpha^9, 1) \\
P_{1690} &= (9, 8, 5, 1) = (\alpha^4, \alpha^3, \alpha^9, 1) \\
P_{1691} &= (10, 8, 5, 1) = (\alpha^{10}, \alpha^3, \alpha^9, 1) \\
P_{1692} &= (11, 8, 5, 1) = (\alpha^5, \alpha^3, \alpha^9, 1) \\
P_{1693} &= (12, 8, 5, 1) = (\alpha^{14}, \alpha^3, \alpha^9, 1) \\
P_{1694} &= (13, 8, 5, 1) = (\alpha^{11}, \alpha^3, \alpha^9, 1) \\
P_{1695} &= (14, 8, 5, 1) = (\alpha^8, \alpha^3, \alpha^9, 1) \\
P_{1696} &= (15, 8, 5, 1) = (\alpha^6, \alpha^3, \alpha^9, 1) \\
P_{1697} &= (0, 9, 5, 1) = (0, \alpha^4, \alpha^9, 1) \\
P_{1698} &= (1, 9, 5, 1) = (1, \alpha^4, \alpha^9, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1699} &= (2, 9, 5, 1) = (\alpha, \alpha^4, \alpha^9, 1) \\
P_{1700} &= (3, 9, 5, 1) = (\alpha^{12}, \alpha^4, \alpha^9, 1) \\
P_{1701} &= (4, 9, 5, 1) = (\alpha^2, \alpha^4, \alpha^9, 1) \\
P_{1702} &= (5, 9, 5, 1) = (\alpha^9, \alpha^4, \alpha^9, 1) \\
P_{1703} &= (6, 9, 5, 1) = (\alpha^{13}, \alpha^4, \alpha^9, 1) \\
P_{1704} &= (7, 9, 5, 1) = (\alpha^7, \alpha^4, \alpha^9, 1) \\
P_{1705} &= (8, 9, 5, 1) = (\alpha^3, \alpha^4, \alpha^9, 1) \\
P_{1706} &= (9, 9, 5, 1) = (\alpha^4, \alpha^4, \alpha^9, 1) \\
P_{1707} &= (10, 9, 5, 1) = (\alpha^{10}, \alpha^4, \alpha^9, 1) \\
P_{1708} &= (11, 9, 5, 1) = (\alpha^5, \alpha^4, \alpha^9, 1) \\
P_{1709} &= (12, 9, 5, 1) = (\alpha^{14}, \alpha^4, \alpha^9, 1) \\
P_{1710} &= (13, 9, 5, 1) = (\alpha^{11}, \alpha^4, \alpha^9, 1) \\
P_{1711} &= (14, 9, 5, 1) = (\alpha^8, \alpha^4, \alpha^9, 1) \\
P_{1712} &= (15, 9, 5, 1) = (\alpha^6, \alpha^4, \alpha^9, 1) \\
P_{1713} &= (0, 10, 5, 1) = (0, \alpha^{10}, \alpha^9, 1) \\
P_{1714} &= (1, 10, 5, 1) = (1, \alpha^{10}, \alpha^9, 1) \\
P_{1715} &= (2, 10, 5, 1) = (\alpha, \alpha^{10}, \alpha^9, 1) \\
P_{1716} &= (3, 10, 5, 1) = (\alpha^{12}, \alpha^{10}, \alpha^9, 1) \\
P_{1717} &= (4, 10, 5, 1) = (\alpha^2, \alpha^{10}, \alpha^9, 1) \\
P_{1718} &= (5, 10, 5, 1) = (\alpha^9, \alpha^{10}, \alpha^9, 1) \\
P_{1719} &= (6, 10, 5, 1) = (\alpha^{13}, \alpha^{10}, \alpha^9, 1) \\
P_{1720} &= (7, 10, 5, 1) = (\alpha^7, \alpha^{10}, \alpha^9, 1) \\
P_{1721} &= (8, 10, 5, 1) = (\alpha^3, \alpha^{10}, \alpha^9, 1) \\
P_{1722} &= (9, 10, 5, 1) = (\alpha^4, \alpha^{10}, \alpha^9, 1) \\
P_{1723} &= (10, 10, 5, 1) = (\alpha^{10}, \alpha^{10}, \alpha^9, 1) \\
P_{1724} &= (11, 10, 5, 1) = (\alpha^5, \alpha^{10}, \alpha^9, 1) \\
P_{1725} &= (12, 10, 5, 1) = (\alpha^{14}, \alpha^{10}, \alpha^9, 1) \\
P_{1726} &= (13, 10, 5, 1) = (\alpha^{11}, \alpha^{10}, \alpha^9, 1) \\
P_{1727} &= (14, 10, 5, 1) = (\alpha^8, \alpha^{10}, \alpha^9, 1) \\
P_{1728} &= (15, 10, 5, 1) = (\alpha^6, \alpha^{10}, \alpha^9, 1) \\
P_{1729} &= (0, 11, 5, 1) = (0, \alpha^5, \alpha^9, 1) \\
P_{1730} &= (1, 11, 5, 1) = (1, \alpha^5, \alpha^9, 1) \\
P_{1731} &= (2, 11, 5, 1) = (\alpha, \alpha^5, \alpha^9, 1) \\
P_{1732} &= (3, 11, 5, 1) = (\alpha^{12}, \alpha^5, \alpha^9, 1) \\
P_{1733} &= (4, 11, 5, 1) = (\alpha^2, \alpha^5, \alpha^9, 1) \\
P_{1734} &= (5, 11, 5, 1) = (\alpha^9, \alpha^5, \alpha^9, 1) \\
P_{1735} &= (6, 11, 5, 1) = (\alpha^{13}, \alpha^5, \alpha^9, 1) \\
P_{1736} &= (7, 11, 5, 1) = (\alpha^7, \alpha^5, \alpha^9, 1) \\
P_{1737} &= (8, 11, 5, 1) = (\alpha^3, \alpha^5, \alpha^9, 1) \\
P_{1738} &= (9, 11, 5, 1) = (\alpha^4, \alpha^5, \alpha^9, 1) \\
P_{1739} &= (10, 11, 5, 1) = (\alpha^{10}, \alpha^5, \alpha^9, 1) \\
P_{1740} &= (11, 11, 5, 1) = (\alpha^5, \alpha^5, \alpha^9, 1) \\
P_{1741} &= (12, 11, 5, 1) = (\alpha^{14}, \alpha^5, \alpha^9, 1) \\
P_{1742} &= (13, 11, 5, 1) = (\alpha^{11}, \alpha^5, \alpha^9, 1) \\
P_{1743} &= (14, 11, 5, 1) = (\alpha^8, \alpha^5, \alpha^9, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1744} &= (15, 11, 5, 1) = (\alpha^6, \alpha^5, \alpha^9, 1) \\
P_{1745} &= (0, 12, 5, 1) = (0, \alpha^{14}, \alpha^9, 1) \\
P_{1746} &= (1, 12, 5, 1) = (1, \alpha^{14}, \alpha^9, 1) \\
P_{1747} &= (2, 12, 5, 1) = (\alpha, \alpha^{14}, \alpha^9, 1) \\
P_{1748} &= (3, 12, 5, 1) = (\alpha^{12}, \alpha^{14}, \alpha^9, 1) \\
P_{1749} &= (4, 12, 5, 1) = (\alpha^2, \alpha^{14}, \alpha^9, 1) \\
P_{1750} &= (5, 12, 5, 1) = (\alpha^9, \alpha^{14}, \alpha^9, 1) \\
P_{1751} &= (6, 12, 5, 1) = (\alpha^{13}, \alpha^{14}, \alpha^9, 1) \\
P_{1752} &= (7, 12, 5, 1) = (\alpha^7, \alpha^{14}, \alpha^9, 1) \\
P_{1753} &= (8, 12, 5, 1) = (\alpha^3, \alpha^{14}, \alpha^9, 1) \\
P_{1754} &= (9, 12, 5, 1) = (\alpha^4, \alpha^{14}, \alpha^9, 1) \\
P_{1755} &= (10, 12, 5, 1) = (\alpha^{10}, \alpha^{14}, \alpha^9, 1) \\
P_{1756} &= (11, 12, 5, 1) = (\alpha^5, \alpha^{14}, \alpha^9, 1) \\
P_{1757} &= (12, 12, 5, 1) = (\alpha^{14}, \alpha^{14}, \alpha^9, 1) \\
P_{1758} &= (13, 12, 5, 1) = (\alpha^{11}, \alpha^{14}, \alpha^9, 1) \\
P_{1759} &= (14, 12, 5, 1) = (\alpha^8, \alpha^{14}, \alpha^9, 1) \\
P_{1760} &= (15, 12, 5, 1) = (\alpha^6, \alpha^{14}, \alpha^9, 1) \\
P_{1761} &= (0, 13, 5, 1) = (0, \alpha^{11}, \alpha^9, 1) \\
P_{1762} &= (1, 13, 5, 1) = (1, \alpha^{11}, \alpha^9, 1) \\
P_{1763} &= (2, 13, 5, 1) = (\alpha, \alpha^{11}, \alpha^9, 1) \\
P_{1764} &= (3, 13, 5, 1) = (\alpha^{12}, \alpha^{11}, \alpha^9, 1) \\
P_{1765} &= (4, 13, 5, 1) = (\alpha^2, \alpha^{11}, \alpha^9, 1) \\
P_{1766} &= (5, 13, 5, 1) = (\alpha^9, \alpha^{11}, \alpha^9, 1) \\
P_{1767} &= (6, 13, 5, 1) = (\alpha^{13}, \alpha^{11}, \alpha^9, 1) \\
P_{1768} &= (7, 13, 5, 1) = (\alpha^7, \alpha^{11}, \alpha^9, 1) \\
P_{1769} &= (8, 13, 5, 1) = (\alpha^3, \alpha^{11}, \alpha^9, 1) \\
P_{1770} &= (9, 13, 5, 1) = (\alpha^4, \alpha^{11}, \alpha^9, 1) \\
P_{1771} &= (10, 13, 5, 1) = (\alpha^{10}, \alpha^{11}, \alpha^9, 1) \\
P_{1772} &= (11, 13, 5, 1) = (\alpha^5, \alpha^{11}, \alpha^9, 1) \\
P_{1773} &= (12, 13, 5, 1) = (\alpha^{14}, \alpha^{11}, \alpha^9, 1) \\
P_{1774} &= (13, 13, 5, 1) = (\alpha^{11}, \alpha^{11}, \alpha^9, 1) \\
P_{1775} &= (14, 13, 5, 1) = (\alpha^8, \alpha^{11}, \alpha^9, 1) \\
P_{1776} &= (15, 13, 5, 1) = (\alpha^6, \alpha^{11}, \alpha^9, 1) \\
P_{1777} &= (0, 14, 5, 1) = (0, \alpha^8, \alpha^9, 1) \\
P_{1778} &= (1, 14, 5, 1) = (1, \alpha^8, \alpha^9, 1) \\
P_{1779} &= (2, 14, 5, 1) = (\alpha, \alpha^8, \alpha^9, 1) \\
P_{1780} &= (3, 14, 5, 1) = (\alpha^{12}, \alpha^8, \alpha^9, 1) \\
P_{1781} &= (4, 14, 5, 1) = (\alpha^2, \alpha^8, \alpha^9, 1) \\
P_{1782} &= (5, 14, 5, 1) = (\alpha^9, \alpha^8, \alpha^9, 1) \\
P_{1783} &= (6, 14, 5, 1) = (\alpha^{13}, \alpha^8, \alpha^9, 1) \\
P_{1784} &= (7, 14, 5, 1) = (\alpha^7, \alpha^8, \alpha^9, 1) \\
P_{1785} &= (8, 14, 5, 1) = (\alpha^3, \alpha^8, \alpha^9, 1) \\
P_{1786} &= (9, 14, 5, 1) = (\alpha^4, \alpha^8, \alpha^9, 1) \\
P_{1787} &= (10, 14, 5, 1) = (\alpha^{10}, \alpha^8, \alpha^9, 1) \\
P_{1788} &= (11, 14, 5, 1) = (\alpha^5, \alpha^8, \alpha^9, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1789} &= (12, 14, 5, 1) = (\alpha^{14}, \alpha^8, \alpha^9, 1) \\
P_{1790} &= (13, 14, 5, 1) = (\alpha^{11}, \alpha^8, \alpha^9, 1) \\
P_{1791} &= (14, 14, 5, 1) = (\alpha^8, \alpha^8, \alpha^9, 1) \\
P_{1792} &= (15, 14, 5, 1) = (\alpha^6, \alpha^8, \alpha^9, 1) \\
P_{1793} &= (0, 15, 5, 1) = (0, \alpha^6, \alpha^9, 1) \\
P_{1794} &= (1, 15, 5, 1) = (1, \alpha^6, \alpha^9, 1) \\
P_{1795} &= (2, 15, 5, 1) = (\alpha, \alpha^6, \alpha^9, 1) \\
P_{1796} &= (3, 15, 5, 1) = (\alpha^{12}, \alpha^6, \alpha^9, 1) \\
P_{1797} &= (4, 15, 5, 1) = (\alpha^2, \alpha^6, \alpha^9, 1) \\
P_{1798} &= (5, 15, 5, 1) = (\alpha^9, \alpha^6, \alpha^9, 1) \\
P_{1799} &= (6, 15, 5, 1) = (\alpha^{13}, \alpha^6, \alpha^9, 1) \\
P_{1800} &= (7, 15, 5, 1) = (\alpha^7, \alpha^6, \alpha^9, 1) \\
P_{1801} &= (8, 15, 5, 1) = (\alpha^3, \alpha^6, \alpha^9, 1) \\
P_{1802} &= (9, 15, 5, 1) = (\alpha^4, \alpha^6, \alpha^9, 1) \\
P_{1803} &= (10, 15, 5, 1) = (\alpha^{10}, \alpha^6, \alpha^9, 1) \\
P_{1804} &= (11, 15, 5, 1) = (\alpha^5, \alpha^6, \alpha^9, 1) \\
P_{1805} &= (12, 15, 5, 1) = (\alpha^{14}, \alpha^6, \alpha^9, 1) \\
P_{1806} &= (13, 15, 5, 1) = (\alpha^{11}, \alpha^6, \alpha^9, 1) \\
P_{1807} &= (14, 15, 5, 1) = (\alpha^8, \alpha^6, \alpha^9, 1) \\
P_{1808} &= (15, 15, 5, 1) = (\alpha^6, \alpha^6, \alpha^9, 1) \\
P_{1809} &= (0, 0, 6, 1) = (0, 0, \alpha^{13}, 1) \\
P_{1810} &= (1, 0, 6, 1) = (1, 0, \alpha^{13}, 1) \\
P_{1811} &= (2, 0, 6, 1) = (\alpha, 0, \alpha^{13}, 1) \\
P_{1812} &= (3, 0, 6, 1) = (\alpha^{12}, 0, \alpha^{13}, 1) \\
P_{1813} &= (4, 0, 6, 1) = (\alpha^2, 0, \alpha^{13}, 1) \\
P_{1814} &= (5, 0, 6, 1) = (\alpha^9, 0, \alpha^{13}, 1) \\
P_{1815} &= (6, 0, 6, 1) = (\alpha^{13}, 0, \alpha^{13}, 1) \\
P_{1816} &= (7, 0, 6, 1) = (\alpha^7, 0, \alpha^{13}, 1) \\
P_{1817} &= (8, 0, 6, 1) = (\alpha^3, 0, \alpha^{13}, 1) \\
P_{1818} &= (9, 0, 6, 1) = (\alpha^4, 0, \alpha^{13}, 1) \\
P_{1819} &= (10, 0, 6, 1) = (\alpha^{10}, 0, \alpha^{13}, 1) \\
P_{1820} &= (11, 0, 6, 1) = (\alpha^5, 0, \alpha^{13}, 1) \\
P_{1821} &= (12, 0, 6, 1) = (\alpha^{14}, 0, \alpha^{13}, 1) \\
P_{1822} &= (13, 0, 6, 1) = (\alpha^{11}, 0, \alpha^{13}, 1) \\
P_{1823} &= (14, 0, 6, 1) = (\alpha^8, 0, \alpha^{13}, 1) \\
P_{1824} &= (15, 0, 6, 1) = (\alpha^6, 0, \alpha^{13}, 1) \\
P_{1825} &= (0, 1, 6, 1) = (0, 1, \alpha^{13}, 1) \\
P_{1826} &= (1, 1, 6, 1) = (1, 1, \alpha^{13}, 1) \\
P_{1827} &= (2, 1, 6, 1) = (\alpha, 1, \alpha^{13}, 1) \\
P_{1828} &= (3, 1, 6, 1) = (\alpha^{12}, 1, \alpha^{13}, 1) \\
P_{1829} &= (4, 1, 6, 1) = (\alpha^2, 1, \alpha^{13}, 1) \\
P_{1830} &= (5, 1, 6, 1) = (\alpha^9, 1, \alpha^{13}, 1) \\
P_{1831} &= (6, 1, 6, 1) = (\alpha^{13}, 1, \alpha^{13}, 1) \\
P_{1832} &= (7, 1, 6, 1) = (\alpha^7, 1, \alpha^{13}, 1) \\
P_{1833} &= (8, 1, 6, 1) = (\alpha^3, 1, \alpha^{13}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1834} &= (9, 1, 6, 1) = (\alpha^4, 1, \alpha^{13}, 1) \\
P_{1835} &= (10, 1, 6, 1) = (\alpha^{10}, 1, \alpha^{13}, 1) \\
P_{1836} &= (11, 1, 6, 1) = (\alpha^5, 1, \alpha^{13}, 1) \\
P_{1837} &= (12, 1, 6, 1) = (\alpha^{14}, 1, \alpha^{13}, 1) \\
P_{1838} &= (13, 1, 6, 1) = (\alpha^{11}, 1, \alpha^{13}, 1) \\
P_{1839} &= (14, 1, 6, 1) = (\alpha^8, 1, \alpha^{13}, 1) \\
P_{1840} &= (15, 1, 6, 1) = (\alpha^6, 1, \alpha^{13}, 1) \\
P_{1841} &= (0, 2, 6, 1) = (0, \alpha, \alpha^{13}, 1) \\
P_{1842} &= (1, 2, 6, 1) = (1, \alpha, \alpha^{13}, 1) \\
P_{1843} &= (2, 2, 6, 1) = (\alpha, \alpha, \alpha^{13}, 1) \\
P_{1844} &= (3, 2, 6, 1) = (\alpha^{12}, \alpha, \alpha^{13}, 1) \\
P_{1845} &= (4, 2, 6, 1) = (\alpha^2, \alpha, \alpha^{13}, 1) \\
P_{1846} &= (5, 2, 6, 1) = (\alpha^9, \alpha, \alpha^{13}, 1) \\
P_{1847} &= (6, 2, 6, 1) = (\alpha^{13}, \alpha, \alpha^{13}, 1) \\
P_{1848} &= (7, 2, 6, 1) = (\alpha^7, \alpha, \alpha^{13}, 1) \\
P_{1849} &= (8, 2, 6, 1) = (\alpha^3, \alpha, \alpha^{13}, 1) \\
P_{1850} &= (9, 2, 6, 1) = (\alpha^4, \alpha, \alpha^{13}, 1) \\
P_{1851} &= (10, 2, 6, 1) = (\alpha^{10}, \alpha, \alpha^{13}, 1) \\
P_{1852} &= (11, 2, 6, 1) = (\alpha^5, \alpha, \alpha^{13}, 1) \\
P_{1853} &= (12, 2, 6, 1) = (\alpha^{14}, \alpha, \alpha^{13}, 1) \\
P_{1854} &= (13, 2, 6, 1) = (\alpha^{11}, \alpha, \alpha^{13}, 1) \\
P_{1855} &= (14, 2, 6, 1) = (\alpha^8, \alpha, \alpha^{13}, 1) \\
P_{1856} &= (15, 2, 6, 1) = (\alpha^6, \alpha, \alpha^{13}, 1) \\
P_{1857} &= (0, 3, 6, 1) = (0, \alpha^{12}, \alpha^{13}, 1) \\
P_{1858} &= (1, 3, 6, 1) = (1, \alpha^{12}, \alpha^{13}, 1) \\
P_{1859} &= (2, 3, 6, 1) = (\alpha, \alpha^{12}, \alpha^{13}, 1) \\
P_{1860} &= (3, 3, 6, 1) = (\alpha^{12}, \alpha^{12}, \alpha^{13}, 1) \\
P_{1861} &= (4, 3, 6, 1) = (\alpha^2, \alpha^{12}, \alpha^{13}, 1) \\
P_{1862} &= (5, 3, 6, 1) = (\alpha^9, \alpha^{12}, \alpha^{13}, 1) \\
P_{1863} &= (6, 3, 6, 1) = (\alpha^{13}, \alpha^{12}, \alpha^{13}, 1) \\
P_{1864} &= (7, 3, 6, 1) = (\alpha^7, \alpha^{12}, \alpha^{13}, 1) \\
P_{1865} &= (8, 3, 6, 1) = (\alpha^3, \alpha^{12}, \alpha^{13}, 1) \\
P_{1866} &= (9, 3, 6, 1) = (\alpha^4, \alpha^{12}, \alpha^{13}, 1) \\
P_{1867} &= (10, 3, 6, 1) = (\alpha^{10}, \alpha^{12}, \alpha^{13}, 1) \\
P_{1868} &= (11, 3, 6, 1) = (\alpha^5, \alpha^{12}, \alpha^{13}, 1) \\
P_{1869} &= (12, 3, 6, 1) = (\alpha^{14}, \alpha^{12}, \alpha^{13}, 1) \\
P_{1870} &= (13, 3, 6, 1) = (\alpha^{11}, \alpha^{12}, \alpha^{13}, 1) \\
P_{1871} &= (14, 3, 6, 1) = (\alpha^8, \alpha^{12}, \alpha^{13}, 1) \\
P_{1872} &= (15, 3, 6, 1) = (\alpha^6, \alpha^{12}, \alpha^{13}, 1) \\
P_{1873} &= (0, 4, 6, 1) = (0, \alpha^2, \alpha^{13}, 1) \\
P_{1874} &= (1, 4, 6, 1) = (1, \alpha^2, \alpha^{13}, 1) \\
P_{1875} &= (2, 4, 6, 1) = (\alpha, \alpha^2, \alpha^{13}, 1) \\
P_{1876} &= (3, 4, 6, 1) = (\alpha^{12}, \alpha^2, \alpha^{13}, 1) \\
P_{1877} &= (4, 4, 6, 1) = (\alpha^2, \alpha^2, \alpha^{13}, 1) \\
P_{1878} &= (5, 4, 6, 1) = (\alpha^9, \alpha^2, \alpha^{13}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1879} &= (6, 4, 6, 1) = (\alpha^{13}, \alpha^2, \alpha^{13}, 1) \\
P_{1880} &= (7, 4, 6, 1) = (\alpha^7, \alpha^2, \alpha^{13}, 1) \\
P_{1881} &= (8, 4, 6, 1) = (\alpha^3, \alpha^2, \alpha^{13}, 1) \\
P_{1882} &= (9, 4, 6, 1) = (\alpha^4, \alpha^2, \alpha^{13}, 1) \\
P_{1883} &= (10, 4, 6, 1) = (\alpha^{10}, \alpha^2, \alpha^{13}, 1) \\
P_{1884} &= (11, 4, 6, 1) = (\alpha^5, \alpha^2, \alpha^{13}, 1) \\
P_{1885} &= (12, 4, 6, 1) = (\alpha^{14}, \alpha^2, \alpha^{13}, 1) \\
P_{1886} &= (13, 4, 6, 1) = (\alpha^{11}, \alpha^2, \alpha^{13}, 1) \\
P_{1887} &= (14, 4, 6, 1) = (\alpha^8, \alpha^2, \alpha^{13}, 1) \\
P_{1888} &= (15, 4, 6, 1) = (\alpha^6, \alpha^2, \alpha^{13}, 1) \\
P_{1889} &= (0, 5, 6, 1) = (0, \alpha^9, \alpha^{13}, 1) \\
P_{1890} &= (1, 5, 6, 1) = (1, \alpha^9, \alpha^{13}, 1) \\
P_{1891} &= (2, 5, 6, 1) = (\alpha, \alpha^9, \alpha^{13}, 1) \\
P_{1892} &= (3, 5, 6, 1) = (\alpha^{12}, \alpha^9, \alpha^{13}, 1) \\
P_{1893} &= (4, 5, 6, 1) = (\alpha^2, \alpha^9, \alpha^{13}, 1) \\
P_{1894} &= (5, 5, 6, 1) = (\alpha^9, \alpha^9, \alpha^{13}, 1) \\
P_{1895} &= (6, 5, 6, 1) = (\alpha^{13}, \alpha^9, \alpha^{13}, 1) \\
P_{1896} &= (7, 5, 6, 1) = (\alpha^7, \alpha^9, \alpha^{13}, 1) \\
P_{1897} &= (8, 5, 6, 1) = (\alpha^3, \alpha^9, \alpha^{13}, 1) \\
P_{1898} &= (9, 5, 6, 1) = (\alpha^4, \alpha^9, \alpha^{13}, 1) \\
P_{1899} &= (10, 5, 6, 1) = (\alpha^{10}, \alpha^9, \alpha^{13}, 1) \\
P_{1900} &= (11, 5, 6, 1) = (\alpha^5, \alpha^9, \alpha^{13}, 1) \\
P_{1901} &= (12, 5, 6, 1) = (\alpha^{14}, \alpha^9, \alpha^{13}, 1) \\
P_{1902} &= (13, 5, 6, 1) = (\alpha^{11}, \alpha^9, \alpha^{13}, 1) \\
P_{1903} &= (14, 5, 6, 1) = (\alpha^8, \alpha^9, \alpha^{13}, 1) \\
P_{1904} &= (15, 5, 6, 1) = (\alpha^6, \alpha^9, \alpha^{13}, 1) \\
P_{1905} &= (0, 6, 6, 1) = (0, \alpha^{13}, \alpha^{13}, 1) \\
P_{1906} &= (1, 6, 6, 1) = (1, \alpha^{13}, \alpha^{13}, 1) \\
P_{1907} &= (2, 6, 6, 1) = (\alpha, \alpha^{13}, \alpha^{13}, 1) \\
P_{1908} &= (3, 6, 6, 1) = (\alpha^{12}, \alpha^{13}, \alpha^{13}, 1) \\
P_{1909} &= (4, 6, 6, 1) = (\alpha^2, \alpha^{13}, \alpha^{13}, 1) \\
P_{1910} &= (5, 6, 6, 1) = (\alpha^9, \alpha^{13}, \alpha^{13}, 1) \\
P_{1911} &= (6, 6, 6, 1) = (\alpha^{13}, \alpha^{13}, \alpha^{13}, 1) \\
P_{1912} &= (7, 6, 6, 1) = (\alpha^7, \alpha^{13}, \alpha^{13}, 1) \\
P_{1913} &= (8, 6, 6, 1) = (\alpha^3, \alpha^{13}, \alpha^{13}, 1) \\
P_{1914} &= (9, 6, 6, 1) = (\alpha^4, \alpha^{13}, \alpha^{13}, 1) \\
P_{1915} &= (10, 6, 6, 1) = (\alpha^{10}, \alpha^{13}, \alpha^{13}, 1) \\
P_{1916} &= (11, 6, 6, 1) = (\alpha^5, \alpha^{13}, \alpha^{13}, 1) \\
P_{1917} &= (12, 6, 6, 1) = (\alpha^{14}, \alpha^{13}, \alpha^{13}, 1) \\
P_{1918} &= (13, 6, 6, 1) = (\alpha^{11}, \alpha^{13}, \alpha^{13}, 1) \\
P_{1919} &= (14, 6, 6, 1) = (\alpha^8, \alpha^{13}, \alpha^{13}, 1) \\
P_{1920} &= (15, 6, 6, 1) = (\alpha^6, \alpha^{13}, \alpha^{13}, 1) \\
P_{1921} &= (0, 7, 6, 1) = (0, \alpha^7, \alpha^{13}, 1) \\
P_{1922} &= (1, 7, 6, 1) = (1, \alpha^7, \alpha^{13}, 1) \\
P_{1923} &= (2, 7, 6, 1) = (\alpha, \alpha^7, \alpha^{13}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1924} &= (3, 7, 6, 1) = (\alpha^{12}, \alpha^7, \alpha^{13}, 1) \\
P_{1925} &= (4, 7, 6, 1) = (\alpha^2, \alpha^7, \alpha^{13}, 1) \\
P_{1926} &= (5, 7, 6, 1) = (\alpha^9, \alpha^7, \alpha^{13}, 1) \\
P_{1927} &= (6, 7, 6, 1) = (\alpha^{13}, \alpha^7, \alpha^{13}, 1) \\
P_{1928} &= (7, 7, 6, 1) = (\alpha^7, \alpha^7, \alpha^{13}, 1) \\
P_{1929} &= (8, 7, 6, 1) = (\alpha^3, \alpha^7, \alpha^{13}, 1) \\
P_{1930} &= (9, 7, 6, 1) = (\alpha^4, \alpha^7, \alpha^{13}, 1) \\
P_{1931} &= (10, 7, 6, 1) = (\alpha^{10}, \alpha^7, \alpha^{13}, 1) \\
P_{1932} &= (11, 7, 6, 1) = (\alpha^5, \alpha^7, \alpha^{13}, 1) \\
P_{1933} &= (12, 7, 6, 1) = (\alpha^{14}, \alpha^7, \alpha^{13}, 1) \\
P_{1934} &= (13, 7, 6, 1) = (\alpha^{11}, \alpha^7, \alpha^{13}, 1) \\
P_{1935} &= (14, 7, 6, 1) = (\alpha^8, \alpha^7, \alpha^{13}, 1) \\
P_{1936} &= (15, 7, 6, 1) = (\alpha^6, \alpha^7, \alpha^{13}, 1) \\
P_{1937} &= (0, 8, 6, 1) = (0, \alpha^3, \alpha^{13}, 1) \\
P_{1938} &= (1, 8, 6, 1) = (1, \alpha^3, \alpha^{13}, 1) \\
P_{1939} &= (2, 8, 6, 1) = (\alpha, \alpha^3, \alpha^{13}, 1) \\
P_{1940} &= (3, 8, 6, 1) = (\alpha^{12}, \alpha^3, \alpha^{13}, 1) \\
P_{1941} &= (4, 8, 6, 1) = (\alpha^2, \alpha^3, \alpha^{13}, 1) \\
P_{1942} &= (5, 8, 6, 1) = (\alpha^9, \alpha^3, \alpha^{13}, 1) \\
P_{1943} &= (6, 8, 6, 1) = (\alpha^{13}, \alpha^3, \alpha^{13}, 1) \\
P_{1944} &= (7, 8, 6, 1) = (\alpha^7, \alpha^3, \alpha^{13}, 1) \\
P_{1945} &= (8, 8, 6, 1) = (\alpha^3, \alpha^3, \alpha^{13}, 1) \\
P_{1946} &= (9, 8, 6, 1) = (\alpha^4, \alpha^3, \alpha^{13}, 1) \\
P_{1947} &= (10, 8, 6, 1) = (\alpha^{10}, \alpha^3, \alpha^{13}, 1) \\
P_{1948} &= (11, 8, 6, 1) = (\alpha^5, \alpha^3, \alpha^{13}, 1) \\
P_{1949} &= (12, 8, 6, 1) = (\alpha^{14}, \alpha^3, \alpha^{13}, 1) \\
P_{1950} &= (13, 8, 6, 1) = (\alpha^{11}, \alpha^3, \alpha^{13}, 1) \\
P_{1951} &= (14, 8, 6, 1) = (\alpha^8, \alpha^3, \alpha^{13}, 1) \\
P_{1952} &= (15, 8, 6, 1) = (\alpha^6, \alpha^3, \alpha^{13}, 1) \\
P_{1953} &= (0, 9, 6, 1) = (0, \alpha^4, \alpha^{13}, 1) \\
P_{1954} &= (1, 9, 6, 1) = (1, \alpha^4, \alpha^{13}, 1) \\
P_{1955} &= (2, 9, 6, 1) = (\alpha, \alpha^4, \alpha^{13}, 1) \\
P_{1956} &= (3, 9, 6, 1) = (\alpha^{12}, \alpha^4, \alpha^{13}, 1) \\
P_{1957} &= (4, 9, 6, 1) = (\alpha^2, \alpha^4, \alpha^{13}, 1) \\
P_{1958} &= (5, 9, 6, 1) = (\alpha^9, \alpha^4, \alpha^{13}, 1) \\
P_{1959} &= (6, 9, 6, 1) = (\alpha^{13}, \alpha^4, \alpha^{13}, 1) \\
P_{1960} &= (7, 9, 6, 1) = (\alpha^7, \alpha^4, \alpha^{13}, 1) \\
P_{1961} &= (8, 9, 6, 1) = (\alpha^3, \alpha^4, \alpha^{13}, 1) \\
P_{1962} &= (9, 9, 6, 1) = (\alpha^4, \alpha^4, \alpha^{13}, 1) \\
P_{1963} &= (10, 9, 6, 1) = (\alpha^{10}, \alpha^4, \alpha^{13}, 1) \\
P_{1964} &= (11, 9, 6, 1) = (\alpha^5, \alpha^4, \alpha^{13}, 1) \\
P_{1965} &= (12, 9, 6, 1) = (\alpha^{14}, \alpha^4, \alpha^{13}, 1) \\
P_{1966} &= (13, 9, 6, 1) = (\alpha^{11}, \alpha^4, \alpha^{13}, 1) \\
P_{1967} &= (14, 9, 6, 1) = (\alpha^8, \alpha^4, \alpha^{13}, 1) \\
P_{1968} &= (15, 9, 6, 1) = (\alpha^6, \alpha^4, \alpha^{13}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{1969} &= (0, 10, 6, 1) = (0, \alpha^{10}, \alpha^{13}, 1) \\
P_{1970} &= (1, 10, 6, 1) = (1, \alpha^{10}, \alpha^{13}, 1) \\
P_{1971} &= (2, 10, 6, 1) = (\alpha, \alpha^{10}, \alpha^{13}, 1) \\
P_{1972} &= (3, 10, 6, 1) = (\alpha^{12}, \alpha^{10}, \alpha^{13}, 1) \\
P_{1973} &= (4, 10, 6, 1) = (\alpha^2, \alpha^{10}, \alpha^{13}, 1) \\
P_{1974} &= (5, 10, 6, 1) = (\alpha^9, \alpha^{10}, \alpha^{13}, 1) \\
P_{1975} &= (6, 10, 6, 1) = (\alpha^{13}, \alpha^{10}, \alpha^{13}, 1) \\
P_{1976} &= (7, 10, 6, 1) = (\alpha^7, \alpha^{10}, \alpha^{13}, 1) \\
P_{1977} &= (8, 10, 6, 1) = (\alpha^3, \alpha^{10}, \alpha^{13}, 1) \\
P_{1978} &= (9, 10, 6, 1) = (\alpha^4, \alpha^{10}, \alpha^{13}, 1) \\
P_{1979} &= (10, 10, 6, 1) = (\alpha^{10}, \alpha^{10}, \alpha^{13}, 1) \\
P_{1980} &= (11, 10, 6, 1) = (\alpha^5, \alpha^{10}, \alpha^{13}, 1) \\
P_{1981} &= (12, 10, 6, 1) = (\alpha^{14}, \alpha^{10}, \alpha^{13}, 1) \\
P_{1982} &= (13, 10, 6, 1) = (\alpha^{11}, \alpha^{10}, \alpha^{13}, 1) \\
P_{1983} &= (14, 10, 6, 1) = (\alpha^8, \alpha^{10}, \alpha^{13}, 1) \\
P_{1984} &= (15, 10, 6, 1) = (\alpha^6, \alpha^{10}, \alpha^{13}, 1) \\
P_{1985} &= (0, 11, 6, 1) = (0, \alpha^5, \alpha^{13}, 1) \\
P_{1986} &= (1, 11, 6, 1) = (1, \alpha^5, \alpha^{13}, 1) \\
P_{1987} &= (2, 11, 6, 1) = (\alpha, \alpha^5, \alpha^{13}, 1) \\
P_{1988} &= (3, 11, 6, 1) = (\alpha^{12}, \alpha^5, \alpha^{13}, 1) \\
P_{1989} &= (4, 11, 6, 1) = (\alpha^2, \alpha^5, \alpha^{13}, 1) \\
P_{1990} &= (5, 11, 6, 1) = (\alpha^9, \alpha^5, \alpha^{13}, 1) \\
P_{1991} &= (6, 11, 6, 1) = (\alpha^{13}, \alpha^5, \alpha^{13}, 1) \\
P_{1992} &= (7, 11, 6, 1) = (\alpha^7, \alpha^5, \alpha^{13}, 1) \\
P_{1993} &= (8, 11, 6, 1) = (\alpha^3, \alpha^5, \alpha^{13}, 1) \\
P_{1994} &= (9, 11, 6, 1) = (\alpha^4, \alpha^5, \alpha^{13}, 1) \\
P_{1995} &= (10, 11, 6, 1) = (\alpha^{10}, \alpha^5, \alpha^{13}, 1) \\
P_{1996} &= (11, 11, 6, 1) = (\alpha^5, \alpha^5, \alpha^{13}, 1) \\
P_{1997} &= (12, 11, 6, 1) = (\alpha^{14}, \alpha^5, \alpha^{13}, 1) \\
P_{1998} &= (13, 11, 6, 1) = (\alpha^{11}, \alpha^5, \alpha^{13}, 1) \\
P_{1999} &= (14, 11, 6, 1) = (\alpha^8, \alpha^5, \alpha^{13}, 1) \\
P_{2000} &= (15, 11, 6, 1) = (\alpha^6, \alpha^5, \alpha^{13}, 1) \\
P_{2001} &= (0, 12, 6, 1) = (0, \alpha^{14}, \alpha^{13}, 1) \\
P_{2002} &= (1, 12, 6, 1) = (1, \alpha^{14}, \alpha^{13}, 1) \\
P_{2003} &= (2, 12, 6, 1) = (\alpha, \alpha^{14}, \alpha^{13}, 1) \\
P_{2004} &= (3, 12, 6, 1) = (\alpha^{12}, \alpha^{14}, \alpha^{13}, 1) \\
P_{2005} &= (4, 12, 6, 1) = (\alpha^2, \alpha^{14}, \alpha^{13}, 1) \\
P_{2006} &= (5, 12, 6, 1) = (\alpha^9, \alpha^{14}, \alpha^{13}, 1) \\
P_{2007} &= (6, 12, 6, 1) = (\alpha^{13}, \alpha^{14}, \alpha^{13}, 1) \\
P_{2008} &= (7, 12, 6, 1) = (\alpha^7, \alpha^{14}, \alpha^{13}, 1) \\
P_{2009} &= (8, 12, 6, 1) = (\alpha^3, \alpha^{14}, \alpha^{13}, 1) \\
P_{2010} &= (9, 12, 6, 1) = (\alpha^4, \alpha^{14}, \alpha^{13}, 1) \\
P_{2011} &= (10, 12, 6, 1) = (\alpha^{10}, \alpha^{14}, \alpha^{13}, 1) \\
P_{2012} &= (11, 12, 6, 1) = (\alpha^5, \alpha^{14}, \alpha^{13}, 1) \\
P_{2013} &= (12, 12, 6, 1) = (\alpha^{14}, \alpha^{14}, \alpha^{13}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2014} &= (13, 12, 6, 1) = (\alpha^{11}, \alpha^{14}, \alpha^{13}, 1) \\
P_{2015} &= (14, 12, 6, 1) = (\alpha^8, \alpha^{14}, \alpha^{13}, 1) \\
P_{2016} &= (15, 12, 6, 1) = (\alpha^6, \alpha^{14}, \alpha^{13}, 1) \\
P_{2017} &= (0, 13, 6, 1) = (0, \alpha^{11}, \alpha^{13}, 1) \\
P_{2018} &= (1, 13, 6, 1) = (1, \alpha^{11}, \alpha^{13}, 1) \\
P_{2019} &= (2, 13, 6, 1) = (\alpha, \alpha^{11}, \alpha^{13}, 1) \\
P_{2020} &= (3, 13, 6, 1) = (\alpha^{12}, \alpha^{11}, \alpha^{13}, 1) \\
P_{2021} &= (4, 13, 6, 1) = (\alpha^2, \alpha^{11}, \alpha^{13}, 1) \\
P_{2022} &= (5, 13, 6, 1) = (\alpha^9, \alpha^{11}, \alpha^{13}, 1) \\
P_{2023} &= (6, 13, 6, 1) = (\alpha^{13}, \alpha^{11}, \alpha^{13}, 1) \\
P_{2024} &= (7, 13, 6, 1) = (\alpha^7, \alpha^{11}, \alpha^{13}, 1) \\
P_{2025} &= (8, 13, 6, 1) = (\alpha^3, \alpha^{11}, \alpha^{13}, 1) \\
P_{2026} &= (9, 13, 6, 1) = (\alpha^4, \alpha^{11}, \alpha^{13}, 1) \\
P_{2027} &= (10, 13, 6, 1) = (\alpha^{10}, \alpha^{11}, \alpha^{13}, 1) \\
P_{2028} &= (11, 13, 6, 1) = (\alpha^5, \alpha^{11}, \alpha^{13}, 1) \\
P_{2029} &= (12, 13, 6, 1) = (\alpha^{14}, \alpha^{11}, \alpha^{13}, 1) \\
P_{2030} &= (13, 13, 6, 1) = (\alpha^{11}, \alpha^{11}, \alpha^{13}, 1) \\
P_{2031} &= (14, 13, 6, 1) = (\alpha^8, \alpha^{11}, \alpha^{13}, 1) \\
P_{2032} &= (15, 13, 6, 1) = (\alpha^6, \alpha^{11}, \alpha^{13}, 1) \\
P_{2033} &= (0, 14, 6, 1) = (0, \alpha^8, \alpha^{13}, 1) \\
P_{2034} &= (1, 14, 6, 1) = (1, \alpha^8, \alpha^{13}, 1) \\
P_{2035} &= (2, 14, 6, 1) = (\alpha, \alpha^8, \alpha^{13}, 1) \\
P_{2036} &= (3, 14, 6, 1) = (\alpha^{12}, \alpha^8, \alpha^{13}, 1) \\
P_{2037} &= (4, 14, 6, 1) = (\alpha^2, \alpha^8, \alpha^{13}, 1) \\
P_{2038} &= (5, 14, 6, 1) = (\alpha^9, \alpha^8, \alpha^{13}, 1) \\
P_{2039} &= (6, 14, 6, 1) = (\alpha^{13}, \alpha^8, \alpha^{13}, 1) \\
P_{2040} &= (7, 14, 6, 1) = (\alpha^7, \alpha^8, \alpha^{13}, 1) \\
P_{2041} &= (8, 14, 6, 1) = (\alpha^3, \alpha^8, \alpha^{13}, 1) \\
P_{2042} &= (9, 14, 6, 1) = (\alpha^4, \alpha^8, \alpha^{13}, 1) \\
P_{2043} &= (10, 14, 6, 1) = (\alpha^{10}, \alpha^8, \alpha^{13}, 1) \\
P_{2044} &= (11, 14, 6, 1) = (\alpha^5, \alpha^8, \alpha^{13}, 1) \\
P_{2045} &= (12, 14, 6, 1) = (\alpha^{14}, \alpha^8, \alpha^{13}, 1) \\
P_{2046} &= (13, 14, 6, 1) = (\alpha^{11}, \alpha^8, \alpha^{13}, 1) \\
P_{2047} &= (14, 14, 6, 1) = (\alpha^8, \alpha^8, \alpha^{13}, 1) \\
P_{2048} &= (15, 14, 6, 1) = (\alpha^6, \alpha^8, \alpha^{13}, 1) \\
P_{2049} &= (0, 15, 6, 1) = (0, \alpha^6, \alpha^{13}, 1) \\
P_{2050} &= (1, 15, 6, 1) = (1, \alpha^6, \alpha^{13}, 1) \\
P_{2051} &= (2, 15, 6, 1) = (\alpha, \alpha^6, \alpha^{13}, 1) \\
P_{2052} &= (3, 15, 6, 1) = (\alpha^{12}, \alpha^6, \alpha^{13}, 1) \\
P_{2053} &= (4, 15, 6, 1) = (\alpha^2, \alpha^6, \alpha^{13}, 1) \\
P_{2054} &= (5, 15, 6, 1) = (\alpha^9, \alpha^6, \alpha^{13}, 1) \\
P_{2055} &= (6, 15, 6, 1) = (\alpha^{13}, \alpha^6, \alpha^{13}, 1) \\
P_{2056} &= (7, 15, 6, 1) = (\alpha^7, \alpha^6, \alpha^{13}, 1) \\
P_{2057} &= (8, 15, 6, 1) = (\alpha^3, \alpha^6, \alpha^{13}, 1) \\
P_{2058} &= (9, 15, 6, 1) = (\alpha^4, \alpha^6, \alpha^{13}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2059} &= (10, 15, 6, 1) = (\alpha^{10}, \alpha^6, \alpha^{13}, 1) \\
P_{2060} &= (11, 15, 6, 1) = (\alpha^5, \alpha^6, \alpha^{13}, 1) \\
P_{2061} &= (12, 15, 6, 1) = (\alpha^{14}, \alpha^6, \alpha^{13}, 1) \\
P_{2062} &= (13, 15, 6, 1) = (\alpha^{11}, \alpha^6, \alpha^{13}, 1) \\
P_{2063} &= (14, 15, 6, 1) = (\alpha^8, \alpha^6, \alpha^{13}, 1) \\
P_{2064} &= (15, 15, 6, 1) = (\alpha^6, \alpha^6, \alpha^{13}, 1) \\
P_{2065} &= (0, 0, 7, 1) = (0, 0, \alpha^7, 1) \\
P_{2066} &= (1, 0, 7, 1) = (1, 0, \alpha^7, 1) \\
P_{2067} &= (2, 0, 7, 1) = (\alpha, 0, \alpha^7, 1) \\
P_{2068} &= (3, 0, 7, 1) = (\alpha^{12}, 0, \alpha^7, 1) \\
P_{2069} &= (4, 0, 7, 1) = (\alpha^2, 0, \alpha^7, 1) \\
P_{2070} &= (5, 0, 7, 1) = (\alpha^9, 0, \alpha^7, 1) \\
P_{2071} &= (6, 0, 7, 1) = (\alpha^{13}, 0, \alpha^7, 1) \\
P_{2072} &= (7, 0, 7, 1) = (\alpha^7, 0, \alpha^7, 1) \\
P_{2073} &= (8, 0, 7, 1) = (\alpha^3, 0, \alpha^7, 1) \\
P_{2074} &= (9, 0, 7, 1) = (\alpha^4, 0, \alpha^7, 1) \\
P_{2075} &= (10, 0, 7, 1) = (\alpha^{10}, 0, \alpha^7, 1) \\
P_{2076} &= (11, 0, 7, 1) = (\alpha^5, 0, \alpha^7, 1) \\
P_{2077} &= (12, 0, 7, 1) = (\alpha^{14}, 0, \alpha^7, 1) \\
P_{2078} &= (13, 0, 7, 1) = (\alpha^{11}, 0, \alpha^7, 1) \\
P_{2079} &= (14, 0, 7, 1) = (\alpha^8, 0, \alpha^7, 1) \\
P_{2080} &= (15, 0, 7, 1) = (\alpha^6, 0, \alpha^7, 1) \\
P_{2081} &= (0, 1, 7, 1) = (0, 1, \alpha^7, 1) \\
P_{2082} &= (1, 1, 7, 1) = (1, 1, \alpha^7, 1) \\
P_{2083} &= (2, 1, 7, 1) = (\alpha, 1, \alpha^7, 1) \\
P_{2084} &= (3, 1, 7, 1) = (\alpha^{12}, 1, \alpha^7, 1) \\
P_{2085} &= (4, 1, 7, 1) = (\alpha^2, 1, \alpha^7, 1) \\
P_{2086} &= (5, 1, 7, 1) = (\alpha^9, 1, \alpha^7, 1) \\
P_{2087} &= (6, 1, 7, 1) = (\alpha^{13}, 1, \alpha^7, 1) \\
P_{2088} &= (7, 1, 7, 1) = (\alpha^7, 1, \alpha^7, 1) \\
P_{2089} &= (8, 1, 7, 1) = (\alpha^3, 1, \alpha^7, 1) \\
P_{2090} &= (9, 1, 7, 1) = (\alpha^4, 1, \alpha^7, 1) \\
P_{2091} &= (10, 1, 7, 1) = (\alpha^{10}, 1, \alpha^7, 1) \\
P_{2092} &= (11, 1, 7, 1) = (\alpha^5, 1, \alpha^7, 1) \\
P_{2093} &= (12, 1, 7, 1) = (\alpha^{14}, 1, \alpha^7, 1) \\
P_{2094} &= (13, 1, 7, 1) = (\alpha^{11}, 1, \alpha^7, 1) \\
P_{2095} &= (14, 1, 7, 1) = (\alpha^8, 1, \alpha^7, 1) \\
P_{2096} &= (15, 1, 7, 1) = (\alpha^6, 1, \alpha^7, 1) \\
P_{2097} &= (0, 2, 7, 1) = (0, \alpha, \alpha^7, 1) \\
P_{2098} &= (1, 2, 7, 1) = (1, \alpha, \alpha^7, 1) \\
P_{2099} &= (2, 2, 7, 1) = (\alpha, \alpha, \alpha^7, 1) \\
P_{2100} &= (3, 2, 7, 1) = (\alpha^{12}, \alpha, \alpha^7, 1) \\
P_{2101} &= (4, 2, 7, 1) = (\alpha^2, \alpha, \alpha^7, 1) \\
P_{2102} &= (5, 2, 7, 1) = (\alpha^9, \alpha, \alpha^7, 1) \\
P_{2103} &= (6, 2, 7, 1) = (\alpha^{13}, \alpha, \alpha^7, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2104} &= (7, 2, 7, 1) = (\alpha^7, \alpha, \alpha^7, 1) \\
P_{2105} &= (8, 2, 7, 1) = (\alpha^3, \alpha, \alpha^7, 1) \\
P_{2106} &= (9, 2, 7, 1) = (\alpha^4, \alpha, \alpha^7, 1) \\
P_{2107} &= (10, 2, 7, 1) = (\alpha^{10}, \alpha, \alpha^7, 1) \\
P_{2108} &= (11, 2, 7, 1) = (\alpha^5, \alpha, \alpha^7, 1) \\
P_{2109} &= (12, 2, 7, 1) = (\alpha^{14}, \alpha, \alpha^7, 1) \\
P_{2110} &= (13, 2, 7, 1) = (\alpha^{11}, \alpha, \alpha^7, 1) \\
P_{2111} &= (14, 2, 7, 1) = (\alpha^8, \alpha, \alpha^7, 1) \\
P_{2112} &= (15, 2, 7, 1) = (\alpha^6, \alpha, \alpha^7, 1) \\
P_{2113} &= (0, 3, 7, 1) = (0, \alpha^{12}, \alpha^7, 1) \\
P_{2114} &= (1, 3, 7, 1) = (1, \alpha^{12}, \alpha^7, 1) \\
P_{2115} &= (2, 3, 7, 1) = (\alpha, \alpha^{12}, \alpha^7, 1) \\
P_{2116} &= (3, 3, 7, 1) = (\alpha^{12}, \alpha^{12}, \alpha^7, 1) \\
P_{2117} &= (4, 3, 7, 1) = (\alpha^2, \alpha^{12}, \alpha^7, 1) \\
P_{2118} &= (5, 3, 7, 1) = (\alpha^9, \alpha^{12}, \alpha^7, 1) \\
P_{2119} &= (6, 3, 7, 1) = (\alpha^{13}, \alpha^{12}, \alpha^7, 1) \\
P_{2120} &= (7, 3, 7, 1) = (\alpha^7, \alpha^{12}, \alpha^7, 1) \\
P_{2121} &= (8, 3, 7, 1) = (\alpha^3, \alpha^{12}, \alpha^7, 1) \\
P_{2122} &= (9, 3, 7, 1) = (\alpha^4, \alpha^{12}, \alpha^7, 1) \\
P_{2123} &= (10, 3, 7, 1) = (\alpha^{10}, \alpha^{12}, \alpha^7, 1) \\
P_{2124} &= (11, 3, 7, 1) = (\alpha^5, \alpha^{12}, \alpha^7, 1) \\
P_{2125} &= (12, 3, 7, 1) = (\alpha^{14}, \alpha^{12}, \alpha^7, 1) \\
P_{2126} &= (13, 3, 7, 1) = (\alpha^{11}, \alpha^{12}, \alpha^7, 1) \\
P_{2127} &= (14, 3, 7, 1) = (\alpha^8, \alpha^{12}, \alpha^7, 1) \\
P_{2128} &= (15, 3, 7, 1) = (\alpha^6, \alpha^{12}, \alpha^7, 1) \\
P_{2129} &= (0, 4, 7, 1) = (0, \alpha^2, \alpha^7, 1) \\
P_{2130} &= (1, 4, 7, 1) = (1, \alpha^2, \alpha^7, 1) \\
P_{2131} &= (2, 4, 7, 1) = (\alpha, \alpha^2, \alpha^7, 1) \\
P_{2132} &= (3, 4, 7, 1) = (\alpha^{12}, \alpha^2, \alpha^7, 1) \\
P_{2133} &= (4, 4, 7, 1) = (\alpha^2, \alpha^2, \alpha^7, 1) \\
P_{2134} &= (5, 4, 7, 1) = (\alpha^9, \alpha^2, \alpha^7, 1) \\
P_{2135} &= (6, 4, 7, 1) = (\alpha^{13}, \alpha^2, \alpha^7, 1) \\
P_{2136} &= (7, 4, 7, 1) = (\alpha^7, \alpha^2, \alpha^7, 1) \\
P_{2137} &= (8, 4, 7, 1) = (\alpha^3, \alpha^2, \alpha^7, 1) \\
P_{2138} &= (9, 4, 7, 1) = (\alpha^4, \alpha^2, \alpha^7, 1) \\
P_{2139} &= (10, 4, 7, 1) = (\alpha^{10}, \alpha^2, \alpha^7, 1) \\
P_{2140} &= (11, 4, 7, 1) = (\alpha^5, \alpha^2, \alpha^7, 1) \\
P_{2141} &= (12, 4, 7, 1) = (\alpha^{14}, \alpha^2, \alpha^7, 1) \\
P_{2142} &= (13, 4, 7, 1) = (\alpha^{11}, \alpha^2, \alpha^7, 1) \\
P_{2143} &= (14, 4, 7, 1) = (\alpha^8, \alpha^2, \alpha^7, 1) \\
P_{2144} &= (15, 4, 7, 1) = (\alpha^6, \alpha^2, \alpha^7, 1) \\
P_{2145} &= (0, 5, 7, 1) = (0, \alpha^9, \alpha^7, 1) \\
P_{2146} &= (1, 5, 7, 1) = (1, \alpha^9, \alpha^7, 1) \\
P_{2147} &= (2, 5, 7, 1) = (\alpha, \alpha^9, \alpha^7, 1) \\
P_{2148} &= (3, 5, 7, 1) = (\alpha^{12}, \alpha^9, \alpha^7, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2149} &= (4, 5, 7, 1) = (\alpha^2, \alpha^9, \alpha^7, 1) \\
P_{2150} &= (5, 5, 7, 1) = (\alpha^9, \alpha^9, \alpha^7, 1) \\
P_{2151} &= (6, 5, 7, 1) = (\alpha^{13}, \alpha^9, \alpha^7, 1) \\
P_{2152} &= (7, 5, 7, 1) = (\alpha^7, \alpha^9, \alpha^7, 1) \\
P_{2153} &= (8, 5, 7, 1) = (\alpha^3, \alpha^9, \alpha^7, 1) \\
P_{2154} &= (9, 5, 7, 1) = (\alpha^4, \alpha^9, \alpha^7, 1) \\
P_{2155} &= (10, 5, 7, 1) = (\alpha^{10}, \alpha^9, \alpha^7, 1) \\
P_{2156} &= (11, 5, 7, 1) = (\alpha^5, \alpha^9, \alpha^7, 1) \\
P_{2157} &= (12, 5, 7, 1) = (\alpha^{14}, \alpha^9, \alpha^7, 1) \\
P_{2158} &= (13, 5, 7, 1) = (\alpha^{11}, \alpha^9, \alpha^7, 1) \\
P_{2159} &= (14, 5, 7, 1) = (\alpha^8, \alpha^9, \alpha^7, 1) \\
P_{2160} &= (15, 5, 7, 1) = (\alpha^6, \alpha^9, \alpha^7, 1) \\
P_{2161} &= (0, 6, 7, 1) = (0, \alpha^{13}, \alpha^7, 1) \\
P_{2162} &= (1, 6, 7, 1) = (1, \alpha^{13}, \alpha^7, 1) \\
P_{2163} &= (2, 6, 7, 1) = (\alpha, \alpha^{13}, \alpha^7, 1) \\
P_{2164} &= (3, 6, 7, 1) = (\alpha^{12}, \alpha^{13}, \alpha^7, 1) \\
P_{2165} &= (4, 6, 7, 1) = (\alpha^2, \alpha^{13}, \alpha^7, 1) \\
P_{2166} &= (5, 6, 7, 1) = (\alpha^9, \alpha^{13}, \alpha^7, 1) \\
P_{2167} &= (6, 6, 7, 1) = (\alpha^{13}, \alpha^{13}, \alpha^7, 1) \\
P_{2168} &= (7, 6, 7, 1) = (\alpha^7, \alpha^{13}, \alpha^7, 1) \\
P_{2169} &= (8, 6, 7, 1) = (\alpha^3, \alpha^{13}, \alpha^7, 1) \\
P_{2170} &= (9, 6, 7, 1) = (\alpha^4, \alpha^{13}, \alpha^7, 1) \\
P_{2171} &= (10, 6, 7, 1) = (\alpha^{10}, \alpha^{13}, \alpha^7, 1) \\
P_{2172} &= (11, 6, 7, 1) = (\alpha^5, \alpha^{13}, \alpha^7, 1) \\
P_{2173} &= (12, 6, 7, 1) = (\alpha^{14}, \alpha^{13}, \alpha^7, 1) \\
P_{2174} &= (13, 6, 7, 1) = (\alpha^{11}, \alpha^{13}, \alpha^7, 1) \\
P_{2175} &= (14, 6, 7, 1) = (\alpha^8, \alpha^{13}, \alpha^7, 1) \\
P_{2176} &= (15, 6, 7, 1) = (\alpha^6, \alpha^{13}, \alpha^7, 1) \\
P_{2177} &= (0, 7, 7, 1) = (0, \alpha^7, \alpha^7, 1) \\
P_{2178} &= (1, 7, 7, 1) = (1, \alpha^7, \alpha^7, 1) \\
P_{2179} &= (2, 7, 7, 1) = (\alpha, \alpha^7, \alpha^7, 1) \\
P_{2180} &= (3, 7, 7, 1) = (\alpha^{12}, \alpha^7, \alpha^7, 1) \\
P_{2181} &= (4, 7, 7, 1) = (\alpha^2, \alpha^7, \alpha^7, 1) \\
P_{2182} &= (5, 7, 7, 1) = (\alpha^9, \alpha^7, \alpha^7, 1) \\
P_{2183} &= (6, 7, 7, 1) = (\alpha^{13}, \alpha^7, \alpha^7, 1) \\
P_{2184} &= (7, 7, 7, 1) = (\alpha^7, \alpha^7, \alpha^7, 1) \\
P_{2185} &= (8, 7, 7, 1) = (\alpha^3, \alpha^7, \alpha^7, 1) \\
P_{2186} &= (9, 7, 7, 1) = (\alpha^4, \alpha^7, \alpha^7, 1) \\
P_{2187} &= (10, 7, 7, 1) = (\alpha^{10}, \alpha^7, \alpha^7, 1) \\
P_{2188} &= (11, 7, 7, 1) = (\alpha^5, \alpha^7, \alpha^7, 1) \\
P_{2189} &= (12, 7, 7, 1) = (\alpha^{14}, \alpha^7, \alpha^7, 1) \\
P_{2190} &= (13, 7, 7, 1) = (\alpha^{11}, \alpha^7, \alpha^7, 1) \\
P_{2191} &= (14, 7, 7, 1) = (\alpha^8, \alpha^7, \alpha^7, 1) \\
P_{2192} &= (15, 7, 7, 1) = (\alpha^6, \alpha^7, \alpha^7, 1) \\
P_{2193} &= (0, 8, 7, 1) = (0, \alpha^3, \alpha^7, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2194} &= (1, 8, 7, 1) = (1, \alpha^3, \alpha^7, 1) \\
P_{2195} &= (2, 8, 7, 1) = (\alpha, \alpha^3, \alpha^7, 1) \\
P_{2196} &= (3, 8, 7, 1) = (\alpha^{12}, \alpha^3, \alpha^7, 1) \\
P_{2197} &= (4, 8, 7, 1) = (\alpha^2, \alpha^3, \alpha^7, 1) \\
P_{2198} &= (5, 8, 7, 1) = (\alpha^9, \alpha^3, \alpha^7, 1) \\
P_{2199} &= (6, 8, 7, 1) = (\alpha^{13}, \alpha^3, \alpha^7, 1) \\
P_{2200} &= (7, 8, 7, 1) = (\alpha^7, \alpha^3, \alpha^7, 1) \\
P_{2201} &= (8, 8, 7, 1) = (\alpha^3, \alpha^3, \alpha^7, 1) \\
P_{2202} &= (9, 8, 7, 1) = (\alpha^4, \alpha^3, \alpha^7, 1) \\
P_{2203} &= (10, 8, 7, 1) = (\alpha^{10}, \alpha^3, \alpha^7, 1) \\
P_{2204} &= (11, 8, 7, 1) = (\alpha^5, \alpha^3, \alpha^7, 1) \\
P_{2205} &= (12, 8, 7, 1) = (\alpha^{14}, \alpha^3, \alpha^7, 1) \\
P_{2206} &= (13, 8, 7, 1) = (\alpha^{11}, \alpha^3, \alpha^7, 1) \\
P_{2207} &= (14, 8, 7, 1) = (\alpha^8, \alpha^3, \alpha^7, 1) \\
P_{2208} &= (15, 8, 7, 1) = (\alpha^6, \alpha^3, \alpha^7, 1) \\
P_{2209} &= (0, 9, 7, 1) = (0, \alpha^4, \alpha^7, 1) \\
P_{2210} &= (1, 9, 7, 1) = (1, \alpha^4, \alpha^7, 1) \\
P_{2211} &= (2, 9, 7, 1) = (\alpha, \alpha^4, \alpha^7, 1) \\
P_{2212} &= (3, 9, 7, 1) = (\alpha^{12}, \alpha^4, \alpha^7, 1) \\
P_{2213} &= (4, 9, 7, 1) = (\alpha^2, \alpha^4, \alpha^7, 1) \\
P_{2214} &= (5, 9, 7, 1) = (\alpha^9, \alpha^4, \alpha^7, 1) \\
P_{2215} &= (6, 9, 7, 1) = (\alpha^{13}, \alpha^4, \alpha^7, 1) \\
P_{2216} &= (7, 9, 7, 1) = (\alpha^7, \alpha^4, \alpha^7, 1) \\
P_{2217} &= (8, 9, 7, 1) = (\alpha^3, \alpha^4, \alpha^7, 1) \\
P_{2218} &= (9, 9, 7, 1) = (\alpha^4, \alpha^4, \alpha^7, 1) \\
P_{2219} &= (10, 9, 7, 1) = (\alpha^{10}, \alpha^4, \alpha^7, 1) \\
P_{2220} &= (11, 9, 7, 1) = (\alpha^5, \alpha^4, \alpha^7, 1) \\
P_{2221} &= (12, 9, 7, 1) = (\alpha^{14}, \alpha^4, \alpha^7, 1) \\
P_{2222} &= (13, 9, 7, 1) = (\alpha^{11}, \alpha^4, \alpha^7, 1) \\
P_{2223} &= (14, 9, 7, 1) = (\alpha^8, \alpha^4, \alpha^7, 1) \\
P_{2224} &= (15, 9, 7, 1) = (\alpha^6, \alpha^4, \alpha^7, 1) \\
P_{2225} &= (0, 10, 7, 1) = (0, \alpha^{10}, \alpha^7, 1) \\
P_{2226} &= (1, 10, 7, 1) = (1, \alpha^{10}, \alpha^7, 1) \\
P_{2227} &= (2, 10, 7, 1) = (\alpha, \alpha^{10}, \alpha^7, 1) \\
P_{2228} &= (3, 10, 7, 1) = (\alpha^{12}, \alpha^{10}, \alpha^7, 1) \\
P_{2229} &= (4, 10, 7, 1) = (\alpha^2, \alpha^{10}, \alpha^7, 1) \\
P_{2230} &= (5, 10, 7, 1) = (\alpha^9, \alpha^{10}, \alpha^7, 1) \\
P_{2231} &= (6, 10, 7, 1) = (\alpha^{13}, \alpha^{10}, \alpha^7, 1) \\
P_{2232} &= (7, 10, 7, 1) = (\alpha^7, \alpha^{10}, \alpha^7, 1) \\
P_{2233} &= (8, 10, 7, 1) = (\alpha^3, \alpha^{10}, \alpha^7, 1) \\
P_{2234} &= (9, 10, 7, 1) = (\alpha^4, \alpha^{10}, \alpha^7, 1) \\
P_{2235} &= (10, 10, 7, 1) = (\alpha^{10}, \alpha^{10}, \alpha^7, 1) \\
P_{2236} &= (11, 10, 7, 1) = (\alpha^5, \alpha^{10}, \alpha^7, 1) \\
P_{2237} &= (12, 10, 7, 1) = (\alpha^{14}, \alpha^{10}, \alpha^7, 1) \\
P_{2238} &= (13, 10, 7, 1) = (\alpha^{11}, \alpha^{10}, \alpha^7, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2239} &= (14, 10, 7, 1) = (\alpha^8, \alpha^{10}, \alpha^7, 1) \\
P_{2240} &= (15, 10, 7, 1) = (\alpha^6, \alpha^{10}, \alpha^7, 1) \\
P_{2241} &= (0, 11, 7, 1) = (0, \alpha^5, \alpha^7, 1) \\
P_{2242} &= (1, 11, 7, 1) = (1, \alpha^5, \alpha^7, 1) \\
P_{2243} &= (2, 11, 7, 1) = (\alpha, \alpha^5, \alpha^7, 1) \\
P_{2244} &= (3, 11, 7, 1) = (\alpha^{12}, \alpha^5, \alpha^7, 1) \\
P_{2245} &= (4, 11, 7, 1) = (\alpha^2, \alpha^5, \alpha^7, 1) \\
P_{2246} &= (5, 11, 7, 1) = (\alpha^9, \alpha^5, \alpha^7, 1) \\
P_{2247} &= (6, 11, 7, 1) = (\alpha^{13}, \alpha^5, \alpha^7, 1) \\
P_{2248} &= (7, 11, 7, 1) = (\alpha^7, \alpha^5, \alpha^7, 1) \\
P_{2249} &= (8, 11, 7, 1) = (\alpha^3, \alpha^5, \alpha^7, 1) \\
P_{2250} &= (9, 11, 7, 1) = (\alpha^4, \alpha^5, \alpha^7, 1) \\
P_{2251} &= (10, 11, 7, 1) = (\alpha^{10}, \alpha^5, \alpha^7, 1) \\
P_{2252} &= (11, 11, 7, 1) = (\alpha^5, \alpha^5, \alpha^7, 1) \\
P_{2253} &= (12, 11, 7, 1) = (\alpha^{14}, \alpha^5, \alpha^7, 1) \\
P_{2254} &= (13, 11, 7, 1) = (\alpha^{11}, \alpha^5, \alpha^7, 1) \\
P_{2255} &= (14, 11, 7, 1) = (\alpha^8, \alpha^5, \alpha^7, 1) \\
P_{2256} &= (15, 11, 7, 1) = (\alpha^6, \alpha^5, \alpha^7, 1) \\
P_{2257} &= (0, 12, 7, 1) = (0, \alpha^{14}, \alpha^7, 1) \\
P_{2258} &= (1, 12, 7, 1) = (1, \alpha^{14}, \alpha^7, 1) \\
P_{2259} &= (2, 12, 7, 1) = (\alpha, \alpha^{14}, \alpha^7, 1) \\
P_{2260} &= (3, 12, 7, 1) = (\alpha^{12}, \alpha^{14}, \alpha^7, 1) \\
P_{2261} &= (4, 12, 7, 1) = (\alpha^2, \alpha^{14}, \alpha^7, 1) \\
P_{2262} &= (5, 12, 7, 1) = (\alpha^9, \alpha^{14}, \alpha^7, 1) \\
P_{2263} &= (6, 12, 7, 1) = (\alpha^{13}, \alpha^{14}, \alpha^7, 1) \\
P_{2264} &= (7, 12, 7, 1) = (\alpha^7, \alpha^{14}, \alpha^7, 1) \\
P_{2265} &= (8, 12, 7, 1) = (\alpha^3, \alpha^{14}, \alpha^7, 1) \\
P_{2266} &= (9, 12, 7, 1) = (\alpha^4, \alpha^{14}, \alpha^7, 1) \\
P_{2267} &= (10, 12, 7, 1) = (\alpha^{10}, \alpha^{14}, \alpha^7, 1) \\
P_{2268} &= (11, 12, 7, 1) = (\alpha^5, \alpha^{14}, \alpha^7, 1) \\
P_{2269} &= (12, 12, 7, 1) = (\alpha^{14}, \alpha^{14}, \alpha^7, 1) \\
P_{2270} &= (13, 12, 7, 1) = (\alpha^{11}, \alpha^{14}, \alpha^7, 1) \\
P_{2271} &= (14, 12, 7, 1) = (\alpha^8, \alpha^{14}, \alpha^7, 1) \\
P_{2272} &= (15, 12, 7, 1) = (\alpha^6, \alpha^{14}, \alpha^7, 1) \\
P_{2273} &= (0, 13, 7, 1) = (0, \alpha^{11}, \alpha^7, 1) \\
P_{2274} &= (1, 13, 7, 1) = (1, \alpha^{11}, \alpha^7, 1) \\
P_{2275} &= (2, 13, 7, 1) = (\alpha, \alpha^{11}, \alpha^7, 1) \\
P_{2276} &= (3, 13, 7, 1) = (\alpha^{12}, \alpha^{11}, \alpha^7, 1) \\
P_{2277} &= (4, 13, 7, 1) = (\alpha^2, \alpha^{11}, \alpha^7, 1) \\
P_{2278} &= (5, 13, 7, 1) = (\alpha^9, \alpha^{11}, \alpha^7, 1) \\
P_{2279} &= (6, 13, 7, 1) = (\alpha^{13}, \alpha^{11}, \alpha^7, 1) \\
P_{2280} &= (7, 13, 7, 1) = (\alpha^7, \alpha^{11}, \alpha^7, 1) \\
P_{2281} &= (8, 13, 7, 1) = (\alpha^3, \alpha^{11}, \alpha^7, 1) \\
P_{2282} &= (9, 13, 7, 1) = (\alpha^4, \alpha^{11}, \alpha^7, 1) \\
P_{2283} &= (10, 13, 7, 1) = (\alpha^{10}, \alpha^{11}, \alpha^7, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2284} &= (11, 13, 7, 1) = (\alpha^5, \alpha^{11}, \alpha^7, 1) \\
P_{2285} &= (12, 13, 7, 1) = (\alpha^{14}, \alpha^{11}, \alpha^7, 1) \\
P_{2286} &= (13, 13, 7, 1) = (\alpha^{11}, \alpha^{11}, \alpha^7, 1) \\
P_{2287} &= (14, 13, 7, 1) = (\alpha^8, \alpha^{11}, \alpha^7, 1) \\
P_{2288} &= (15, 13, 7, 1) = (\alpha^6, \alpha^{11}, \alpha^7, 1) \\
P_{2289} &= (0, 14, 7, 1) = (0, \alpha^8, \alpha^7, 1) \\
P_{2290} &= (1, 14, 7, 1) = (1, \alpha^8, \alpha^7, 1) \\
P_{2291} &= (2, 14, 7, 1) = (\alpha, \alpha^8, \alpha^7, 1) \\
P_{2292} &= (3, 14, 7, 1) = (\alpha^{12}, \alpha^8, \alpha^7, 1) \\
P_{2293} &= (4, 14, 7, 1) = (\alpha^2, \alpha^8, \alpha^7, 1) \\
P_{2294} &= (5, 14, 7, 1) = (\alpha^9, \alpha^8, \alpha^7, 1) \\
P_{2295} &= (6, 14, 7, 1) = (\alpha^{13}, \alpha^8, \alpha^7, 1) \\
P_{2296} &= (7, 14, 7, 1) = (\alpha^7, \alpha^8, \alpha^7, 1) \\
P_{2297} &= (8, 14, 7, 1) = (\alpha^3, \alpha^8, \alpha^7, 1) \\
P_{2298} &= (9, 14, 7, 1) = (\alpha^4, \alpha^8, \alpha^7, 1) \\
P_{2299} &= (10, 14, 7, 1) = (\alpha^{10}, \alpha^8, \alpha^7, 1) \\
P_{2300} &= (11, 14, 7, 1) = (\alpha^5, \alpha^8, \alpha^7, 1) \\
P_{2301} &= (12, 14, 7, 1) = (\alpha^{14}, \alpha^8, \alpha^7, 1) \\
P_{2302} &= (13, 14, 7, 1) = (\alpha^{11}, \alpha^8, \alpha^7, 1) \\
P_{2303} &= (14, 14, 7, 1) = (\alpha^8, \alpha^8, \alpha^7, 1) \\
P_{2304} &= (15, 14, 7, 1) = (\alpha^6, \alpha^8, \alpha^7, 1) \\
P_{2305} &= (0, 15, 7, 1) = (0, \alpha^6, \alpha^7, 1) \\
P_{2306} &= (1, 15, 7, 1) = (1, \alpha^6, \alpha^7, 1) \\
P_{2307} &= (2, 15, 7, 1) = (\alpha, \alpha^6, \alpha^7, 1) \\
P_{2308} &= (3, 15, 7, 1) = (\alpha^{12}, \alpha^6, \alpha^7, 1) \\
P_{2309} &= (4, 15, 7, 1) = (\alpha^2, \alpha^6, \alpha^7, 1) \\
P_{2310} &= (5, 15, 7, 1) = (\alpha^9, \alpha^6, \alpha^7, 1) \\
P_{2311} &= (6, 15, 7, 1) = (\alpha^{13}, \alpha^6, \alpha^7, 1) \\
P_{2312} &= (7, 15, 7, 1) = (\alpha^7, \alpha^6, \alpha^7, 1) \\
P_{2313} &= (8, 15, 7, 1) = (\alpha^3, \alpha^6, \alpha^7, 1) \\
P_{2314} &= (9, 15, 7, 1) = (\alpha^4, \alpha^6, \alpha^7, 1) \\
P_{2315} &= (10, 15, 7, 1) = (\alpha^{10}, \alpha^6, \alpha^7, 1) \\
P_{2316} &= (11, 15, 7, 1) = (\alpha^5, \alpha^6, \alpha^7, 1) \\
P_{2317} &= (12, 15, 7, 1) = (\alpha^{14}, \alpha^6, \alpha^7, 1) \\
P_{2318} &= (13, 15, 7, 1) = (\alpha^{11}, \alpha^6, \alpha^7, 1) \\
P_{2319} &= (14, 15, 7, 1) = (\alpha^8, \alpha^6, \alpha^7, 1) \\
P_{2320} &= (15, 15, 7, 1) = (\alpha^6, \alpha^6, \alpha^7, 1) \\
P_{2321} &= (0, 0, 8, 1) = (0, 0, \alpha^3, 1) \\
P_{2322} &= (1, 0, 8, 1) = (1, 0, \alpha^3, 1) \\
P_{2323} &= (2, 0, 8, 1) = (\alpha, 0, \alpha^3, 1) \\
P_{2324} &= (3, 0, 8, 1) = (\alpha^{12}, 0, \alpha^3, 1) \\
P_{2325} &= (4, 0, 8, 1) = (\alpha^2, 0, \alpha^3, 1) \\
P_{2326} &= (5, 0, 8, 1) = (\alpha^9, 0, \alpha^3, 1) \\
P_{2327} &= (6, 0, 8, 1) = (\alpha^{13}, 0, \alpha^3, 1) \\
P_{2328} &= (7, 0, 8, 1) = (\alpha^7, 0, \alpha^3, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2329} &= (8, 0, 8, 1) = (\alpha^3, 0, \alpha^3, 1) \\
P_{2330} &= (9, 0, 8, 1) = (\alpha^4, 0, \alpha^3, 1) \\
P_{2331} &= (10, 0, 8, 1) = (\alpha^{10}, 0, \alpha^3, 1) \\
P_{2332} &= (11, 0, 8, 1) = (\alpha^5, 0, \alpha^3, 1) \\
P_{2333} &= (12, 0, 8, 1) = (\alpha^{14}, 0, \alpha^3, 1) \\
P_{2334} &= (13, 0, 8, 1) = (\alpha^{11}, 0, \alpha^3, 1) \\
P_{2335} &= (14, 0, 8, 1) = (\alpha^8, 0, \alpha^3, 1) \\
P_{2336} &= (15, 0, 8, 1) = (\alpha^6, 0, \alpha^3, 1) \\
P_{2337} &= (0, 1, 8, 1) = (0, 1, \alpha^3, 1) \\
P_{2338} &= (1, 1, 8, 1) = (1, 1, \alpha^3, 1) \\
P_{2339} &= (2, 1, 8, 1) = (\alpha, 1, \alpha^3, 1) \\
P_{2340} &= (3, 1, 8, 1) = (\alpha^{12}, 1, \alpha^3, 1) \\
P_{2341} &= (4, 1, 8, 1) = (\alpha^2, 1, \alpha^3, 1) \\
P_{2342} &= (5, 1, 8, 1) = (\alpha^9, 1, \alpha^3, 1) \\
P_{2343} &= (6, 1, 8, 1) = (\alpha^{13}, 1, \alpha^3, 1) \\
P_{2344} &= (7, 1, 8, 1) = (\alpha^7, 1, \alpha^3, 1) \\
P_{2345} &= (8, 1, 8, 1) = (\alpha^3, 1, \alpha^3, 1) \\
P_{2346} &= (9, 1, 8, 1) = (\alpha^4, 1, \alpha^3, 1) \\
P_{2347} &= (10, 1, 8, 1) = (\alpha^{10}, 1, \alpha^3, 1) \\
P_{2348} &= (11, 1, 8, 1) = (\alpha^5, 1, \alpha^3, 1) \\
P_{2349} &= (12, 1, 8, 1) = (\alpha^{14}, 1, \alpha^3, 1) \\
P_{2350} &= (13, 1, 8, 1) = (\alpha^{11}, 1, \alpha^3, 1) \\
P_{2351} &= (14, 1, 8, 1) = (\alpha^8, 1, \alpha^3, 1) \\
P_{2352} &= (15, 1, 8, 1) = (\alpha^6, 1, \alpha^3, 1) \\
P_{2353} &= (0, 2, 8, 1) = (0, \alpha, \alpha^3, 1) \\
P_{2354} &= (1, 2, 8, 1) = (1, \alpha, \alpha^3, 1) \\
P_{2355} &= (2, 2, 8, 1) = (\alpha, \alpha, \alpha^3, 1) \\
P_{2356} &= (3, 2, 8, 1) = (\alpha^{12}, \alpha, \alpha^3, 1) \\
P_{2357} &= (4, 2, 8, 1) = (\alpha^2, \alpha, \alpha^3, 1) \\
P_{2358} &= (5, 2, 8, 1) = (\alpha^9, \alpha, \alpha^3, 1) \\
P_{2359} &= (6, 2, 8, 1) = (\alpha^{13}, \alpha, \alpha^3, 1) \\
P_{2360} &= (7, 2, 8, 1) = (\alpha^7, \alpha, \alpha^3, 1) \\
P_{2361} &= (8, 2, 8, 1) = (\alpha^3, \alpha, \alpha^3, 1) \\
P_{2362} &= (9, 2, 8, 1) = (\alpha^4, \alpha, \alpha^3, 1) \\
P_{2363} &= (10, 2, 8, 1) = (\alpha^{10}, \alpha, \alpha^3, 1) \\
P_{2364} &= (11, 2, 8, 1) = (\alpha^5, \alpha, \alpha^3, 1) \\
P_{2365} &= (12, 2, 8, 1) = (\alpha^{14}, \alpha, \alpha^3, 1) \\
P_{2366} &= (13, 2, 8, 1) = (\alpha^{11}, \alpha, \alpha^3, 1) \\
P_{2367} &= (14, 2, 8, 1) = (\alpha^8, \alpha, \alpha^3, 1) \\
P_{2368} &= (15, 2, 8, 1) = (\alpha^6, \alpha, \alpha^3, 1) \\
P_{2369} &= (0, 3, 8, 1) = (0, \alpha^{12}, \alpha^3, 1) \\
P_{2370} &= (1, 3, 8, 1) = (1, \alpha^{12}, \alpha^3, 1) \\
P_{2371} &= (2, 3, 8, 1) = (\alpha, \alpha^{12}, \alpha^3, 1) \\
P_{2372} &= (3, 3, 8, 1) = (\alpha^{12}, \alpha^{12}, \alpha^3, 1) \\
P_{2373} &= (4, 3, 8, 1) = (\alpha^2, \alpha^{12}, \alpha^3, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2374} &= (5, 3, 8, 1) = (\alpha^9, \alpha^{12}, \alpha^3, 1) \\
P_{2375} &= (6, 3, 8, 1) = (\alpha^{13}, \alpha^{12}, \alpha^3, 1) \\
P_{2376} &= (7, 3, 8, 1) = (\alpha^7, \alpha^{12}, \alpha^3, 1) \\
P_{2377} &= (8, 3, 8, 1) = (\alpha^3, \alpha^{12}, \alpha^3, 1) \\
P_{2378} &= (9, 3, 8, 1) = (\alpha^4, \alpha^{12}, \alpha^3, 1) \\
P_{2379} &= (10, 3, 8, 1) = (\alpha^{10}, \alpha^{12}, \alpha^3, 1) \\
P_{2380} &= (11, 3, 8, 1) = (\alpha^5, \alpha^{12}, \alpha^3, 1) \\
P_{2381} &= (12, 3, 8, 1) = (\alpha^{14}, \alpha^{12}, \alpha^3, 1) \\
P_{2382} &= (13, 3, 8, 1) = (\alpha^{11}, \alpha^{12}, \alpha^3, 1) \\
P_{2383} &= (14, 3, 8, 1) = (\alpha^8, \alpha^{12}, \alpha^3, 1) \\
P_{2384} &= (15, 3, 8, 1) = (\alpha^6, \alpha^{12}, \alpha^3, 1) \\
P_{2385} &= (0, 4, 8, 1) = (0, \alpha^2, \alpha^3, 1) \\
P_{2386} &= (1, 4, 8, 1) = (1, \alpha^2, \alpha^3, 1) \\
P_{2387} &= (2, 4, 8, 1) = (\alpha, \alpha^2, \alpha^3, 1) \\
P_{2388} &= (3, 4, 8, 1) = (\alpha^{12}, \alpha^2, \alpha^3, 1) \\
P_{2389} &= (4, 4, 8, 1) = (\alpha^2, \alpha^2, \alpha^3, 1) \\
P_{2390} &= (5, 4, 8, 1) = (\alpha^9, \alpha^2, \alpha^3, 1) \\
P_{2391} &= (6, 4, 8, 1) = (\alpha^{13}, \alpha^2, \alpha^3, 1) \\
P_{2392} &= (7, 4, 8, 1) = (\alpha^7, \alpha^2, \alpha^3, 1) \\
P_{2393} &= (8, 4, 8, 1) = (\alpha^3, \alpha^2, \alpha^3, 1) \\
P_{2394} &= (9, 4, 8, 1) = (\alpha^4, \alpha^2, \alpha^3, 1) \\
P_{2395} &= (10, 4, 8, 1) = (\alpha^{10}, \alpha^2, \alpha^3, 1) \\
P_{2396} &= (11, 4, 8, 1) = (\alpha^5, \alpha^2, \alpha^3, 1) \\
P_{2397} &= (12, 4, 8, 1) = (\alpha^{14}, \alpha^2, \alpha^3, 1) \\
P_{2398} &= (13, 4, 8, 1) = (\alpha^{11}, \alpha^2, \alpha^3, 1) \\
P_{2399} &= (14, 4, 8, 1) = (\alpha^8, \alpha^2, \alpha^3, 1) \\
P_{2400} &= (15, 4, 8, 1) = (\alpha^6, \alpha^2, \alpha^3, 1) \\
P_{2401} &= (0, 5, 8, 1) = (0, \alpha^9, \alpha^3, 1) \\
P_{2402} &= (1, 5, 8, 1) = (1, \alpha^9, \alpha^3, 1) \\
P_{2403} &= (2, 5, 8, 1) = (\alpha, \alpha^9, \alpha^3, 1) \\
P_{2404} &= (3, 5, 8, 1) = (\alpha^{12}, \alpha^9, \alpha^3, 1) \\
P_{2405} &= (4, 5, 8, 1) = (\alpha^2, \alpha^9, \alpha^3, 1) \\
P_{2406} &= (5, 5, 8, 1) = (\alpha^9, \alpha^9, \alpha^3, 1) \\
P_{2407} &= (6, 5, 8, 1) = (\alpha^{13}, \alpha^9, \alpha^3, 1) \\
P_{2408} &= (7, 5, 8, 1) = (\alpha^7, \alpha^9, \alpha^3, 1) \\
P_{2409} &= (8, 5, 8, 1) = (\alpha^3, \alpha^9, \alpha^3, 1) \\
P_{2410} &= (9, 5, 8, 1) = (\alpha^4, \alpha^9, \alpha^3, 1) \\
P_{2411} &= (10, 5, 8, 1) = (\alpha^{10}, \alpha^9, \alpha^3, 1) \\
P_{2412} &= (11, 5, 8, 1) = (\alpha^5, \alpha^9, \alpha^3, 1) \\
P_{2413} &= (12, 5, 8, 1) = (\alpha^{14}, \alpha^9, \alpha^3, 1) \\
P_{2414} &= (13, 5, 8, 1) = (\alpha^{11}, \alpha^9, \alpha^3, 1) \\
P_{2415} &= (14, 5, 8, 1) = (\alpha^8, \alpha^9, \alpha^3, 1) \\
P_{2416} &= (15, 5, 8, 1) = (\alpha^6, \alpha^9, \alpha^3, 1) \\
P_{2417} &= (0, 6, 8, 1) = (0, \alpha^{13}, \alpha^3, 1) \\
P_{2418} &= (1, 6, 8, 1) = (1, \alpha^{13}, \alpha^3, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2419} &= (2, 6, 8, 1) = (\alpha, \alpha^{13}, \alpha^3, 1) \\
P_{2420} &= (3, 6, 8, 1) = (\alpha^{12}, \alpha^{13}, \alpha^3, 1) \\
P_{2421} &= (4, 6, 8, 1) = (\alpha^2, \alpha^{13}, \alpha^3, 1) \\
P_{2422} &= (5, 6, 8, 1) = (\alpha^9, \alpha^{13}, \alpha^3, 1) \\
P_{2423} &= (6, 6, 8, 1) = (\alpha^{13}, \alpha^{13}, \alpha^3, 1) \\
P_{2424} &= (7, 6, 8, 1) = (\alpha^7, \alpha^{13}, \alpha^3, 1) \\
P_{2425} &= (8, 6, 8, 1) = (\alpha^3, \alpha^{13}, \alpha^3, 1) \\
P_{2426} &= (9, 6, 8, 1) = (\alpha^4, \alpha^{13}, \alpha^3, 1) \\
P_{2427} &= (10, 6, 8, 1) = (\alpha^{10}, \alpha^{13}, \alpha^3, 1) \\
P_{2428} &= (11, 6, 8, 1) = (\alpha^5, \alpha^{13}, \alpha^3, 1) \\
P_{2429} &= (12, 6, 8, 1) = (\alpha^{14}, \alpha^{13}, \alpha^3, 1) \\
P_{2430} &= (13, 6, 8, 1) = (\alpha^{11}, \alpha^{13}, \alpha^3, 1) \\
P_{2431} &= (14, 6, 8, 1) = (\alpha^8, \alpha^{13}, \alpha^3, 1) \\
P_{2432} &= (15, 6, 8, 1) = (\alpha^6, \alpha^{13}, \alpha^3, 1) \\
P_{2433} &= (0, 7, 8, 1) = (0, \alpha^7, \alpha^3, 1) \\
P_{2434} &= (1, 7, 8, 1) = (1, \alpha^7, \alpha^3, 1) \\
P_{2435} &= (2, 7, 8, 1) = (\alpha, \alpha^7, \alpha^3, 1) \\
P_{2436} &= (3, 7, 8, 1) = (\alpha^{12}, \alpha^7, \alpha^3, 1) \\
P_{2437} &= (4, 7, 8, 1) = (\alpha^2, \alpha^7, \alpha^3, 1) \\
P_{2438} &= (5, 7, 8, 1) = (\alpha^9, \alpha^7, \alpha^3, 1) \\
P_{2439} &= (6, 7, 8, 1) = (\alpha^{13}, \alpha^7, \alpha^3, 1) \\
P_{2440} &= (7, 7, 8, 1) = (\alpha^7, \alpha^7, \alpha^3, 1) \\
P_{2441} &= (8, 7, 8, 1) = (\alpha^3, \alpha^7, \alpha^3, 1) \\
P_{2442} &= (9, 7, 8, 1) = (\alpha^4, \alpha^7, \alpha^3, 1) \\
P_{2443} &= (10, 7, 8, 1) = (\alpha^{10}, \alpha^7, \alpha^3, 1) \\
P_{2444} &= (11, 7, 8, 1) = (\alpha^5, \alpha^7, \alpha^3, 1) \\
P_{2445} &= (12, 7, 8, 1) = (\alpha^{14}, \alpha^7, \alpha^3, 1) \\
P_{2446} &= (13, 7, 8, 1) = (\alpha^{11}, \alpha^7, \alpha^3, 1) \\
P_{2447} &= (14, 7, 8, 1) = (\alpha^8, \alpha^7, \alpha^3, 1) \\
P_{2448} &= (15, 7, 8, 1) = (\alpha^6, \alpha^7, \alpha^3, 1) \\
P_{2449} &= (0, 8, 8, 1) = (0, \alpha^3, \alpha^3, 1) \\
P_{2450} &= (1, 8, 8, 1) = (1, \alpha^3, \alpha^3, 1) \\
P_{2451} &= (2, 8, 8, 1) = (\alpha, \alpha^3, \alpha^3, 1) \\
P_{2452} &= (3, 8, 8, 1) = (\alpha^{12}, \alpha^3, \alpha^3, 1) \\
P_{2453} &= (4, 8, 8, 1) = (\alpha^2, \alpha^3, \alpha^3, 1) \\
P_{2454} &= (5, 8, 8, 1) = (\alpha^9, \alpha^3, \alpha^3, 1) \\
P_{2455} &= (6, 8, 8, 1) = (\alpha^{13}, \alpha^3, \alpha^3, 1) \\
P_{2456} &= (7, 8, 8, 1) = (\alpha^7, \alpha^3, \alpha^3, 1) \\
P_{2457} &= (8, 8, 8, 1) = (\alpha^3, \alpha^3, \alpha^3, 1) \\
P_{2458} &= (9, 8, 8, 1) = (\alpha^4, \alpha^3, \alpha^3, 1) \\
P_{2459} &= (10, 8, 8, 1) = (\alpha^{10}, \alpha^3, \alpha^3, 1) \\
P_{2460} &= (11, 8, 8, 1) = (\alpha^5, \alpha^3, \alpha^3, 1) \\
P_{2461} &= (12, 8, 8, 1) = (\alpha^{14}, \alpha^3, \alpha^3, 1) \\
P_{2462} &= (13, 8, 8, 1) = (\alpha^{11}, \alpha^3, \alpha^3, 1) \\
P_{2463} &= (14, 8, 8, 1) = (\alpha^8, \alpha^3, \alpha^3, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2464} &= (15, 8, 8, 1) = (\alpha^6, \alpha^3, \alpha^3, 1) \\
P_{2465} &= (0, 9, 8, 1) = (0, \alpha^4, \alpha^3, 1) \\
P_{2466} &= (1, 9, 8, 1) = (1, \alpha^4, \alpha^3, 1) \\
P_{2467} &= (2, 9, 8, 1) = (\alpha, \alpha^4, \alpha^3, 1) \\
P_{2468} &= (3, 9, 8, 1) = (\alpha^{12}, \alpha^4, \alpha^3, 1) \\
P_{2469} &= (4, 9, 8, 1) = (\alpha^2, \alpha^4, \alpha^3, 1) \\
P_{2470} &= (5, 9, 8, 1) = (\alpha^9, \alpha^4, \alpha^3, 1) \\
P_{2471} &= (6, 9, 8, 1) = (\alpha^{13}, \alpha^4, \alpha^3, 1) \\
P_{2472} &= (7, 9, 8, 1) = (\alpha^7, \alpha^4, \alpha^3, 1) \\
P_{2473} &= (8, 9, 8, 1) = (\alpha^3, \alpha^4, \alpha^3, 1) \\
P_{2474} &= (9, 9, 8, 1) = (\alpha^4, \alpha^4, \alpha^3, 1) \\
P_{2475} &= (10, 9, 8, 1) = (\alpha^{10}, \alpha^4, \alpha^3, 1) \\
P_{2476} &= (11, 9, 8, 1) = (\alpha^5, \alpha^4, \alpha^3, 1) \\
P_{2477} &= (12, 9, 8, 1) = (\alpha^{14}, \alpha^4, \alpha^3, 1) \\
P_{2478} &= (13, 9, 8, 1) = (\alpha^{11}, \alpha^4, \alpha^3, 1) \\
P_{2479} &= (14, 9, 8, 1) = (\alpha^8, \alpha^4, \alpha^3, 1) \\
P_{2480} &= (15, 9, 8, 1) = (\alpha^6, \alpha^4, \alpha^3, 1) \\
P_{2481} &= (0, 10, 8, 1) = (0, \alpha^{10}, \alpha^3, 1) \\
P_{2482} &= (1, 10, 8, 1) = (1, \alpha^{10}, \alpha^3, 1) \\
P_{2483} &= (2, 10, 8, 1) = (\alpha, \alpha^{10}, \alpha^3, 1) \\
P_{2484} &= (3, 10, 8, 1) = (\alpha^{12}, \alpha^{10}, \alpha^3, 1) \\
P_{2485} &= (4, 10, 8, 1) = (\alpha^2, \alpha^{10}, \alpha^3, 1) \\
P_{2486} &= (5, 10, 8, 1) = (\alpha^9, \alpha^{10}, \alpha^3, 1) \\
P_{2487} &= (6, 10, 8, 1) = (\alpha^{13}, \alpha^{10}, \alpha^3, 1) \\
P_{2488} &= (7, 10, 8, 1) = (\alpha^7, \alpha^{10}, \alpha^3, 1) \\
P_{2489} &= (8, 10, 8, 1) = (\alpha^3, \alpha^{10}, \alpha^3, 1) \\
P_{2490} &= (9, 10, 8, 1) = (\alpha^4, \alpha^{10}, \alpha^3, 1) \\
P_{2491} &= (10, 10, 8, 1) = (\alpha^{10}, \alpha^{10}, \alpha^3, 1) \\
P_{2492} &= (11, 10, 8, 1) = (\alpha^5, \alpha^{10}, \alpha^3, 1) \\
P_{2493} &= (12, 10, 8, 1) = (\alpha^{14}, \alpha^{10}, \alpha^3, 1) \\
P_{2494} &= (13, 10, 8, 1) = (\alpha^{11}, \alpha^{10}, \alpha^3, 1) \\
P_{2495} &= (14, 10, 8, 1) = (\alpha^8, \alpha^{10}, \alpha^3, 1) \\
P_{2496} &= (15, 10, 8, 1) = (\alpha^6, \alpha^{10}, \alpha^3, 1) \\
P_{2497} &= (0, 11, 8, 1) = (0, \alpha^5, \alpha^3, 1) \\
P_{2498} &= (1, 11, 8, 1) = (1, \alpha^5, \alpha^3, 1) \\
P_{2499} &= (2, 11, 8, 1) = (\alpha, \alpha^5, \alpha^3, 1) \\
P_{2500} &= (3, 11, 8, 1) = (\alpha^{12}, \alpha^5, \alpha^3, 1) \\
P_{2501} &= (4, 11, 8, 1) = (\alpha^2, \alpha^5, \alpha^3, 1) \\
P_{2502} &= (5, 11, 8, 1) = (\alpha^9, \alpha^5, \alpha^3, 1) \\
P_{2503} &= (6, 11, 8, 1) = (\alpha^{13}, \alpha^5, \alpha^3, 1) \\
P_{2504} &= (7, 11, 8, 1) = (\alpha^7, \alpha^5, \alpha^3, 1) \\
P_{2505} &= (8, 11, 8, 1) = (\alpha^3, \alpha^5, \alpha^3, 1) \\
P_{2506} &= (9, 11, 8, 1) = (\alpha^4, \alpha^5, \alpha^3, 1) \\
P_{2507} &= (10, 11, 8, 1) = (\alpha^{10}, \alpha^5, \alpha^3, 1) \\
P_{2508} &= (11, 11, 8, 1) = (\alpha^5, \alpha^5, \alpha^3, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2509} &= (12, 11, 8, 1) = (\alpha^{14}, \alpha^5, \alpha^3, 1) \\
P_{2510} &= (13, 11, 8, 1) = (\alpha^{11}, \alpha^5, \alpha^3, 1) \\
P_{2511} &= (14, 11, 8, 1) = (\alpha^8, \alpha^5, \alpha^3, 1) \\
P_{2512} &= (15, 11, 8, 1) = (\alpha^6, \alpha^5, \alpha^3, 1) \\
P_{2513} &= (0, 12, 8, 1) = (0, \alpha^{14}, \alpha^3, 1) \\
P_{2514} &= (1, 12, 8, 1) = (1, \alpha^{14}, \alpha^3, 1) \\
P_{2515} &= (2, 12, 8, 1) = (\alpha, \alpha^{14}, \alpha^3, 1) \\
P_{2516} &= (3, 12, 8, 1) = (\alpha^{12}, \alpha^{14}, \alpha^3, 1) \\
P_{2517} &= (4, 12, 8, 1) = (\alpha^2, \alpha^{14}, \alpha^3, 1) \\
P_{2518} &= (5, 12, 8, 1) = (\alpha^9, \alpha^{14}, \alpha^3, 1) \\
P_{2519} &= (6, 12, 8, 1) = (\alpha^{13}, \alpha^{14}, \alpha^3, 1) \\
P_{2520} &= (7, 12, 8, 1) = (\alpha^7, \alpha^{14}, \alpha^3, 1) \\
P_{2521} &= (8, 12, 8, 1) = (\alpha^3, \alpha^{14}, \alpha^3, 1) \\
P_{2522} &= (9, 12, 8, 1) = (\alpha^4, \alpha^{14}, \alpha^3, 1) \\
P_{2523} &= (10, 12, 8, 1) = (\alpha^{10}, \alpha^{14}, \alpha^3, 1) \\
P_{2524} &= (11, 12, 8, 1) = (\alpha^5, \alpha^{14}, \alpha^3, 1) \\
P_{2525} &= (12, 12, 8, 1) = (\alpha^{14}, \alpha^{14}, \alpha^3, 1) \\
P_{2526} &= (13, 12, 8, 1) = (\alpha^{11}, \alpha^{14}, \alpha^3, 1) \\
P_{2527} &= (14, 12, 8, 1) = (\alpha^8, \alpha^{14}, \alpha^3, 1) \\
P_{2528} &= (15, 12, 8, 1) = (\alpha^6, \alpha^{14}, \alpha^3, 1) \\
P_{2529} &= (0, 13, 8, 1) = (0, \alpha^{11}, \alpha^3, 1) \\
P_{2530} &= (1, 13, 8, 1) = (1, \alpha^{11}, \alpha^3, 1) \\
P_{2531} &= (2, 13, 8, 1) = (\alpha, \alpha^{11}, \alpha^3, 1) \\
P_{2532} &= (3, 13, 8, 1) = (\alpha^{12}, \alpha^{11}, \alpha^3, 1) \\
P_{2533} &= (4, 13, 8, 1) = (\alpha^2, \alpha^{11}, \alpha^3, 1) \\
P_{2534} &= (5, 13, 8, 1) = (\alpha^9, \alpha^{11}, \alpha^3, 1) \\
P_{2535} &= (6, 13, 8, 1) = (\alpha^{13}, \alpha^{11}, \alpha^3, 1) \\
P_{2536} &= (7, 13, 8, 1) = (\alpha^7, \alpha^{11}, \alpha^3, 1) \\
P_{2537} &= (8, 13, 8, 1) = (\alpha^3, \alpha^{11}, \alpha^3, 1) \\
P_{2538} &= (9, 13, 8, 1) = (\alpha^4, \alpha^{11}, \alpha^3, 1) \\
P_{2539} &= (10, 13, 8, 1) = (\alpha^{10}, \alpha^{11}, \alpha^3, 1) \\
P_{2540} &= (11, 13, 8, 1) = (\alpha^5, \alpha^{11}, \alpha^3, 1) \\
P_{2541} &= (12, 13, 8, 1) = (\alpha^{14}, \alpha^{11}, \alpha^3, 1) \\
P_{2542} &= (13, 13, 8, 1) = (\alpha^{11}, \alpha^{11}, \alpha^3, 1) \\
P_{2543} &= (14, 13, 8, 1) = (\alpha^8, \alpha^{11}, \alpha^3, 1) \\
P_{2544} &= (15, 13, 8, 1) = (\alpha^6, \alpha^{11}, \alpha^3, 1) \\
P_{2545} &= (0, 14, 8, 1) = (0, \alpha^8, \alpha^3, 1) \\
P_{2546} &= (1, 14, 8, 1) = (1, \alpha^8, \alpha^3, 1) \\
P_{2547} &= (2, 14, 8, 1) = (\alpha, \alpha^8, \alpha^3, 1) \\
P_{2548} &= (3, 14, 8, 1) = (\alpha^{12}, \alpha^8, \alpha^3, 1) \\
P_{2549} &= (4, 14, 8, 1) = (\alpha^2, \alpha^8, \alpha^3, 1) \\
P_{2550} &= (5, 14, 8, 1) = (\alpha^9, \alpha^8, \alpha^3, 1) \\
P_{2551} &= (6, 14, 8, 1) = (\alpha^{13}, \alpha^8, \alpha^3, 1) \\
P_{2552} &= (7, 14, 8, 1) = (\alpha^7, \alpha^8, \alpha^3, 1) \\
P_{2553} &= (8, 14, 8, 1) = (\alpha^3, \alpha^8, \alpha^3, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2554} &= (9, 14, 8, 1) = (\alpha^4, \alpha^8, \alpha^3, 1) \\
P_{2555} &= (10, 14, 8, 1) = (\alpha^{10}, \alpha^8, \alpha^3, 1) \\
P_{2556} &= (11, 14, 8, 1) = (\alpha^5, \alpha^8, \alpha^3, 1) \\
P_{2557} &= (12, 14, 8, 1) = (\alpha^{14}, \alpha^8, \alpha^3, 1) \\
P_{2558} &= (13, 14, 8, 1) = (\alpha^{11}, \alpha^8, \alpha^3, 1) \\
P_{2559} &= (14, 14, 8, 1) = (\alpha^8, \alpha^8, \alpha^3, 1) \\
P_{2560} &= (15, 14, 8, 1) = (\alpha^6, \alpha^8, \alpha^3, 1) \\
P_{2561} &= (0, 15, 8, 1) = (0, \alpha^6, \alpha^3, 1) \\
P_{2562} &= (1, 15, 8, 1) = (1, \alpha^6, \alpha^3, 1) \\
P_{2563} &= (2, 15, 8, 1) = (\alpha, \alpha^6, \alpha^3, 1) \\
P_{2564} &= (3, 15, 8, 1) = (\alpha^{12}, \alpha^6, \alpha^3, 1) \\
P_{2565} &= (4, 15, 8, 1) = (\alpha^2, \alpha^6, \alpha^3, 1) \\
P_{2566} &= (5, 15, 8, 1) = (\alpha^9, \alpha^6, \alpha^3, 1) \\
P_{2567} &= (6, 15, 8, 1) = (\alpha^{13}, \alpha^6, \alpha^3, 1) \\
P_{2568} &= (7, 15, 8, 1) = (\alpha^7, \alpha^6, \alpha^3, 1) \\
P_{2569} &= (8, 15, 8, 1) = (\alpha^3, \alpha^6, \alpha^3, 1) \\
P_{2570} &= (9, 15, 8, 1) = (\alpha^4, \alpha^6, \alpha^3, 1) \\
P_{2571} &= (10, 15, 8, 1) = (\alpha^{10}, \alpha^6, \alpha^3, 1) \\
P_{2572} &= (11, 15, 8, 1) = (\alpha^5, \alpha^6, \alpha^3, 1) \\
P_{2573} &= (12, 15, 8, 1) = (\alpha^{14}, \alpha^6, \alpha^3, 1) \\
P_{2574} &= (13, 15, 8, 1) = (\alpha^{11}, \alpha^6, \alpha^3, 1) \\
P_{2575} &= (14, 15, 8, 1) = (\alpha^8, \alpha^6, \alpha^3, 1) \\
P_{2576} &= (15, 15, 8, 1) = (\alpha^6, \alpha^6, \alpha^3, 1) \\
P_{2577} &= (0, 0, 9, 1) = (0, 0, \alpha^4, 1) \\
P_{2578} &= (1, 0, 9, 1) = (1, 0, \alpha^4, 1) \\
P_{2579} &= (2, 0, 9, 1) = (\alpha, 0, \alpha^4, 1) \\
P_{2580} &= (3, 0, 9, 1) = (\alpha^{12}, 0, \alpha^4, 1) \\
P_{2581} &= (4, 0, 9, 1) = (\alpha^2, 0, \alpha^4, 1) \\
P_{2582} &= (5, 0, 9, 1) = (\alpha^9, 0, \alpha^4, 1) \\
P_{2583} &= (6, 0, 9, 1) = (\alpha^{13}, 0, \alpha^4, 1) \\
P_{2584} &= (7, 0, 9, 1) = (\alpha^7, 0, \alpha^4, 1) \\
P_{2585} &= (8, 0, 9, 1) = (\alpha^3, 0, \alpha^4, 1) \\
P_{2586} &= (9, 0, 9, 1) = (\alpha^4, 0, \alpha^4, 1) \\
P_{2587} &= (10, 0, 9, 1) = (\alpha^{10}, 0, \alpha^4, 1) \\
P_{2588} &= (11, 0, 9, 1) = (\alpha^5, 0, \alpha^4, 1) \\
P_{2589} &= (12, 0, 9, 1) = (\alpha^{14}, 0, \alpha^4, 1) \\
P_{2590} &= (13, 0, 9, 1) = (\alpha^{11}, 0, \alpha^4, 1) \\
P_{2591} &= (14, 0, 9, 1) = (\alpha^8, 0, \alpha^4, 1) \\
P_{2592} &= (15, 0, 9, 1) = (\alpha^6, 0, \alpha^4, 1) \\
P_{2593} &= (0, 1, 9, 1) = (0, 1, \alpha^4, 1) \\
P_{2594} &= (1, 1, 9, 1) = (1, 1, \alpha^4, 1) \\
P_{2595} &= (2, 1, 9, 1) = (\alpha, 1, \alpha^4, 1) \\
P_{2596} &= (3, 1, 9, 1) = (\alpha^{12}, 1, \alpha^4, 1) \\
P_{2597} &= (4, 1, 9, 1) = (\alpha^2, 1, \alpha^4, 1) \\
P_{2598} &= (5, 1, 9, 1) = (\alpha^9, 1, \alpha^4, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2599} &= (6, 1, 9, 1) = (\alpha^{13}, 1, \alpha^4, 1) \\
P_{2600} &= (7, 1, 9, 1) = (\alpha^7, 1, \alpha^4, 1) \\
P_{2601} &= (8, 1, 9, 1) = (\alpha^3, 1, \alpha^4, 1) \\
P_{2602} &= (9, 1, 9, 1) = (\alpha^4, 1, \alpha^4, 1) \\
P_{2603} &= (10, 1, 9, 1) = (\alpha^{10}, 1, \alpha^4, 1) \\
P_{2604} &= (11, 1, 9, 1) = (\alpha^5, 1, \alpha^4, 1) \\
P_{2605} &= (12, 1, 9, 1) = (\alpha^{14}, 1, \alpha^4, 1) \\
P_{2606} &= (13, 1, 9, 1) = (\alpha^{11}, 1, \alpha^4, 1) \\
P_{2607} &= (14, 1, 9, 1) = (\alpha^8, 1, \alpha^4, 1) \\
P_{2608} &= (15, 1, 9, 1) = (\alpha^6, 1, \alpha^4, 1) \\
P_{2609} &= (0, 2, 9, 1) = (0, \alpha, \alpha^4, 1) \\
P_{2610} &= (1, 2, 9, 1) = (1, \alpha, \alpha^4, 1) \\
P_{2611} &= (2, 2, 9, 1) = (\alpha, \alpha, \alpha^4, 1) \\
P_{2612} &= (3, 2, 9, 1) = (\alpha^{12}, \alpha, \alpha^4, 1) \\
P_{2613} &= (4, 2, 9, 1) = (\alpha^2, \alpha, \alpha^4, 1) \\
P_{2614} &= (5, 2, 9, 1) = (\alpha^9, \alpha, \alpha^4, 1) \\
P_{2615} &= (6, 2, 9, 1) = (\alpha^{13}, \alpha, \alpha^4, 1) \\
P_{2616} &= (7, 2, 9, 1) = (\alpha^7, \alpha, \alpha^4, 1) \\
P_{2617} &= (8, 2, 9, 1) = (\alpha^3, \alpha, \alpha^4, 1) \\
P_{2618} &= (9, 2, 9, 1) = (\alpha^4, \alpha, \alpha^4, 1) \\
P_{2619} &= (10, 2, 9, 1) = (\alpha^{10}, \alpha, \alpha^4, 1) \\
P_{2620} &= (11, 2, 9, 1) = (\alpha^5, \alpha, \alpha^4, 1) \\
P_{2621} &= (12, 2, 9, 1) = (\alpha^{14}, \alpha, \alpha^4, 1) \\
P_{2622} &= (13, 2, 9, 1) = (\alpha^{11}, \alpha, \alpha^4, 1) \\
P_{2623} &= (14, 2, 9, 1) = (\alpha^8, \alpha, \alpha^4, 1) \\
P_{2624} &= (15, 2, 9, 1) = (\alpha^6, \alpha, \alpha^4, 1) \\
P_{2625} &= (0, 3, 9, 1) = (0, \alpha^{12}, \alpha^4, 1) \\
P_{2626} &= (1, 3, 9, 1) = (1, \alpha^{12}, \alpha^4, 1) \\
P_{2627} &= (2, 3, 9, 1) = (\alpha, \alpha^{12}, \alpha^4, 1) \\
P_{2628} &= (3, 3, 9, 1) = (\alpha^{12}, \alpha^{12}, \alpha^4, 1) \\
P_{2629} &= (4, 3, 9, 1) = (\alpha^2, \alpha^{12}, \alpha^4, 1) \\
P_{2630} &= (5, 3, 9, 1) = (\alpha^9, \alpha^{12}, \alpha^4, 1) \\
P_{2631} &= (6, 3, 9, 1) = (\alpha^{13}, \alpha^{12}, \alpha^4, 1) \\
P_{2632} &= (7, 3, 9, 1) = (\alpha^7, \alpha^{12}, \alpha^4, 1) \\
P_{2633} &= (8, 3, 9, 1) = (\alpha^3, \alpha^{12}, \alpha^4, 1) \\
P_{2634} &= (9, 3, 9, 1) = (\alpha^4, \alpha^{12}, \alpha^4, 1) \\
P_{2635} &= (10, 3, 9, 1) = (\alpha^{10}, \alpha^{12}, \alpha^4, 1) \\
P_{2636} &= (11, 3, 9, 1) = (\alpha^5, \alpha^{12}, \alpha^4, 1) \\
P_{2637} &= (12, 3, 9, 1) = (\alpha^{14}, \alpha^{12}, \alpha^4, 1) \\
P_{2638} &= (13, 3, 9, 1) = (\alpha^{11}, \alpha^{12}, \alpha^4, 1) \\
P_{2639} &= (14, 3, 9, 1) = (\alpha^8, \alpha^{12}, \alpha^4, 1) \\
P_{2640} &= (15, 3, 9, 1) = (\alpha^6, \alpha^{12}, \alpha^4, 1) \\
P_{2641} &= (0, 4, 9, 1) = (0, \alpha^2, \alpha^4, 1) \\
P_{2642} &= (1, 4, 9, 1) = (1, \alpha^2, \alpha^4, 1) \\
P_{2643} &= (2, 4, 9, 1) = (\alpha, \alpha^2, \alpha^4, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2644} &= (3, 4, 9, 1) = (\alpha^{12}, \alpha^2, \alpha^4, 1) \\
P_{2645} &= (4, 4, 9, 1) = (\alpha^2, \alpha^2, \alpha^4, 1) \\
P_{2646} &= (5, 4, 9, 1) = (\alpha^9, \alpha^2, \alpha^4, 1) \\
P_{2647} &= (6, 4, 9, 1) = (\alpha^{13}, \alpha^2, \alpha^4, 1) \\
P_{2648} &= (7, 4, 9, 1) = (\alpha^7, \alpha^2, \alpha^4, 1) \\
P_{2649} &= (8, 4, 9, 1) = (\alpha^3, \alpha^2, \alpha^4, 1) \\
P_{2650} &= (9, 4, 9, 1) = (\alpha^4, \alpha^2, \alpha^4, 1) \\
P_{2651} &= (10, 4, 9, 1) = (\alpha^{10}, \alpha^2, \alpha^4, 1) \\
P_{2652} &= (11, 4, 9, 1) = (\alpha^5, \alpha^2, \alpha^4, 1) \\
P_{2653} &= (12, 4, 9, 1) = (\alpha^{14}, \alpha^2, \alpha^4, 1) \\
P_{2654} &= (13, 4, 9, 1) = (\alpha^{11}, \alpha^2, \alpha^4, 1) \\
P_{2655} &= (14, 4, 9, 1) = (\alpha^8, \alpha^2, \alpha^4, 1) \\
P_{2656} &= (15, 4, 9, 1) = (\alpha^6, \alpha^2, \alpha^4, 1) \\
P_{2657} &= (0, 5, 9, 1) = (0, \alpha^9, \alpha^4, 1) \\
P_{2658} &= (1, 5, 9, 1) = (1, \alpha^9, \alpha^4, 1) \\
P_{2659} &= (2, 5, 9, 1) = (\alpha, \alpha^9, \alpha^4, 1) \\
P_{2660} &= (3, 5, 9, 1) = (\alpha^{12}, \alpha^9, \alpha^4, 1) \\
P_{2661} &= (4, 5, 9, 1) = (\alpha^2, \alpha^9, \alpha^4, 1) \\
P_{2662} &= (5, 5, 9, 1) = (\alpha^9, \alpha^9, \alpha^4, 1) \\
P_{2663} &= (6, 5, 9, 1) = (\alpha^{13}, \alpha^9, \alpha^4, 1) \\
P_{2664} &= (7, 5, 9, 1) = (\alpha^7, \alpha^9, \alpha^4, 1) \\
P_{2665} &= (8, 5, 9, 1) = (\alpha^3, \alpha^9, \alpha^4, 1) \\
P_{2666} &= (9, 5, 9, 1) = (\alpha^4, \alpha^9, \alpha^4, 1) \\
P_{2667} &= (10, 5, 9, 1) = (\alpha^{10}, \alpha^9, \alpha^4, 1) \\
P_{2668} &= (11, 5, 9, 1) = (\alpha^5, \alpha^9, \alpha^4, 1) \\
P_{2669} &= (12, 5, 9, 1) = (\alpha^{14}, \alpha^9, \alpha^4, 1) \\
P_{2670} &= (13, 5, 9, 1) = (\alpha^{11}, \alpha^9, \alpha^4, 1) \\
P_{2671} &= (14, 5, 9, 1) = (\alpha^8, \alpha^9, \alpha^4, 1) \\
P_{2672} &= (15, 5, 9, 1) = (\alpha^6, \alpha^9, \alpha^4, 1) \\
P_{2673} &= (0, 6, 9, 1) = (0, \alpha^{13}, \alpha^4, 1) \\
P_{2674} &= (1, 6, 9, 1) = (1, \alpha^{13}, \alpha^4, 1) \\
P_{2675} &= (2, 6, 9, 1) = (\alpha, \alpha^{13}, \alpha^4, 1) \\
P_{2676} &= (3, 6, 9, 1) = (\alpha^{12}, \alpha^{13}, \alpha^4, 1) \\
P_{2677} &= (4, 6, 9, 1) = (\alpha^2, \alpha^{13}, \alpha^4, 1) \\
P_{2678} &= (5, 6, 9, 1) = (\alpha^9, \alpha^{13}, \alpha^4, 1) \\
P_{2679} &= (6, 6, 9, 1) = (\alpha^{13}, \alpha^{13}, \alpha^4, 1) \\
P_{2680} &= (7, 6, 9, 1) = (\alpha^7, \alpha^{13}, \alpha^4, 1) \\
P_{2681} &= (8, 6, 9, 1) = (\alpha^3, \alpha^{13}, \alpha^4, 1) \\
P_{2682} &= (9, 6, 9, 1) = (\alpha^4, \alpha^{13}, \alpha^4, 1) \\
P_{2683} &= (10, 6, 9, 1) = (\alpha^{10}, \alpha^{13}, \alpha^4, 1) \\
P_{2684} &= (11, 6, 9, 1) = (\alpha^5, \alpha^{13}, \alpha^4, 1) \\
P_{2685} &= (12, 6, 9, 1) = (\alpha^{14}, \alpha^{13}, \alpha^4, 1) \\
P_{2686} &= (13, 6, 9, 1) = (\alpha^{11}, \alpha^{13}, \alpha^4, 1) \\
P_{2687} &= (14, 6, 9, 1) = (\alpha^8, \alpha^{13}, \alpha^4, 1) \\
P_{2688} &= (15, 6, 9, 1) = (\alpha^6, \alpha^{13}, \alpha^4, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2689} &= (0, 7, 9, 1) = (0, \alpha^7, \alpha^4, 1) \\
P_{2690} &= (1, 7, 9, 1) = (1, \alpha^7, \alpha^4, 1) \\
P_{2691} &= (2, 7, 9, 1) = (\alpha, \alpha^7, \alpha^4, 1) \\
P_{2692} &= (3, 7, 9, 1) = (\alpha^{12}, \alpha^7, \alpha^4, 1) \\
P_{2693} &= (4, 7, 9, 1) = (\alpha^2, \alpha^7, \alpha^4, 1) \\
P_{2694} &= (5, 7, 9, 1) = (\alpha^9, \alpha^7, \alpha^4, 1) \\
P_{2695} &= (6, 7, 9, 1) = (\alpha^{13}, \alpha^7, \alpha^4, 1) \\
P_{2696} &= (7, 7, 9, 1) = (\alpha^7, \alpha^7, \alpha^4, 1) \\
P_{2697} &= (8, 7, 9, 1) = (\alpha^3, \alpha^7, \alpha^4, 1) \\
P_{2698} &= (9, 7, 9, 1) = (\alpha^4, \alpha^7, \alpha^4, 1) \\
P_{2699} &= (10, 7, 9, 1) = (\alpha^{10}, \alpha^7, \alpha^4, 1) \\
P_{2700} &= (11, 7, 9, 1) = (\alpha^5, \alpha^7, \alpha^4, 1) \\
P_{2701} &= (12, 7, 9, 1) = (\alpha^{14}, \alpha^7, \alpha^4, 1) \\
P_{2702} &= (13, 7, 9, 1) = (\alpha^{11}, \alpha^7, \alpha^4, 1) \\
P_{2703} &= (14, 7, 9, 1) = (\alpha^8, \alpha^7, \alpha^4, 1) \\
P_{2704} &= (15, 7, 9, 1) = (\alpha^6, \alpha^7, \alpha^4, 1) \\
P_{2705} &= (0, 8, 9, 1) = (0, \alpha^3, \alpha^4, 1) \\
P_{2706} &= (1, 8, 9, 1) = (1, \alpha^3, \alpha^4, 1) \\
P_{2707} &= (2, 8, 9, 1) = (\alpha, \alpha^3, \alpha^4, 1) \\
P_{2708} &= (3, 8, 9, 1) = (\alpha^{12}, \alpha^3, \alpha^4, 1) \\
P_{2709} &= (4, 8, 9, 1) = (\alpha^2, \alpha^3, \alpha^4, 1) \\
P_{2710} &= (5, 8, 9, 1) = (\alpha^9, \alpha^3, \alpha^4, 1) \\
P_{2711} &= (6, 8, 9, 1) = (\alpha^{13}, \alpha^3, \alpha^4, 1) \\
P_{2712} &= (7, 8, 9, 1) = (\alpha^7, \alpha^3, \alpha^4, 1) \\
P_{2713} &= (8, 8, 9, 1) = (\alpha^3, \alpha^3, \alpha^4, 1) \\
P_{2714} &= (9, 8, 9, 1) = (\alpha^4, \alpha^3, \alpha^4, 1) \\
P_{2715} &= (10, 8, 9, 1) = (\alpha^{10}, \alpha^3, \alpha^4, 1) \\
P_{2716} &= (11, 8, 9, 1) = (\alpha^5, \alpha^3, \alpha^4, 1) \\
P_{2717} &= (12, 8, 9, 1) = (\alpha^{14}, \alpha^3, \alpha^4, 1) \\
P_{2718} &= (13, 8, 9, 1) = (\alpha^{11}, \alpha^3, \alpha^4, 1) \\
P_{2719} &= (14, 8, 9, 1) = (\alpha^8, \alpha^3, \alpha^4, 1) \\
P_{2720} &= (15, 8, 9, 1) = (\alpha^6, \alpha^3, \alpha^4, 1) \\
P_{2721} &= (0, 9, 9, 1) = (0, \alpha^4, \alpha^4, 1) \\
P_{2722} &= (1, 9, 9, 1) = (1, \alpha^4, \alpha^4, 1) \\
P_{2723} &= (2, 9, 9, 1) = (\alpha, \alpha^4, \alpha^4, 1) \\
P_{2724} &= (3, 9, 9, 1) = (\alpha^{12}, \alpha^4, \alpha^4, 1) \\
P_{2725} &= (4, 9, 9, 1) = (\alpha^2, \alpha^4, \alpha^4, 1) \\
P_{2726} &= (5, 9, 9, 1) = (\alpha^9, \alpha^4, \alpha^4, 1) \\
P_{2727} &= (6, 9, 9, 1) = (\alpha^{13}, \alpha^4, \alpha^4, 1) \\
P_{2728} &= (7, 9, 9, 1) = (\alpha^7, \alpha^4, \alpha^4, 1) \\
P_{2729} &= (8, 9, 9, 1) = (\alpha^3, \alpha^4, \alpha^4, 1) \\
P_{2730} &= (9, 9, 9, 1) = (\alpha^4, \alpha^4, \alpha^4, 1) \\
P_{2731} &= (10, 9, 9, 1) = (\alpha^{10}, \alpha^4, \alpha^4, 1) \\
P_{2732} &= (11, 9, 9, 1) = (\alpha^5, \alpha^4, \alpha^4, 1) \\
P_{2733} &= (12, 9, 9, 1) = (\alpha^{14}, \alpha^4, \alpha^4, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2734} &= (13, 9, 9, 1) = (\alpha^{11}, \alpha^4, \alpha^4, 1) \\
P_{2735} &= (14, 9, 9, 1) = (\alpha^8, \alpha^4, \alpha^4, 1) \\
P_{2736} &= (15, 9, 9, 1) = (\alpha^6, \alpha^4, \alpha^4, 1) \\
P_{2737} &= (0, 10, 9, 1) = (0, \alpha^{10}, \alpha^4, 1) \\
P_{2738} &= (1, 10, 9, 1) = (1, \alpha^{10}, \alpha^4, 1) \\
P_{2739} &= (2, 10, 9, 1) = (\alpha, \alpha^{10}, \alpha^4, 1) \\
P_{2740} &= (3, 10, 9, 1) = (\alpha^{12}, \alpha^{10}, \alpha^4, 1) \\
P_{2741} &= (4, 10, 9, 1) = (\alpha^2, \alpha^{10}, \alpha^4, 1) \\
P_{2742} &= (5, 10, 9, 1) = (\alpha^9, \alpha^{10}, \alpha^4, 1) \\
P_{2743} &= (6, 10, 9, 1) = (\alpha^{13}, \alpha^{10}, \alpha^4, 1) \\
P_{2744} &= (7, 10, 9, 1) = (\alpha^7, \alpha^{10}, \alpha^4, 1) \\
P_{2745} &= (8, 10, 9, 1) = (\alpha^3, \alpha^{10}, \alpha^4, 1) \\
P_{2746} &= (9, 10, 9, 1) = (\alpha^4, \alpha^{10}, \alpha^4, 1) \\
P_{2747} &= (10, 10, 9, 1) = (\alpha^{10}, \alpha^{10}, \alpha^4, 1) \\
P_{2748} &= (11, 10, 9, 1) = (\alpha^5, \alpha^{10}, \alpha^4, 1) \\
P_{2749} &= (12, 10, 9, 1) = (\alpha^{14}, \alpha^{10}, \alpha^4, 1) \\
P_{2750} &= (13, 10, 9, 1) = (\alpha^{11}, \alpha^{10}, \alpha^4, 1) \\
P_{2751} &= (14, 10, 9, 1) = (\alpha^8, \alpha^{10}, \alpha^4, 1) \\
P_{2752} &= (15, 10, 9, 1) = (\alpha^6, \alpha^{10}, \alpha^4, 1) \\
P_{2753} &= (0, 11, 9, 1) = (0, \alpha^5, \alpha^4, 1) \\
P_{2754} &= (1, 11, 9, 1) = (1, \alpha^5, \alpha^4, 1) \\
P_{2755} &= (2, 11, 9, 1) = (\alpha, \alpha^5, \alpha^4, 1) \\
P_{2756} &= (3, 11, 9, 1) = (\alpha^{12}, \alpha^5, \alpha^4, 1) \\
P_{2757} &= (4, 11, 9, 1) = (\alpha^2, \alpha^5, \alpha^4, 1) \\
P_{2758} &= (5, 11, 9, 1) = (\alpha^9, \alpha^5, \alpha^4, 1) \\
P_{2759} &= (6, 11, 9, 1) = (\alpha^{13}, \alpha^5, \alpha^4, 1) \\
P_{2760} &= (7, 11, 9, 1) = (\alpha^7, \alpha^5, \alpha^4, 1) \\
P_{2761} &= (8, 11, 9, 1) = (\alpha^3, \alpha^5, \alpha^4, 1) \\
P_{2762} &= (9, 11, 9, 1) = (\alpha^4, \alpha^5, \alpha^4, 1) \\
P_{2763} &= (10, 11, 9, 1) = (\alpha^{10}, \alpha^5, \alpha^4, 1) \\
P_{2764} &= (11, 11, 9, 1) = (\alpha^5, \alpha^5, \alpha^4, 1) \\
P_{2765} &= (12, 11, 9, 1) = (\alpha^{14}, \alpha^5, \alpha^4, 1) \\
P_{2766} &= (13, 11, 9, 1) = (\alpha^{11}, \alpha^5, \alpha^4, 1) \\
P_{2767} &= (14, 11, 9, 1) = (\alpha^8, \alpha^5, \alpha^4, 1) \\
P_{2768} &= (15, 11, 9, 1) = (\alpha^6, \alpha^5, \alpha^4, 1) \\
P_{2769} &= (0, 12, 9, 1) = (0, \alpha^{14}, \alpha^4, 1) \\
P_{2770} &= (1, 12, 9, 1) = (1, \alpha^{14}, \alpha^4, 1) \\
P_{2771} &= (2, 12, 9, 1) = (\alpha, \alpha^{14}, \alpha^4, 1) \\
P_{2772} &= (3, 12, 9, 1) = (\alpha^{12}, \alpha^{14}, \alpha^4, 1) \\
P_{2773} &= (4, 12, 9, 1) = (\alpha^2, \alpha^{14}, \alpha^4, 1) \\
P_{2774} &= (5, 12, 9, 1) = (\alpha^9, \alpha^{14}, \alpha^4, 1) \\
P_{2775} &= (6, 12, 9, 1) = (\alpha^{13}, \alpha^{14}, \alpha^4, 1) \\
P_{2776} &= (7, 12, 9, 1) = (\alpha^7, \alpha^{14}, \alpha^4, 1) \\
P_{2777} &= (8, 12, 9, 1) = (\alpha^3, \alpha^{14}, \alpha^4, 1) \\
P_{2778} &= (9, 12, 9, 1) = (\alpha^4, \alpha^{14}, \alpha^4, 1) \\
P_{2779} &= (10, 12, 9, 1) = (\alpha^{10}, \alpha^{14}, \alpha^4, 1) \\
P_{2780} &= (11, 12, 9, 1) = (\alpha^5, \alpha^{14}, \alpha^4, 1) \\
P_{2781} &= (12, 12, 9, 1) = (\alpha^{14}, \alpha^{14}, \alpha^4, 1) \\
P_{2782} &= (13, 12, 9, 1) = (\alpha^{11}, \alpha^{14}, \alpha^4, 1) \\
P_{2783} &= (14, 12, 9, 1) = (\alpha^8, \alpha^{14}, \alpha^4, 1) \\
P_{2784} &= (15, 12, 9, 1) = (\alpha^6, \alpha^{14}, \alpha^4, 1) \\
P_{2785} &= (0, 13, 9, 1) = (0, \alpha^{11}, \alpha^4, 1) \\
P_{2786} &= (1, 13, 9, 1) = (1, \alpha^{11}, \alpha^4, 1) \\
P_{2787} &= (2, 13, 9, 1) = (\alpha, \alpha^{11}, \alpha^4, 1) \\
P_{2788} &= (3, 13, 9, 1) = (\alpha^{12}, \alpha^{11}, \alpha^4, 1) \\
P_{2789} &= (4, 13, 9, 1) = (\alpha^2, \alpha^{11}, \alpha^4, 1) \\
P_{2790} &= (5, 13, 9, 1) = (\alpha^9, \alpha^{11}, \alpha^4, 1) \\
P_{2791} &= (6, 13, 9, 1) = (\alpha^{13}, \alpha^{11}, \alpha^4, 1) \\
P_{2792} &= (7, 13, 9, 1) = (\alpha^7, \alpha^{11}, \alpha^4, 1) \\
P_{2793} &= (8, 13, 9, 1) = (\alpha^3, \alpha^{11}, \alpha^4, 1) \\
P_{2794} &= (9, 13, 9, 1) = (\alpha^4, \alpha^{11}, \alpha^4, 1) \\
P_{2795} &= (10, 13, 9, 1) = (\alpha^{10}, \alpha^{11}, \alpha^4, 1) \\
P_{2796} &= (11, 13, 9, 1) = (\alpha^5, \alpha^{11}, \alpha^4, 1) \\
P_{2797} &= (12, 13, 9, 1) = (\alpha^{14}, \alpha^{11}, \alpha^4, 1) \\
P_{2798} &= (13, 13, 9, 1) = (\alpha^{11}, \alpha^{11}, \alpha^4, 1) \\
P_{2799} &= (14, 13, 9, 1) = (\alpha^8, \alpha^{11}, \alpha^4, 1) \\
P_{2800} &= (15, 13, 9, 1) = (\alpha^6, \alpha^{11}, \alpha^4, 1) \\
P_{2801} &= (0, 14, 9, 1) = (0, \alpha^8, \alpha^4, 1) \\
P_{2802} &= (1, 14, 9, 1) = (1, \alpha^8, \alpha^4, 1) \\
P_{2803} &= (2, 14, 9, 1) = (\alpha, \alpha^8, \alpha^4, 1) \\
P_{2804} &= (3, 14, 9, 1) = (\alpha^{12}, \alpha^8, \alpha^4, 1) \\
P_{2805} &= (4, 14, 9, 1) = (\alpha^2, \alpha^8, \alpha^4, 1) \\
P_{2806} &= (5, 14, 9, 1) = (\alpha^9, \alpha^8, \alpha^4, 1) \\
P_{2807} &= (6, 14, 9, 1) = (\alpha^{13}, \alpha^8, \alpha^4, 1) \\
P_{2808} &= (7, 14, 9, 1) = (\alpha^7, \alpha^8, \alpha^4, 1) \\
P_{2809} &= (8, 14, 9, 1) = (\alpha^3, \alpha^8, \alpha^4, 1) \\
P_{2810} &= (9, 14, 9, 1) = (\alpha^4, \alpha^8, \alpha^4, 1) \\
P_{2811} &= (10, 14, 9, 1) = (\alpha^{10}, \alpha^8, \alpha^4, 1) \\
P_{2812} &= (11, 14, 9, 1) = (\alpha^5, \alpha^8, \alpha^4, 1) \\
P_{2813} &= (12, 14, 9, 1) = (\alpha^{14}, \alpha^8, \alpha^4, 1) \\
P_{2814} &= (13, 14, 9, 1) = (\alpha^{11}, \alpha^8, \alpha^4, 1) \\
P_{2815} &= (14, 14, 9, 1) = (\alpha^8, \alpha^8, \alpha^4, 1) \\
P_{2816} &= (15, 14, 9, 1) = (\alpha^6, \alpha^8, \alpha^4, 1) \\
P_{2817} &= (0, 15, 9, 1) = (0, \alpha^6, \alpha^4, 1) \\
P_{2818} &= (1, 15, 9, 1) = (1, \alpha^6, \alpha^4, 1) \\
P_{2819} &= (2, 15, 9, 1) = (\alpha, \alpha^6, \alpha^4, 1) \\
P_{2820} &= (3, 15, 9, 1) = (\alpha^{12}, \alpha^6, \alpha^4, 1) \\
P_{2821} &= (4, 15, 9, 1) = (\alpha^2, \alpha^6, \alpha^4, 1) \\
P_{2822} &= (5, 15, 9, 1) = (\alpha^9, \alpha^6, \alpha^4, 1) \\
P_{2823} &= (6, 15, 9, 1) = (\alpha^{13}, \alpha^6, \alpha^4, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2824} &= (7, 15, 9, 1) = (\alpha^7, \alpha^6, \alpha^4, 1) \\
P_{2825} &= (8, 15, 9, 1) = (\alpha^3, \alpha^6, \alpha^4, 1) \\
P_{2826} &= (9, 15, 9, 1) = (\alpha^4, \alpha^6, \alpha^4, 1) \\
P_{2827} &= (10, 15, 9, 1) = (\alpha^{10}, \alpha^6, \alpha^4, 1) \\
P_{2828} &= (11, 15, 9, 1) = (\alpha^5, \alpha^6, \alpha^4, 1) \\
P_{2829} &= (12, 15, 9, 1) = (\alpha^{14}, \alpha^6, \alpha^4, 1) \\
P_{2830} &= (13, 15, 9, 1) = (\alpha^{11}, \alpha^6, \alpha^4, 1) \\
P_{2831} &= (14, 15, 9, 1) = (\alpha^8, \alpha^6, \alpha^4, 1) \\
P_{2832} &= (15, 15, 9, 1) = (\alpha^6, \alpha^6, \alpha^4, 1) \\
P_{2833} &= (0, 0, 10, 1) = (0, 0, \alpha^{10}, 1) \\
P_{2834} &= (1, 0, 10, 1) = (1, 0, \alpha^{10}, 1) \\
P_{2835} &= (2, 0, 10, 1) = (\alpha, 0, \alpha^{10}, 1) \\
P_{2836} &= (3, 0, 10, 1) = (\alpha^{12}, 0, \alpha^{10}, 1) \\
P_{2837} &= (4, 0, 10, 1) = (\alpha^2, 0, \alpha^{10}, 1) \\
P_{2838} &= (5, 0, 10, 1) = (\alpha^9, 0, \alpha^{10}, 1) \\
P_{2839} &= (6, 0, 10, 1) = (\alpha^{13}, 0, \alpha^{10}, 1) \\
P_{2840} &= (7, 0, 10, 1) = (\alpha^7, 0, \alpha^{10}, 1) \\
P_{2841} &= (8, 0, 10, 1) = (\alpha^3, 0, \alpha^{10}, 1) \\
P_{2842} &= (9, 0, 10, 1) = (\alpha^4, 0, \alpha^{10}, 1) \\
P_{2843} &= (10, 0, 10, 1) = (\alpha^{10}, 0, \alpha^{10}, 1) \\
P_{2844} &= (11, 0, 10, 1) = (\alpha^5, 0, \alpha^{10}, 1) \\
P_{2845} &= (12, 0, 10, 1) = (\alpha^{14}, 0, \alpha^{10}, 1) \\
P_{2846} &= (13, 0, 10, 1) = (\alpha^{11}, 0, \alpha^{10}, 1) \\
P_{2847} &= (14, 0, 10, 1) = (\alpha^8, 0, \alpha^{10}, 1) \\
P_{2848} &= (15, 0, 10, 1) = (\alpha^6, 0, \alpha^{10}, 1) \\
P_{2849} &= (0, 1, 10, 1) = (0, 1, \alpha^{10}, 1) \\
P_{2850} &= (1, 1, 10, 1) = (1, 1, \alpha^{10}, 1) \\
P_{2851} &= (2, 1, 10, 1) = (\alpha, 1, \alpha^{10}, 1) \\
P_{2852} &= (3, 1, 10, 1) = (\alpha^{12}, 1, \alpha^{10}, 1) \\
P_{2853} &= (4, 1, 10, 1) = (\alpha^2, 1, \alpha^{10}, 1) \\
P_{2854} &= (5, 1, 10, 1) = (\alpha^9, 1, \alpha^{10}, 1) \\
P_{2855} &= (6, 1, 10, 1) = (\alpha^{13}, 1, \alpha^{10}, 1) \\
P_{2856} &= (7, 1, 10, 1) = (\alpha^7, 1, \alpha^{10}, 1) \\
P_{2857} &= (8, 1, 10, 1) = (\alpha^3, 1, \alpha^{10}, 1) \\
P_{2858} &= (9, 1, 10, 1) = (\alpha^4, 1, \alpha^{10}, 1) \\
P_{2859} &= (10, 1, 10, 1) = (\alpha^{10}, 1, \alpha^{10}, 1) \\
P_{2860} &= (11, 1, 10, 1) = (\alpha^5, 1, \alpha^{10}, 1) \\
P_{2861} &= (12, 1, 10, 1) = (\alpha^{14}, 1, \alpha^{10}, 1) \\
P_{2862} &= (13, 1, 10, 1) = (\alpha^{11}, 1, \alpha^{10}, 1) \\
P_{2863} &= (14, 1, 10, 1) = (\alpha^8, 1, \alpha^{10}, 1) \\
P_{2864} &= (15, 1, 10, 1) = (\alpha^6, 1, \alpha^{10}, 1) \\
P_{2865} &= (0, 2, 10, 1) = (0, \alpha, \alpha^{10}, 1) \\
P_{2866} &= (1, 2, 10, 1) = (1, \alpha, \alpha^{10}, 1) \\
P_{2867} &= (2, 2, 10, 1) = (\alpha, \alpha, \alpha^{10}, 1) \\
P_{2868} &= (3, 2, 10, 1) = (\alpha^{12}, \alpha, \alpha^{10}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2869} &= (4, 2, 10, 1) = (\alpha^2, \alpha, \alpha^{10}, 1) \\
P_{2870} &= (5, 2, 10, 1) = (\alpha^9, \alpha, \alpha^{10}, 1) \\
P_{2871} &= (6, 2, 10, 1) = (\alpha^{13}, \alpha, \alpha^{10}, 1) \\
P_{2872} &= (7, 2, 10, 1) = (\alpha^7, \alpha, \alpha^{10}, 1) \\
P_{2873} &= (8, 2, 10, 1) = (\alpha^3, \alpha, \alpha^{10}, 1) \\
P_{2874} &= (9, 2, 10, 1) = (\alpha^4, \alpha, \alpha^{10}, 1) \\
P_{2875} &= (10, 2, 10, 1) = (\alpha^{10}, \alpha, \alpha^{10}, 1) \\
P_{2876} &= (11, 2, 10, 1) = (\alpha^5, \alpha, \alpha^{10}, 1) \\
P_{2877} &= (12, 2, 10, 1) = (\alpha^{14}, \alpha, \alpha^{10}, 1) \\
P_{2878} &= (13, 2, 10, 1) = (\alpha^{11}, \alpha, \alpha^{10}, 1) \\
P_{2879} &= (14, 2, 10, 1) = (\alpha^8, \alpha, \alpha^{10}, 1) \\
P_{2880} &= (15, 2, 10, 1) = (\alpha^6, \alpha, \alpha^{10}, 1) \\
P_{2881} &= (0, 3, 10, 1) = (0, \alpha^{12}, \alpha^{10}, 1) \\
P_{2882} &= (1, 3, 10, 1) = (1, \alpha^{12}, \alpha^{10}, 1) \\
P_{2883} &= (2, 3, 10, 1) = (\alpha, \alpha^{12}, \alpha^{10}, 1) \\
P_{2884} &= (3, 3, 10, 1) = (\alpha^{12}, \alpha^{12}, \alpha^{10}, 1) \\
P_{2885} &= (4, 3, 10, 1) = (\alpha^2, \alpha^{12}, \alpha^{10}, 1) \\
P_{2886} &= (5, 3, 10, 1) = (\alpha^9, \alpha^{12}, \alpha^{10}, 1) \\
P_{2887} &= (6, 3, 10, 1) = (\alpha^{13}, \alpha^{12}, \alpha^{10}, 1) \\
P_{2888} &= (7, 3, 10, 1) = (\alpha^7, \alpha^{12}, \alpha^{10}, 1) \\
P_{2889} &= (8, 3, 10, 1) = (\alpha^3, \alpha^{12}, \alpha^{10}, 1) \\
P_{2890} &= (9, 3, 10, 1) = (\alpha^4, \alpha^{12}, \alpha^{10}, 1) \\
P_{2891} &= (10, 3, 10, 1) = (\alpha^{10}, \alpha^{12}, \alpha^{10}, 1) \\
P_{2892} &= (11, 3, 10, 1) = (\alpha^5, \alpha^{12}, \alpha^{10}, 1) \\
P_{2893} &= (12, 3, 10, 1) = (\alpha^{14}, \alpha^{12}, \alpha^{10}, 1) \\
P_{2894} &= (13, 3, 10, 1) = (\alpha^{11}, \alpha^{12}, \alpha^{10}, 1) \\
P_{2895} &= (14, 3, 10, 1) = (\alpha^8, \alpha^{12}, \alpha^{10}, 1) \\
P_{2896} &= (15, 3, 10, 1) = (\alpha^6, \alpha^{12}, \alpha^{10}, 1) \\
P_{2897} &= (0, 4, 10, 1) = (0, \alpha^2, \alpha^{10}, 1) \\
P_{2898} &= (1, 4, 10, 1) = (1, \alpha^2, \alpha^{10}, 1) \\
P_{2899} &= (2, 4, 10, 1) = (\alpha, \alpha^2, \alpha^{10}, 1) \\
P_{2900} &= (3, 4, 10, 1) = (\alpha^{12}, \alpha^2, \alpha^{10}, 1) \\
P_{2901} &= (4, 4, 10, 1) = (\alpha^2, \alpha^2, \alpha^{10}, 1) \\
P_{2902} &= (5, 4, 10, 1) = (\alpha^9, \alpha^2, \alpha^{10}, 1) \\
P_{2903} &= (6, 4, 10, 1) = (\alpha^{13}, \alpha^2, \alpha^{10}, 1) \\
P_{2904} &= (7, 4, 10, 1) = (\alpha^7, \alpha^2, \alpha^{10}, 1) \\
P_{2905} &= (8, 4, 10, 1) = (\alpha^3, \alpha^2, \alpha^{10}, 1) \\
P_{2906} &= (9, 4, 10, 1) = (\alpha^4, \alpha^2, \alpha^{10}, 1) \\
P_{2907} &= (10, 4, 10, 1) = (\alpha^{10}, \alpha^2, \alpha^{10}, 1) \\
P_{2908} &= (11, 4, 10, 1) = (\alpha^5, \alpha^2, \alpha^{10}, 1) \\
P_{2909} &= (12, 4, 10, 1) = (\alpha^{14}, \alpha^2, \alpha^{10}, 1) \\
P_{2910} &= (13, 4, 10, 1) = (\alpha^{11}, \alpha^2, \alpha^{10}, 1) \\
P_{2911} &= (14, 4, 10, 1) = (\alpha^8, \alpha^2, \alpha^{10}, 1) \\
P_{2912} &= (15, 4, 10, 1) = (\alpha^6, \alpha^2, \alpha^{10}, 1) \\
P_{2913} &= (0, 5, 10, 1) = (0, \alpha^9, \alpha^{10}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2914} &= (1, 5, 10, 1) = (1, \alpha^9, \alpha^{10}, 1) \\
P_{2915} &= (2, 5, 10, 1) = (\alpha, \alpha^9, \alpha^{10}, 1) \\
P_{2916} &= (3, 5, 10, 1) = (\alpha^{12}, \alpha^9, \alpha^{10}, 1) \\
P_{2917} &= (4, 5, 10, 1) = (\alpha^2, \alpha^9, \alpha^{10}, 1) \\
P_{2918} &= (5, 5, 10, 1) = (\alpha^9, \alpha^9, \alpha^{10}, 1) \\
P_{2919} &= (6, 5, 10, 1) = (\alpha^{13}, \alpha^9, \alpha^{10}, 1) \\
P_{2920} &= (7, 5, 10, 1) = (\alpha^7, \alpha^9, \alpha^{10}, 1) \\
P_{2921} &= (8, 5, 10, 1) = (\alpha^3, \alpha^9, \alpha^{10}, 1) \\
P_{2922} &= (9, 5, 10, 1) = (\alpha^4, \alpha^9, \alpha^{10}, 1) \\
P_{2923} &= (10, 5, 10, 1) = (\alpha^{10}, \alpha^9, \alpha^{10}, 1) \\
P_{2924} &= (11, 5, 10, 1) = (\alpha^5, \alpha^9, \alpha^{10}, 1) \\
P_{2925} &= (12, 5, 10, 1) = (\alpha^{14}, \alpha^9, \alpha^{10}, 1) \\
P_{2926} &= (13, 5, 10, 1) = (\alpha^{11}, \alpha^9, \alpha^{10}, 1) \\
P_{2927} &= (14, 5, 10, 1) = (\alpha^8, \alpha^9, \alpha^{10}, 1) \\
P_{2928} &= (15, 5, 10, 1) = (\alpha^6, \alpha^9, \alpha^{10}, 1) \\
P_{2929} &= (0, 6, 10, 1) = (0, \alpha^{13}, \alpha^{10}, 1) \\
P_{2930} &= (1, 6, 10, 1) = (1, \alpha^{13}, \alpha^{10}, 1) \\
P_{2931} &= (2, 6, 10, 1) = (\alpha, \alpha^{13}, \alpha^{10}, 1) \\
P_{2932} &= (3, 6, 10, 1) = (\alpha^{12}, \alpha^{13}, \alpha^{10}, 1) \\
P_{2933} &= (4, 6, 10, 1) = (\alpha^2, \alpha^{13}, \alpha^{10}, 1) \\
P_{2934} &= (5, 6, 10, 1) = (\alpha^9, \alpha^{13}, \alpha^{10}, 1) \\
P_{2935} &= (6, 6, 10, 1) = (\alpha^{13}, \alpha^{13}, \alpha^{10}, 1) \\
P_{2936} &= (7, 6, 10, 1) = (\alpha^7, \alpha^{13}, \alpha^{10}, 1) \\
P_{2937} &= (8, 6, 10, 1) = (\alpha^3, \alpha^{13}, \alpha^{10}, 1) \\
P_{2938} &= (9, 6, 10, 1) = (\alpha^4, \alpha^{13}, \alpha^{10}, 1) \\
P_{2939} &= (10, 6, 10, 1) = (\alpha^{10}, \alpha^{13}, \alpha^{10}, 1) \\
P_{2940} &= (11, 6, 10, 1) = (\alpha^5, \alpha^{13}, \alpha^{10}, 1) \\
P_{2941} &= (12, 6, 10, 1) = (\alpha^{14}, \alpha^{13}, \alpha^{10}, 1) \\
P_{2942} &= (13, 6, 10, 1) = (\alpha^{11}, \alpha^{13}, \alpha^{10}, 1) \\
P_{2943} &= (14, 6, 10, 1) = (\alpha^8, \alpha^{13}, \alpha^{10}, 1) \\
P_{2944} &= (15, 6, 10, 1) = (\alpha^6, \alpha^{13}, \alpha^{10}, 1) \\
P_{2945} &= (0, 7, 10, 1) = (0, \alpha^7, \alpha^{10}, 1) \\
P_{2946} &= (1, 7, 10, 1) = (1, \alpha^7, \alpha^{10}, 1) \\
P_{2947} &= (2, 7, 10, 1) = (\alpha, \alpha^7, \alpha^{10}, 1) \\
P_{2948} &= (3, 7, 10, 1) = (\alpha^{12}, \alpha^7, \alpha^{10}, 1) \\
P_{2949} &= (4, 7, 10, 1) = (\alpha^2, \alpha^7, \alpha^{10}, 1) \\
P_{2950} &= (5, 7, 10, 1) = (\alpha^9, \alpha^7, \alpha^{10}, 1) \\
P_{2951} &= (6, 7, 10, 1) = (\alpha^{13}, \alpha^7, \alpha^{10}, 1) \\
P_{2952} &= (7, 7, 10, 1) = (\alpha^7, \alpha^7, \alpha^{10}, 1) \\
P_{2953} &= (8, 7, 10, 1) = (\alpha^3, \alpha^7, \alpha^{10}, 1) \\
P_{2954} &= (9, 7, 10, 1) = (\alpha^4, \alpha^7, \alpha^{10}, 1) \\
P_{2955} &= (10, 7, 10, 1) = (\alpha^{10}, \alpha^7, \alpha^{10}, 1) \\
P_{2956} &= (11, 7, 10, 1) = (\alpha^5, \alpha^7, \alpha^{10}, 1) \\
P_{2957} &= (12, 7, 10, 1) = (\alpha^{14}, \alpha^7, \alpha^{10}, 1) \\
P_{2958} &= (13, 7, 10, 1) = (\alpha^{11}, \alpha^7, \alpha^{10}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{2959} &= (14, 7, 10, 1) = (\alpha^8, \alpha^7, \alpha^{10}, 1) \\
P_{2960} &= (15, 7, 10, 1) = (\alpha^6, \alpha^7, \alpha^{10}, 1) \\
P_{2961} &= (0, 8, 10, 1) = (0, \alpha^3, \alpha^{10}, 1) \\
P_{2962} &= (1, 8, 10, 1) = (1, \alpha^3, \alpha^{10}, 1) \\
P_{2963} &= (2, 8, 10, 1) = (\alpha, \alpha^3, \alpha^{10}, 1) \\
P_{2964} &= (3, 8, 10, 1) = (\alpha^{12}, \alpha^3, \alpha^{10}, 1) \\
P_{2965} &= (4, 8, 10, 1) = (\alpha^2, \alpha^3, \alpha^{10}, 1) \\
P_{2966} &= (5, 8, 10, 1) = (\alpha^9, \alpha^3, \alpha^{10}, 1) \\
P_{2967} &= (6, 8, 10, 1) = (\alpha^{13}, \alpha^3, \alpha^{10}, 1) \\
P_{2968} &= (7, 8, 10, 1) = (\alpha^7, \alpha^3, \alpha^{10}, 1) \\
P_{2969} &= (8, 8, 10, 1) = (\alpha^3, \alpha^3, \alpha^{10}, 1) \\
P_{2970} &= (9, 8, 10, 1) = (\alpha^4, \alpha^3, \alpha^{10}, 1) \\
P_{2971} &= (10, 8, 10, 1) = (\alpha^{10}, \alpha^3, \alpha^{10}, 1) \\
P_{2972} &= (11, 8, 10, 1) = (\alpha^5, \alpha^3, \alpha^{10}, 1) \\
P_{2973} &= (12, 8, 10, 1) = (\alpha^{14}, \alpha^3, \alpha^{10}, 1) \\
P_{2974} &= (13, 8, 10, 1) = (\alpha^{11}, \alpha^3, \alpha^{10}, 1) \\
P_{2975} &= (14, 8, 10, 1) = (\alpha^8, \alpha^3, \alpha^{10}, 1) \\
P_{2976} &= (15, 8, 10, 1) = (\alpha^6, \alpha^3, \alpha^{10}, 1) \\
P_{2977} &= (0, 9, 10, 1) = (0, \alpha^4, \alpha^{10}, 1) \\
P_{2978} &= (1, 9, 10, 1) = (1, \alpha^4, \alpha^{10}, 1) \\
P_{2979} &= (2, 9, 10, 1) = (\alpha, \alpha^4, \alpha^{10}, 1) \\
P_{2980} &= (3, 9, 10, 1) = (\alpha^{12}, \alpha^4, \alpha^{10}, 1) \\
P_{2981} &= (4, 9, 10, 1) = (\alpha^2, \alpha^4, \alpha^{10}, 1) \\
P_{2982} &= (5, 9, 10, 1) = (\alpha^9, \alpha^4, \alpha^{10}, 1) \\
P_{2983} &= (6, 9, 10, 1) = (\alpha^{13}, \alpha^4, \alpha^{10}, 1) \\
P_{2984} &= (7, 9, 10, 1) = (\alpha^7, \alpha^4, \alpha^{10}, 1) \\
P_{2985} &= (8, 9, 10, 1) = (\alpha^3, \alpha^4, \alpha^{10}, 1) \\
P_{2986} &= (9, 9, 10, 1) = (\alpha^4, \alpha^4, \alpha^{10}, 1) \\
P_{2987} &= (10, 9, 10, 1) = (\alpha^{10}, \alpha^4, \alpha^{10}, 1) \\
P_{2988} &= (11, 9, 10, 1) = (\alpha^5, \alpha^4, \alpha^{10}, 1) \\
P_{2989} &= (12, 9, 10, 1) = (\alpha^{14}, \alpha^4, \alpha^{10}, 1) \\
P_{2990} &= (13, 9, 10, 1) = (\alpha^{11}, \alpha^4, \alpha^{10}, 1) \\
P_{2991} &= (14, 9, 10, 1) = (\alpha^8, \alpha^4, \alpha^{10}, 1) \\
P_{2992} &= (15, 9, 10, 1) = (\alpha^6, \alpha^4, \alpha^{10}, 1) \\
P_{2993} &= (0, 10, 10, 1) = (0, \alpha^{10}, \alpha^{10}, 1) \\
P_{2994} &= (1, 10, 10, 1) = (1, \alpha^{10}, \alpha^{10}, 1) \\
P_{2995} &= (2, 10, 10, 1) = (\alpha, \alpha^{10}, \alpha^{10}, 1) \\
P_{2996} &= (3, 10, 10, 1) = (\alpha^{12}, \alpha^{10}, \alpha^{10}, 1) \\
P_{2997} &= (4, 10, 10, 1) = (\alpha^2, \alpha^{10}, \alpha^{10}, 1) \\
P_{2998} &= (5, 10, 10, 1) = (\alpha^9, \alpha^{10}, \alpha^{10}, 1) \\
P_{2999} &= (6, 10, 10, 1) = (\alpha^{13}, \alpha^{10}, \alpha^{10}, 1) \\
P_{3000} &= (7, 10, 10, 1) = (\alpha^7, \alpha^{10}, \alpha^{10}, 1) \\
P_{3001} &= (8, 10, 10, 1) = (\alpha^3, \alpha^{10}, \alpha^{10}, 1) \\
P_{3002} &= (9, 10, 10, 1) = (\alpha^4, \alpha^{10}, \alpha^{10}, 1) \\
P_{3003} &= (10, 10, 10, 1) = (\alpha^{10}, \alpha^{10}, \alpha^{10}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3094} &= (5, 0, 11, 1) = (\alpha^9, 0, \alpha^5, 1) \\
P_{3095} &= (6, 0, 11, 1) = (\alpha^{13}, 0, \alpha^5, 1) \\
P_{3096} &= (7, 0, 11, 1) = (\alpha^7, 0, \alpha^5, 1) \\
P_{3097} &= (8, 0, 11, 1) = (\alpha^3, 0, \alpha^5, 1) \\
P_{3098} &= (9, 0, 11, 1) = (\alpha^4, 0, \alpha^5, 1) \\
P_{3099} &= (10, 0, 11, 1) = (\alpha^{10}, 0, \alpha^5, 1) \\
P_{3100} &= (11, 0, 11, 1) = (\alpha^5, 0, \alpha^5, 1) \\
P_{3101} &= (12, 0, 11, 1) = (\alpha^{14}, 0, \alpha^5, 1) \\
P_{3102} &= (13, 0, 11, 1) = (\alpha^{11}, 0, \alpha^5, 1) \\
P_{3103} &= (14, 0, 11, 1) = (\alpha^8, 0, \alpha^5, 1) \\
P_{3104} &= (15, 0, 11, 1) = (\alpha^6, 0, \alpha^5, 1) \\
P_{3105} &= (0, 1, 11, 1) = (0, 1, \alpha^5, 1) \\
P_{3106} &= (1, 1, 11, 1) = (1, 1, \alpha^5, 1) \\
P_{3107} &= (2, 1, 11, 1) = (\alpha, 1, \alpha^5, 1) \\
P_{3108} &= (3, 1, 11, 1) = (\alpha^{12}, 1, \alpha^5, 1) \\
P_{3109} &= (4, 1, 11, 1) = (\alpha^2, 1, \alpha^5, 1) \\
P_{3110} &= (5, 1, 11, 1) = (\alpha^9, 1, \alpha^5, 1) \\
P_{3111} &= (6, 1, 11, 1) = (\alpha^{13}, 1, \alpha^5, 1) \\
P_{3112} &= (7, 1, 11, 1) = (\alpha^7, 1, \alpha^5, 1) \\
P_{3113} &= (8, 1, 11, 1) = (\alpha^3, 1, \alpha^5, 1) \\
P_{3114} &= (9, 1, 11, 1) = (\alpha^4, 1, \alpha^5, 1) \\
P_{3115} &= (10, 1, 11, 1) = (\alpha^{10}, 1, \alpha^5, 1) \\
P_{3116} &= (11, 1, 11, 1) = (\alpha^5, 1, \alpha^5, 1) \\
P_{3117} &= (12, 1, 11, 1) = (\alpha^{14}, 1, \alpha^5, 1) \\
P_{3118} &= (13, 1, 11, 1) = (\alpha^{11}, 1, \alpha^5, 1) \\
P_{3119} &= (14, 1, 11, 1) = (\alpha^8, 1, \alpha^5, 1) \\
P_{3120} &= (15, 1, 11, 1) = (\alpha^6, 1, \alpha^5, 1) \\
P_{3121} &= (0, 2, 11, 1) = (0, \alpha, \alpha^5, 1) \\
P_{3122} &= (1, 2, 11, 1) = (1, \alpha, \alpha^5, 1) \\
P_{3123} &= (2, 2, 11, 1) = (\alpha, \alpha, \alpha^5, 1) \\
P_{3124} &= (3, 2, 11, 1) = (\alpha^{12}, \alpha, \alpha^5, 1) \\
P_{3125} &= (4, 2, 11, 1) = (\alpha^2, \alpha, \alpha^5, 1) \\
P_{3126} &= (5, 2, 11, 1) = (\alpha^9, \alpha, \alpha^5, 1) \\
P_{3127} &= (6, 2, 11, 1) = (\alpha^{13}, \alpha, \alpha^5, 1) \\
P_{3128} &= (7, 2, 11, 1) = (\alpha^7, \alpha, \alpha^5, 1) \\
P_{3129} &= (8, 2, 11, 1) = (\alpha^3, \alpha, \alpha^5, 1) \\
P_{3130} &= (9, 2, 11, 1) = (\alpha^4, \alpha, \alpha^5, 1) \\
P_{3131} &= (10, 2, 11, 1) = (\alpha^{10}, \alpha, \alpha^5, 1) \\
P_{3132} &= (11, 2, 11, 1) = (\alpha^5, \alpha, \alpha^5, 1) \\
P_{3133} &= (12, 2, 11, 1) = (\alpha^{14}, \alpha, \alpha^5, 1) \\
P_{3134} &= (13, 2, 11, 1) = (\alpha^{11}, \alpha, \alpha^5, 1) \\
P_{3135} &= (14, 2, 11, 1) = (\alpha^8, \alpha, \alpha^5, 1) \\
P_{3136} &= (15, 2, 11, 1) = (\alpha^6, \alpha, \alpha^5, 1) \\
P_{3137} &= (0, 3, 11, 1) = (0, \alpha^{12}, \alpha^5, 1) \\
P_{3138} &= (1, 3, 11, 1) = (1, \alpha^{12}, \alpha^5, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3139} &= (2, 3, 11, 1) = (\alpha, \alpha^{12}, \alpha^5, 1) \\
P_{3140} &= (3, 3, 11, 1) = (\alpha^{12}, \alpha^{12}, \alpha^5, 1) \\
P_{3141} &= (4, 3, 11, 1) = (\alpha^2, \alpha^{12}, \alpha^5, 1) \\
P_{3142} &= (5, 3, 11, 1) = (\alpha^9, \alpha^{12}, \alpha^5, 1) \\
P_{3143} &= (6, 3, 11, 1) = (\alpha^{13}, \alpha^{12}, \alpha^5, 1) \\
P_{3144} &= (7, 3, 11, 1) = (\alpha^7, \alpha^{12}, \alpha^5, 1) \\
P_{3145} &= (8, 3, 11, 1) = (\alpha^3, \alpha^{12}, \alpha^5, 1) \\
P_{3146} &= (9, 3, 11, 1) = (\alpha^4, \alpha^{12}, \alpha^5, 1) \\
P_{3147} &= (10, 3, 11, 1) = (\alpha^{10}, \alpha^{12}, \alpha^5, 1) \\
P_{3148} &= (11, 3, 11, 1) = (\alpha^5, \alpha^{12}, \alpha^5, 1) \\
P_{3149} &= (12, 3, 11, 1) = (\alpha^{14}, \alpha^{12}, \alpha^5, 1) \\
P_{3150} &= (13, 3, 11, 1) = (\alpha^{11}, \alpha^{12}, \alpha^5, 1) \\
P_{3151} &= (14, 3, 11, 1) = (\alpha^8, \alpha^{12}, \alpha^5, 1) \\
P_{3152} &= (15, 3, 11, 1) = (\alpha^6, \alpha^{12}, \alpha^5, 1) \\
P_{3153} &= (0, 4, 11, 1) = (0, \alpha^2, \alpha^5, 1) \\
P_{3154} &= (1, 4, 11, 1) = (1, \alpha^2, \alpha^5, 1) \\
P_{3155} &= (2, 4, 11, 1) = (\alpha, \alpha^2, \alpha^5, 1) \\
P_{3156} &= (3, 4, 11, 1) = (\alpha^{12}, \alpha^2, \alpha^5, 1) \\
P_{3157} &= (4, 4, 11, 1) = (\alpha^2, \alpha^2, \alpha^5, 1) \\
P_{3158} &= (5, 4, 11, 1) = (\alpha^9, \alpha^2, \alpha^5, 1) \\
P_{3159} &= (6, 4, 11, 1) = (\alpha^{13}, \alpha^2, \alpha^5, 1) \\
P_{3160} &= (7, 4, 11, 1) = (\alpha^7, \alpha^2, \alpha^5, 1) \\
P_{3161} &= (8, 4, 11, 1) = (\alpha^3, \alpha^2, \alpha^5, 1) \\
P_{3162} &= (9, 4, 11, 1) = (\alpha^4, \alpha^2, \alpha^5, 1) \\
P_{3163} &= (10, 4, 11, 1) = (\alpha^{10}, \alpha^2, \alpha^5, 1) \\
P_{3164} &= (11, 4, 11, 1) = (\alpha^5, \alpha^2, \alpha^5, 1) \\
P_{3165} &= (12, 4, 11, 1) = (\alpha^{14}, \alpha^2, \alpha^5, 1) \\
P_{3166} &= (13, 4, 11, 1) = (\alpha^{11}, \alpha^2, \alpha^5, 1) \\
P_{3167} &= (14, 4, 11, 1) = (\alpha^8, \alpha^2, \alpha^5, 1) \\
P_{3168} &= (15, 4, 11, 1) = (\alpha^6, \alpha^2, \alpha^5, 1) \\
P_{3169} &= (0, 5, 11, 1) = (0, \alpha^9, \alpha^5, 1) \\
P_{3170} &= (1, 5, 11, 1) = (1, \alpha^9, \alpha^5, 1) \\
P_{3171} &= (2, 5, 11, 1) = (\alpha, \alpha^9, \alpha^5, 1) \\
P_{3172} &= (3, 5, 11, 1) = (\alpha^{12}, \alpha^9, \alpha^5, 1) \\
P_{3173} &= (4, 5, 11, 1) = (\alpha^2, \alpha^9, \alpha^5, 1) \\
P_{3174} &= (5, 5, 11, 1) = (\alpha^9, \alpha^9, \alpha^5, 1) \\
P_{3175} &= (6, 5, 11, 1) = (\alpha^{13}, \alpha^9, \alpha^5, 1) \\
P_{3176} &= (7, 5, 11, 1) = (\alpha^7, \alpha^9, \alpha^5, 1) \\
P_{3177} &= (8, 5, 11, 1) = (\alpha^3, \alpha^9, \alpha^5, 1) \\
P_{3178} &= (9, 5, 11, 1) = (\alpha^4, \alpha^9, \alpha^5, 1) \\
P_{3179} &= (10, 5, 11, 1) = (\alpha^{10}, \alpha^9, \alpha^5, 1) \\
P_{3180} &= (11, 5, 11, 1) = (\alpha^5, \alpha^9, \alpha^5, 1) \\
P_{3181} &= (12, 5, 11, 1) = (\alpha^{14}, \alpha^9, \alpha^5, 1) \\
P_{3182} &= (13, 5, 11, 1) = (\alpha^{11}, \alpha^9, \alpha^5, 1) \\
P_{3183} &= (14, 5, 11, 1) = (\alpha^8, \alpha^9, \alpha^5, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3184} &= (15, 5, 11, 1) = (\alpha^6, \alpha^9, \alpha^5, 1) \\
P_{3185} &= (0, 6, 11, 1) = (0, \alpha^{13}, \alpha^5, 1) \\
P_{3186} &= (1, 6, 11, 1) = (1, \alpha^{13}, \alpha^5, 1) \\
P_{3187} &= (2, 6, 11, 1) = (\alpha, \alpha^{13}, \alpha^5, 1) \\
P_{3188} &= (3, 6, 11, 1) = (\alpha^{12}, \alpha^{13}, \alpha^5, 1) \\
P_{3189} &= (4, 6, 11, 1) = (\alpha^2, \alpha^{13}, \alpha^5, 1) \\
P_{3190} &= (5, 6, 11, 1) = (\alpha^9, \alpha^{13}, \alpha^5, 1) \\
P_{3191} &= (6, 6, 11, 1) = (\alpha^{13}, \alpha^{13}, \alpha^5, 1) \\
P_{3192} &= (7, 6, 11, 1) = (\alpha^7, \alpha^{13}, \alpha^5, 1) \\
P_{3193} &= (8, 6, 11, 1) = (\alpha^3, \alpha^{13}, \alpha^5, 1) \\
P_{3194} &= (9, 6, 11, 1) = (\alpha^4, \alpha^{13}, \alpha^5, 1) \\
P_{3195} &= (10, 6, 11, 1) = (\alpha^{10}, \alpha^{13}, \alpha^5, 1) \\
P_{3196} &= (11, 6, 11, 1) = (\alpha^5, \alpha^{13}, \alpha^5, 1) \\
P_{3197} &= (12, 6, 11, 1) = (\alpha^{14}, \alpha^{13}, \alpha^5, 1) \\
P_{3198} &= (13, 6, 11, 1) = (\alpha^{11}, \alpha^{13}, \alpha^5, 1) \\
P_{3199} &= (14, 6, 11, 1) = (\alpha^8, \alpha^{13}, \alpha^5, 1) \\
P_{3200} &= (15, 6, 11, 1) = (\alpha^6, \alpha^{13}, \alpha^5, 1) \\
P_{3201} &= (0, 7, 11, 1) = (0, \alpha^7, \alpha^5, 1) \\
P_{3202} &= (1, 7, 11, 1) = (1, \alpha^7, \alpha^5, 1) \\
P_{3203} &= (2, 7, 11, 1) = (\alpha, \alpha^7, \alpha^5, 1) \\
P_{3204} &= (3, 7, 11, 1) = (\alpha^{12}, \alpha^7, \alpha^5, 1) \\
P_{3205} &= (4, 7, 11, 1) = (\alpha^2, \alpha^7, \alpha^5, 1) \\
P_{3206} &= (5, 7, 11, 1) = (\alpha^9, \alpha^7, \alpha^5, 1) \\
P_{3207} &= (6, 7, 11, 1) = (\alpha^{13}, \alpha^7, \alpha^5, 1) \\
P_{3208} &= (7, 7, 11, 1) = (\alpha^7, \alpha^7, \alpha^5, 1) \\
P_{3209} &= (8, 7, 11, 1) = (\alpha^3, \alpha^7, \alpha^5, 1) \\
P_{3210} &= (9, 7, 11, 1) = (\alpha^4, \alpha^7, \alpha^5, 1) \\
P_{3211} &= (10, 7, 11, 1) = (\alpha^{10}, \alpha^7, \alpha^5, 1) \\
P_{3212} &= (11, 7, 11, 1) = (\alpha^5, \alpha^7, \alpha^5, 1) \\
P_{3213} &= (12, 7, 11, 1) = (\alpha^{14}, \alpha^7, \alpha^5, 1) \\
P_{3214} &= (13, 7, 11, 1) = (\alpha^{11}, \alpha^7, \alpha^5, 1) \\
P_{3215} &= (14, 7, 11, 1) = (\alpha^8, \alpha^7, \alpha^5, 1) \\
P_{3216} &= (15, 7, 11, 1) = (\alpha^6, \alpha^7, \alpha^5, 1) \\
P_{3217} &= (0, 8, 11, 1) = (0, \alpha^3, \alpha^5, 1) \\
P_{3218} &= (1, 8, 11, 1) = (1, \alpha^3, \alpha^5, 1) \\
P_{3219} &= (2, 8, 11, 1) = (\alpha, \alpha^3, \alpha^5, 1) \\
P_{3220} &= (3, 8, 11, 1) = (\alpha^{12}, \alpha^3, \alpha^5, 1) \\
P_{3221} &= (4, 8, 11, 1) = (\alpha^2, \alpha^3, \alpha^5, 1) \\
P_{3222} &= (5, 8, 11, 1) = (\alpha^9, \alpha^3, \alpha^5, 1) \\
P_{3223} &= (6, 8, 11, 1) = (\alpha^{13}, \alpha^3, \alpha^5, 1) \\
P_{3224} &= (7, 8, 11, 1) = (\alpha^7, \alpha^3, \alpha^5, 1) \\
P_{3225} &= (8, 8, 11, 1) = (\alpha^3, \alpha^3, \alpha^5, 1) \\
P_{3226} &= (9, 8, 11, 1) = (\alpha^4, \alpha^3, \alpha^5, 1) \\
P_{3227} &= (10, 8, 11, 1) = (\alpha^{10}, \alpha^3, \alpha^5, 1) \\
P_{3228} &= (11, 8, 11, 1) = (\alpha^5, \alpha^3, \alpha^5, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3229} &= (12, 8, 11, 1) = (\alpha^{14}, \alpha^3, \alpha^5, 1) \\
P_{3230} &= (13, 8, 11, 1) = (\alpha^{11}, \alpha^3, \alpha^5, 1) \\
P_{3231} &= (14, 8, 11, 1) = (\alpha^8, \alpha^3, \alpha^5, 1) \\
P_{3232} &= (15, 8, 11, 1) = (\alpha^6, \alpha^3, \alpha^5, 1) \\
P_{3233} &= (0, 9, 11, 1) = (0, \alpha^4, \alpha^5, 1) \\
P_{3234} &= (1, 9, 11, 1) = (1, \alpha^4, \alpha^5, 1) \\
P_{3235} &= (2, 9, 11, 1) = (\alpha, \alpha^4, \alpha^5, 1) \\
P_{3236} &= (3, 9, 11, 1) = (\alpha^{12}, \alpha^4, \alpha^5, 1) \\
P_{3237} &= (4, 9, 11, 1) = (\alpha^2, \alpha^4, \alpha^5, 1) \\
P_{3238} &= (5, 9, 11, 1) = (\alpha^9, \alpha^4, \alpha^5, 1) \\
P_{3239} &= (6, 9, 11, 1) = (\alpha^{13}, \alpha^4, \alpha^5, 1) \\
P_{3240} &= (7, 9, 11, 1) = (\alpha^7, \alpha^4, \alpha^5, 1) \\
P_{3241} &= (8, 9, 11, 1) = (\alpha^3, \alpha^4, \alpha^5, 1) \\
P_{3242} &= (9, 9, 11, 1) = (\alpha^4, \alpha^4, \alpha^5, 1) \\
P_{3243} &= (10, 9, 11, 1) = (\alpha^{10}, \alpha^4, \alpha^5, 1) \\
P_{3244} &= (11, 9, 11, 1) = (\alpha^5, \alpha^4, \alpha^5, 1) \\
P_{3245} &= (12, 9, 11, 1) = (\alpha^{14}, \alpha^4, \alpha^5, 1) \\
P_{3246} &= (13, 9, 11, 1) = (\alpha^{11}, \alpha^4, \alpha^5, 1) \\
P_{3247} &= (14, 9, 11, 1) = (\alpha^8, \alpha^4, \alpha^5, 1) \\
P_{3248} &= (15, 9, 11, 1) = (\alpha^6, \alpha^4, \alpha^5, 1) \\
P_{3249} &= (0, 10, 11, 1) = (0, \alpha^{10}, \alpha^5, 1) \\
P_{3250} &= (1, 10, 11, 1) = (1, \alpha^{10}, \alpha^5, 1) \\
P_{3251} &= (2, 10, 11, 1) = (\alpha, \alpha^{10}, \alpha^5, 1) \\
P_{3252} &= (3, 10, 11, 1) = (\alpha^{12}, \alpha^{10}, \alpha^5, 1) \\
P_{3253} &= (4, 10, 11, 1) = (\alpha^2, \alpha^{10}, \alpha^5, 1) \\
P_{3254} &= (5, 10, 11, 1) = (\alpha^9, \alpha^{10}, \alpha^5, 1) \\
P_{3255} &= (6, 10, 11, 1) = (\alpha^{13}, \alpha^{10}, \alpha^5, 1) \\
P_{3256} &= (7, 10, 11, 1) = (\alpha^7, \alpha^{10}, \alpha^5, 1) \\
P_{3257} &= (8, 10, 11, 1) = (\alpha^3, \alpha^{10}, \alpha^5, 1) \\
P_{3258} &= (9, 10, 11, 1) = (\alpha^4, \alpha^{10}, \alpha^5, 1) \\
P_{3259} &= (10, 10, 11, 1) = (\alpha^{10}, \alpha^{10}, \alpha^5, 1) \\
P_{3260} &= (11, 10, 11, 1) = (\alpha^5, \alpha^{10}, \alpha^5, 1) \\
P_{3261} &= (12, 10, 11, 1) = (\alpha^{14}, \alpha^{10}, \alpha^5, 1) \\
P_{3262} &= (13, 10, 11, 1) = (\alpha^{11}, \alpha^{10}, \alpha^5, 1) \\
P_{3263} &= (14, 10, 11, 1) = (\alpha^8, \alpha^{10}, \alpha^5, 1) \\
P_{3264} &= (15, 10, 11, 1) = (\alpha^6, \alpha^{10}, \alpha^5, 1) \\
P_{3265} &= (0, 11, 11, 1) = (0, \alpha^5, \alpha^5, 1) \\
P_{3266} &= (1, 11, 11, 1) = (1, \alpha^5, \alpha^5, 1) \\
P_{3267} &= (2, 11, 11, 1) = (\alpha, \alpha^5, \alpha^5, 1) \\
P_{3268} &= (3, 11, 11, 1) = (\alpha^{12}, \alpha^5, \alpha^5, 1) \\
P_{3269} &= (4, 11, 11, 1) = (\alpha^2, \alpha^5, \alpha^5, 1) \\
P_{3270} &= (5, 11, 11, 1) = (\alpha^9, \alpha^5, \alpha^5, 1) \\
P_{3271} &= (6, 11, 11, 1) = (\alpha^{13}, \alpha^5, \alpha^5, 1) \\
P_{3272} &= (7, 11, 11, 1) = (\alpha^7, \alpha^5, \alpha^5, 1) \\
P_{3273} &= (8, 11, 11, 1) = (\alpha^3, \alpha^5, \alpha^5, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3274} &= (9, 11, 11, 1) = (\alpha^4, \alpha^5, \alpha^5, 1) \\
P_{3275} &= (10, 11, 11, 1) = (\alpha^{10}, \alpha^5, \alpha^5, 1) \\
P_{3276} &= (11, 11, 11, 1) = (\alpha^5, \alpha^5, \alpha^5, 1) \\
P_{3277} &= (12, 11, 11, 1) = (\alpha^{14}, \alpha^5, \alpha^5, 1) \\
P_{3278} &= (13, 11, 11, 1) = (\alpha^{11}, \alpha^5, \alpha^5, 1) \\
P_{3279} &= (14, 11, 11, 1) = (\alpha^8, \alpha^5, \alpha^5, 1) \\
P_{3280} &= (15, 11, 11, 1) = (\alpha^6, \alpha^5, \alpha^5, 1) \\
P_{3281} &= (0, 12, 11, 1) = (0, \alpha^{14}, \alpha^5, 1) \\
P_{3282} &= (1, 12, 11, 1) = (1, \alpha^{14}, \alpha^5, 1) \\
P_{3283} &= (2, 12, 11, 1) = (\alpha, \alpha^{14}, \alpha^5, 1) \\
P_{3284} &= (3, 12, 11, 1) = (\alpha^{12}, \alpha^{14}, \alpha^5, 1) \\
P_{3285} &= (4, 12, 11, 1) = (\alpha^2, \alpha^{14}, \alpha^5, 1) \\
P_{3286} &= (5, 12, 11, 1) = (\alpha^9, \alpha^{14}, \alpha^5, 1) \\
P_{3287} &= (6, 12, 11, 1) = (\alpha^{13}, \alpha^{14}, \alpha^5, 1) \\
P_{3288} &= (7, 12, 11, 1) = (\alpha^7, \alpha^{14}, \alpha^5, 1) \\
P_{3289} &= (8, 12, 11, 1) = (\alpha^3, \alpha^{14}, \alpha^5, 1) \\
P_{3290} &= (9, 12, 11, 1) = (\alpha^4, \alpha^{14}, \alpha^5, 1) \\
P_{3291} &= (10, 12, 11, 1) = (\alpha^{10}, \alpha^{14}, \alpha^5, 1) \\
P_{3292} &= (11, 12, 11, 1) = (\alpha^5, \alpha^{14}, \alpha^5, 1) \\
P_{3293} &= (12, 12, 11, 1) = (\alpha^{14}, \alpha^{14}, \alpha^5, 1) \\
P_{3294} &= (13, 12, 11, 1) = (\alpha^{11}, \alpha^{14}, \alpha^5, 1) \\
P_{3295} &= (14, 12, 11, 1) = (\alpha^8, \alpha^{14}, \alpha^5, 1) \\
P_{3296} &= (15, 12, 11, 1) = (\alpha^6, \alpha^{14}, \alpha^5, 1) \\
P_{3297} &= (0, 13, 11, 1) = (0, \alpha^{11}, \alpha^5, 1) \\
P_{3298} &= (1, 13, 11, 1) = (1, \alpha^{11}, \alpha^5, 1) \\
P_{3299} &= (2, 13, 11, 1) = (\alpha, \alpha^{11}, \alpha^5, 1) \\
P_{3300} &= (3, 13, 11, 1) = (\alpha^{12}, \alpha^{11}, \alpha^5, 1) \\
P_{3301} &= (4, 13, 11, 1) = (\alpha^2, \alpha^{11}, \alpha^5, 1) \\
P_{3302} &= (5, 13, 11, 1) = (\alpha^9, \alpha^{11}, \alpha^5, 1) \\
P_{3303} &= (6, 13, 11, 1) = (\alpha^{13}, \alpha^{11}, \alpha^5, 1) \\
P_{3304} &= (7, 13, 11, 1) = (\alpha^7, \alpha^{11}, \alpha^5, 1) \\
P_{3305} &= (8, 13, 11, 1) = (\alpha^3, \alpha^{11}, \alpha^5, 1) \\
P_{3306} &= (9, 13, 11, 1) = (\alpha^4, \alpha^{11}, \alpha^5, 1) \\
P_{3307} &= (10, 13, 11, 1) = (\alpha^{10}, \alpha^{11}, \alpha^5, 1) \\
P_{3308} &= (11, 13, 11, 1) = (\alpha^5, \alpha^{11}, \alpha^5, 1) \\
P_{3309} &= (12, 13, 11, 1) = (\alpha^{14}, \alpha^{11}, \alpha^5, 1) \\
P_{3310} &= (13, 13, 11, 1) = (\alpha^{11}, \alpha^{11}, \alpha^5, 1) \\
P_{3311} &= (14, 13, 11, 1) = (\alpha^8, \alpha^{11}, \alpha^5, 1) \\
P_{3312} &= (15, 13, 11, 1) = (\alpha^6, \alpha^{11}, \alpha^5, 1) \\
P_{3313} &= (0, 14, 11, 1) = (0, \alpha^8, \alpha^5, 1) \\
P_{3314} &= (1, 14, 11, 1) = (1, \alpha^8, \alpha^5, 1) \\
P_{3315} &= (2, 14, 11, 1) = (\alpha, \alpha^8, \alpha^5, 1) \\
P_{3316} &= (3, 14, 11, 1) = (\alpha^{12}, \alpha^8, \alpha^5, 1) \\
P_{3317} &= (4, 14, 11, 1) = (\alpha^2, \alpha^8, \alpha^5, 1) \\
P_{3318} &= (5, 14, 11, 1) = (\alpha^9, \alpha^8, \alpha^5, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3319} &= (6, 14, 11, 1) = (\alpha^{13}, \alpha^8, \alpha^5, 1) \\
P_{3320} &= (7, 14, 11, 1) = (\alpha^7, \alpha^8, \alpha^5, 1) \\
P_{3321} &= (8, 14, 11, 1) = (\alpha^3, \alpha^8, \alpha^5, 1) \\
P_{3322} &= (9, 14, 11, 1) = (\alpha^4, \alpha^8, \alpha^5, 1) \\
P_{3323} &= (10, 14, 11, 1) = (\alpha^{10}, \alpha^8, \alpha^5, 1) \\
P_{3324} &= (11, 14, 11, 1) = (\alpha^5, \alpha^8, \alpha^5, 1) \\
P_{3325} &= (12, 14, 11, 1) = (\alpha^{14}, \alpha^8, \alpha^5, 1) \\
P_{3326} &= (13, 14, 11, 1) = (\alpha^{11}, \alpha^8, \alpha^5, 1) \\
P_{3327} &= (14, 14, 11, 1) = (\alpha^8, \alpha^8, \alpha^5, 1) \\
P_{3328} &= (15, 14, 11, 1) = (\alpha^6, \alpha^8, \alpha^5, 1) \\
P_{3329} &= (0, 15, 11, 1) = (0, \alpha^6, \alpha^5, 1) \\
P_{3330} &= (1, 15, 11, 1) = (1, \alpha^6, \alpha^5, 1) \\
P_{3331} &= (2, 15, 11, 1) = (\alpha, \alpha^6, \alpha^5, 1) \\
P_{3332} &= (3, 15, 11, 1) = (\alpha^{12}, \alpha^6, \alpha^5, 1) \\
P_{3333} &= (4, 15, 11, 1) = (\alpha^2, \alpha^6, \alpha^5, 1) \\
P_{3334} &= (5, 15, 11, 1) = (\alpha^9, \alpha^6, \alpha^5, 1) \\
P_{3335} &= (6, 15, 11, 1) = (\alpha^{13}, \alpha^6, \alpha^5, 1) \\
P_{3336} &= (7, 15, 11, 1) = (\alpha^7, \alpha^6, \alpha^5, 1) \\
P_{3337} &= (8, 15, 11, 1) = (\alpha^3, \alpha^6, \alpha^5, 1) \\
P_{3338} &= (9, 15, 11, 1) = (\alpha^4, \alpha^6, \alpha^5, 1) \\
P_{3339} &= (10, 15, 11, 1) = (\alpha^{10}, \alpha^6, \alpha^5, 1) \\
P_{3340} &= (11, 15, 11, 1) = (\alpha^5, \alpha^6, \alpha^5, 1) \\
P_{3341} &= (12, 15, 11, 1) = (\alpha^{14}, \alpha^6, \alpha^5, 1) \\
P_{3342} &= (13, 15, 11, 1) = (\alpha^{11}, \alpha^6, \alpha^5, 1) \\
P_{3343} &= (14, 15, 11, 1) = (\alpha^8, \alpha^6, \alpha^5, 1) \\
P_{3344} &= (15, 15, 11, 1) = (\alpha^6, \alpha^6, \alpha^5, 1) \\
P_{3345} &= (0, 0, 12, 1) = (0, 0, \alpha^{14}, 1) \\
P_{3346} &= (1, 0, 12, 1) = (1, 0, \alpha^{14}, 1) \\
P_{3347} &= (2, 0, 12, 1) = (\alpha, 0, \alpha^{14}, 1) \\
P_{3348} &= (3, 0, 12, 1) = (\alpha^{12}, 0, \alpha^{14}, 1) \\
P_{3349} &= (4, 0, 12, 1) = (\alpha^2, 0, \alpha^{14}, 1) \\
P_{3350} &= (5, 0, 12, 1) = (\alpha^9, 0, \alpha^{14}, 1) \\
P_{3351} &= (6, 0, 12, 1) = (\alpha^{13}, 0, \alpha^{14}, 1) \\
P_{3352} &= (7, 0, 12, 1) = (\alpha^7, 0, \alpha^{14}, 1) \\
P_{3353} &= (8, 0, 12, 1) = (\alpha^3, 0, \alpha^{14}, 1) \\
P_{3354} &= (9, 0, 12, 1) = (\alpha^4, 0, \alpha^{14}, 1) \\
P_{3355} &= (10, 0, 12, 1) = (\alpha^{10}, 0, \alpha^{14}, 1) \\
P_{3356} &= (11, 0, 12, 1) = (\alpha^5, 0, \alpha^{14}, 1) \\
P_{3357} &= (12, 0, 12, 1) = (\alpha^{14}, 0, \alpha^{14}, 1) \\
P_{3358} &= (13, 0, 12, 1) = (\alpha^{11}, 0, \alpha^{14}, 1) \\
P_{3359} &= (14, 0, 12, 1) = (\alpha^8, 0, \alpha^{14}, 1) \\
P_{3360} &= (15, 0, 12, 1) = (\alpha^6, 0, \alpha^{14}, 1) \\
P_{3361} &= (0, 1, 12, 1) = (0, 1, \alpha^{14}, 1) \\
P_{3362} &= (1, 1, 12, 1) = (1, 1, \alpha^{14}, 1) \\
P_{3363} &= (2, 1, 12, 1) = (\alpha, 1, \alpha^{14}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3364} &= (3, 1, 12, 1) = (\alpha^{12}, 1, \alpha^{14}, 1) \\
P_{3365} &= (4, 1, 12, 1) = (\alpha^2, 1, \alpha^{14}, 1) \\
P_{3366} &= (5, 1, 12, 1) = (\alpha^9, 1, \alpha^{14}, 1) \\
P_{3367} &= (6, 1, 12, 1) = (\alpha^{13}, 1, \alpha^{14}, 1) \\
P_{3368} &= (7, 1, 12, 1) = (\alpha^7, 1, \alpha^{14}, 1) \\
P_{3369} &= (8, 1, 12, 1) = (\alpha^3, 1, \alpha^{14}, 1) \\
P_{3370} &= (9, 1, 12, 1) = (\alpha^4, 1, \alpha^{14}, 1) \\
P_{3371} &= (10, 1, 12, 1) = (\alpha^{10}, 1, \alpha^{14}, 1) \\
P_{3372} &= (11, 1, 12, 1) = (\alpha^5, 1, \alpha^{14}, 1) \\
P_{3373} &= (12, 1, 12, 1) = (\alpha^{14}, 1, \alpha^{14}, 1) \\
P_{3374} &= (13, 1, 12, 1) = (\alpha^{11}, 1, \alpha^{14}, 1) \\
P_{3375} &= (14, 1, 12, 1) = (\alpha^8, 1, \alpha^{14}, 1) \\
P_{3376} &= (15, 1, 12, 1) = (\alpha^6, 1, \alpha^{14}, 1) \\
P_{3377} &= (0, 2, 12, 1) = (0, \alpha, \alpha^{14}, 1) \\
P_{3378} &= (1, 2, 12, 1) = (1, \alpha, \alpha^{14}, 1) \\
P_{3379} &= (2, 2, 12, 1) = (\alpha, \alpha, \alpha^{14}, 1) \\
P_{3380} &= (3, 2, 12, 1) = (\alpha^{12}, \alpha, \alpha^{14}, 1) \\
P_{3381} &= (4, 2, 12, 1) = (\alpha^2, \alpha, \alpha^{14}, 1) \\
P_{3382} &= (5, 2, 12, 1) = (\alpha^9, \alpha, \alpha^{14}, 1) \\
P_{3383} &= (6, 2, 12, 1) = (\alpha^{13}, \alpha, \alpha^{14}, 1) \\
P_{3384} &= (7, 2, 12, 1) = (\alpha^7, \alpha, \alpha^{14}, 1) \\
P_{3385} &= (8, 2, 12, 1) = (\alpha^3, \alpha, \alpha^{14}, 1) \\
P_{3386} &= (9, 2, 12, 1) = (\alpha^4, \alpha, \alpha^{14}, 1) \\
P_{3387} &= (10, 2, 12, 1) = (\alpha^{10}, \alpha, \alpha^{14}, 1) \\
P_{3388} &= (11, 2, 12, 1) = (\alpha^5, \alpha, \alpha^{14}, 1) \\
P_{3389} &= (12, 2, 12, 1) = (\alpha^{14}, \alpha, \alpha^{14}, 1) \\
P_{3390} &= (13, 2, 12, 1) = (\alpha^{11}, \alpha, \alpha^{14}, 1) \\
P_{3391} &= (14, 2, 12, 1) = (\alpha^8, \alpha, \alpha^{14}, 1) \\
P_{3392} &= (15, 2, 12, 1) = (\alpha^6, \alpha, \alpha^{14}, 1) \\
P_{3393} &= (0, 3, 12, 1) = (0, \alpha^{12}, \alpha^{14}, 1) \\
P_{3394} &= (1, 3, 12, 1) = (1, \alpha^{12}, \alpha^{14}, 1) \\
P_{3395} &= (2, 3, 12, 1) = (\alpha, \alpha^{12}, \alpha^{14}, 1) \\
P_{3396} &= (3, 3, 12, 1) = (\alpha^{12}, \alpha^{12}, \alpha^{14}, 1) \\
P_{3397} &= (4, 3, 12, 1) = (\alpha^2, \alpha^{12}, \alpha^{14}, 1) \\
P_{3398} &= (5, 3, 12, 1) = (\alpha^9, \alpha^{12}, \alpha^{14}, 1) \\
P_{3399} &= (6, 3, 12, 1) = (\alpha^{13}, \alpha^{12}, \alpha^{14}, 1) \\
P_{3400} &= (7, 3, 12, 1) = (\alpha^7, \alpha^{12}, \alpha^{14}, 1) \\
P_{3401} &= (8, 3, 12, 1) = (\alpha^3, \alpha^{12}, \alpha^{14}, 1) \\
P_{3402} &= (9, 3, 12, 1) = (\alpha^4, \alpha^{12}, \alpha^{14}, 1) \\
P_{3403} &= (10, 3, 12, 1) = (\alpha^{10}, \alpha^{12}, \alpha^{14}, 1) \\
P_{3404} &= (11, 3, 12, 1) = (\alpha^5, \alpha^{12}, \alpha^{14}, 1) \\
P_{3405} &= (12, 3, 12, 1) = (\alpha^{14}, \alpha^{12}, \alpha^{14}, 1) \\
P_{3406} &= (13, 3, 12, 1) = (\alpha^{11}, \alpha^{12}, \alpha^{14}, 1) \\
P_{3407} &= (14, 3, 12, 1) = (\alpha^8, \alpha^{12}, \alpha^{14}, 1) \\
P_{3408} &= (15, 3, 12, 1) = (\alpha^6, \alpha^{12}, \alpha^{14}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3409} &= (0, 4, 12, 1) = (0, \alpha^2, \alpha^{14}, 1) \\
P_{3410} &= (1, 4, 12, 1) = (1, \alpha^2, \alpha^{14}, 1) \\
P_{3411} &= (2, 4, 12, 1) = (\alpha, \alpha^2, \alpha^{14}, 1) \\
P_{3412} &= (3, 4, 12, 1) = (\alpha^{12}, \alpha^2, \alpha^{14}, 1) \\
P_{3413} &= (4, 4, 12, 1) = (\alpha^2, \alpha^2, \alpha^{14}, 1) \\
P_{3414} &= (5, 4, 12, 1) = (\alpha^9, \alpha^2, \alpha^{14}, 1) \\
P_{3415} &= (6, 4, 12, 1) = (\alpha^{13}, \alpha^2, \alpha^{14}, 1) \\
P_{3416} &= (7, 4, 12, 1) = (\alpha^7, \alpha^2, \alpha^{14}, 1) \\
P_{3417} &= (8, 4, 12, 1) = (\alpha^3, \alpha^2, \alpha^{14}, 1) \\
P_{3418} &= (9, 4, 12, 1) = (\alpha^4, \alpha^2, \alpha^{14}, 1) \\
P_{3419} &= (10, 4, 12, 1) = (\alpha^{10}, \alpha^2, \alpha^{14}, 1) \\
P_{3420} &= (11, 4, 12, 1) = (\alpha^5, \alpha^2, \alpha^{14}, 1) \\
P_{3421} &= (12, 4, 12, 1) = (\alpha^{14}, \alpha^2, \alpha^{14}, 1) \\
P_{3422} &= (13, 4, 12, 1) = (\alpha^{11}, \alpha^2, \alpha^{14}, 1) \\
P_{3423} &= (14, 4, 12, 1) = (\alpha^8, \alpha^2, \alpha^{14}, 1) \\
P_{3424} &= (15, 4, 12, 1) = (\alpha^6, \alpha^2, \alpha^{14}, 1) \\
P_{3425} &= (0, 5, 12, 1) = (0, \alpha^9, \alpha^{14}, 1) \\
P_{3426} &= (1, 5, 12, 1) = (1, \alpha^9, \alpha^{14}, 1) \\
P_{3427} &= (2, 5, 12, 1) = (\alpha, \alpha^9, \alpha^{14}, 1) \\
P_{3428} &= (3, 5, 12, 1) = (\alpha^{12}, \alpha^9, \alpha^{14}, 1) \\
P_{3429} &= (4, 5, 12, 1) = (\alpha^2, \alpha^9, \alpha^{14}, 1) \\
P_{3430} &= (5, 5, 12, 1) = (\alpha^9, \alpha^9, \alpha^{14}, 1) \\
P_{3431} &= (6, 5, 12, 1) = (\alpha^{13}, \alpha^9, \alpha^{14}, 1) \\
P_{3432} &= (7, 5, 12, 1) = (\alpha^7, \alpha^9, \alpha^{14}, 1) \\
P_{3433} &= (8, 5, 12, 1) = (\alpha^3, \alpha^9, \alpha^{14}, 1) \\
P_{3434} &= (9, 5, 12, 1) = (\alpha^4, \alpha^9, \alpha^{14}, 1) \\
P_{3435} &= (10, 5, 12, 1) = (\alpha^{10}, \alpha^9, \alpha^{14}, 1) \\
P_{3436} &= (11, 5, 12, 1) = (\alpha^5, \alpha^9, \alpha^{14}, 1) \\
P_{3437} &= (12, 5, 12, 1) = (\alpha^{14}, \alpha^9, \alpha^{14}, 1) \\
P_{3438} &= (13, 5, 12, 1) = (\alpha^{11}, \alpha^9, \alpha^{14}, 1) \\
P_{3439} &= (14, 5, 12, 1) = (\alpha^8, \alpha^9, \alpha^{14}, 1) \\
P_{3440} &= (15, 5, 12, 1) = (\alpha^6, \alpha^9, \alpha^{14}, 1) \\
P_{3441} &= (0, 6, 12, 1) = (0, \alpha^{13}, \alpha^{14}, 1) \\
P_{3442} &= (1, 6, 12, 1) = (1, \alpha^{13}, \alpha^{14}, 1) \\
P_{3443} &= (2, 6, 12, 1) = (\alpha, \alpha^{13}, \alpha^{14}, 1) \\
P_{3444} &= (3, 6, 12, 1) = (\alpha^{12}, \alpha^{13}, \alpha^{14}, 1) \\
P_{3445} &= (4, 6, 12, 1) = (\alpha^2, \alpha^{13}, \alpha^{14}, 1) \\
P_{3446} &= (5, 6, 12, 1) = (\alpha^9, \alpha^{13}, \alpha^{14}, 1) \\
P_{3447} &= (6, 6, 12, 1) = (\alpha^{13}, \alpha^{13}, \alpha^{14}, 1) \\
P_{3448} &= (7, 6, 12, 1) = (\alpha^7, \alpha^{13}, \alpha^{14}, 1) \\
P_{3449} &= (8, 6, 12, 1) = (\alpha^3, \alpha^{13}, \alpha^{14}, 1) \\
P_{3450} &= (9, 6, 12, 1) = (\alpha^4, \alpha^{13}, \alpha^{14}, 1) \\
P_{3451} &= (10, 6, 12, 1) = (\alpha^{10}, \alpha^{13}, \alpha^{14}, 1) \\
P_{3452} &= (11, 6, 12, 1) = (\alpha^5, \alpha^{13}, \alpha^{14}, 1) \\
P_{3453} &= (12, 6, 12, 1) = (\alpha^{14}, \alpha^{13}, \alpha^{14}, 1)
\end{aligned}$$

$P_{3544} = (7, 12, 12, 1) = (\alpha^7, \alpha^{14}, \alpha^{14}, 1)$	$P_{3589} = (4, 15, 12, 1) = (\alpha^2, \alpha^6, \alpha^{14}, 1)$
$P_{3545} = (8, 12, 12, 1) = (\alpha^3, \alpha^{14}, \alpha^{14}, 1)$	$P_{3590} = (5, 15, 12, 1) = (\alpha^9, \alpha^6, \alpha^{14}, 1)$
$P_{3546} = (9, 12, 12, 1) = (\alpha^4, \alpha^{14}, \alpha^{14}, 1)$	$P_{3591} = (6, 15, 12, 1) = (\alpha^{13}, \alpha^6, \alpha^{14}, 1)$
$P_{3547} = (10, 12, 12, 1) = (\alpha^{10}, \alpha^{14}, \alpha^{14}, 1)$	$P_{3592} = (7, 15, 12, 1) = (\alpha^7, \alpha^6, \alpha^{14}, 1)$
$P_{3548} = (11, 12, 12, 1) = (\alpha^5, \alpha^{14}, \alpha^{14}, 1)$	$P_{3593} = (8, 15, 12, 1) = (\alpha^3, \alpha^6, \alpha^{14}, 1)$
$P_{3549} = (12, 12, 12, 1) = (\alpha^{14}, \alpha^{14}, \alpha^{14}, 1)$	$P_{3594} = (9, 15, 12, 1) = (\alpha^4, \alpha^6, \alpha^{14}, 1)$
$P_{3550} = (13, 12, 12, 1) = (\alpha^{11}, \alpha^{14}, \alpha^{14}, 1)$	$P_{3595} = (10, 15, 12, 1) = (\alpha^{10}, \alpha^6, \alpha^{14}, 1)$
$P_{3551} = (14, 12, 12, 1) = (\alpha^8, \alpha^{14}, \alpha^{14}, 1)$	$P_{3596} = (11, 15, 12, 1) = (\alpha^5, \alpha^6, \alpha^{14}, 1)$
$P_{3552} = (15, 12, 12, 1) = (\alpha^6, \alpha^{14}, \alpha^{14}, 1)$	$P_{3597} = (12, 15, 12, 1) = (\alpha^{14}, \alpha^6, \alpha^{14}, 1)$
$P_{3553} = (0, 13, 12, 1) = (0, \alpha^{11}, \alpha^{14}, 1)$	$P_{3598} = (13, 15, 12, 1) = (\alpha^{11}, \alpha^6, \alpha^{14}, 1)$
$P_{3554} = (1, 13, 12, 1) = (1, \alpha^{11}, \alpha^{14}, 1)$	$P_{3599} = (14, 15, 12, 1) = (\alpha^8, \alpha^6, \alpha^{14}, 1)$
$P_{3555} = (2, 13, 12, 1) = (\alpha, \alpha^{11}, \alpha^{14}, 1)$	$P_{3600} = (15, 15, 12, 1) = (\alpha^6, \alpha^6, \alpha^{14}, 1)$
$P_{3556} = (3, 13, 12, 1) = (\alpha^{12}, \alpha^{11}, \alpha^{14}, 1)$	$P_{3601} = (0, 0, 13, 1) = (0, 0, \alpha^{11}, 1)$
$P_{3557} = (4, 13, 12, 1) = (\alpha^2, \alpha^{11}, \alpha^{14}, 1)$	$P_{3602} = (1, 0, 13, 1) = (1, 0, \alpha^{11}, 1)$
$P_{3558} = (5, 13, 12, 1) = (\alpha^9, \alpha^{11}, \alpha^{14}, 1)$	$P_{3603} = (2, 0, 13, 1) = (\alpha, 0, \alpha^{11}, 1)$
$P_{3559} = (6, 13, 12, 1) = (\alpha^{13}, \alpha^{11}, \alpha^{14}, 1)$	$P_{3604} = (3, 0, 13, 1) = (\alpha^{12}, 0, \alpha^{11}, 1)$
$P_{3560} = (7, 13, 12, 1) = (\alpha^7, \alpha^{11}, \alpha^{14}, 1)$	$P_{3605} = (4, 0, 13, 1) = (\alpha^2, 0, \alpha^{11}, 1)$
$P_{3561} = (8, 13, 12, 1) = (\alpha^3, \alpha^{11}, \alpha^{14}, 1)$	$P_{3606} = (5, 0, 13, 1) = (\alpha^9, 0, \alpha^{11}, 1)$
$P_{3562} = (9, 13, 12, 1) = (\alpha^4, \alpha^{11}, \alpha^{14}, 1)$	$P_{3607} = (6, 0, 13, 1) = (\alpha^{13}, 0, \alpha^{11}, 1)$
$P_{3563} = (10, 13, 12, 1) = (\alpha^{10}, \alpha^{11}, \alpha^{14}, 1)$	$P_{3608} = (7, 0, 13, 1) = (\alpha^7, 0, \alpha^{11}, 1)$
$P_{3564} = (11, 13, 12, 1) = (\alpha^5, \alpha^{11}, \alpha^{14}, 1)$	$P_{3609} = (8, 0, 13, 1) = (\alpha^3, 0, \alpha^{11}, 1)$
$P_{3565} = (12, 13, 12, 1) = (\alpha^{14}, \alpha^{11}, \alpha^{14}, 1)$	$P_{3610} = (9, 0, 13, 1) = (\alpha^4, 0, \alpha^{11}, 1)$
$P_{3566} = (13, 13, 12, 1) = (\alpha^{11}, \alpha^{11}, \alpha^{14}, 1)$	$P_{3611} = (10, 0, 13, 1) = (\alpha^{10}, 0, \alpha^{11}, 1)$
$P_{3567} = (14, 13, 12, 1) = (\alpha^8, \alpha^{11}, \alpha^{14}, 1)$	$P_{3612} = (11, 0, 13, 1) = (\alpha^5, 0, \alpha^{11}, 1)$
$P_{3568} = (15, 13, 12, 1) = (\alpha^6, \alpha^{11}, \alpha^{14}, 1)$	$P_{3613} = (12, 0, 13, 1) = (\alpha^{14}, 0, \alpha^{11}, 1)$
$P_{3569} = (0, 14, 12, 1) = (0, \alpha^8, \alpha^{14}, 1)$	$P_{3614} = (13, 0, 13, 1) = (\alpha^{11}, 0, \alpha^{11}, 1)$
$P_{3570} = (1, 14, 12, 1) = (1, \alpha^8, \alpha^{14}, 1)$	$P_{3615} = (14, 0, 13, 1) = (\alpha^8, 0, \alpha^{11}, 1)$
$P_{3571} = (2, 14, 12, 1) = (\alpha, \alpha^8, \alpha^{14}, 1)$	$P_{3616} = (15, 0, 13, 1) = (\alpha^6, 0, \alpha^{11}, 1)$
$P_{3572} = (3, 14, 12, 1) = (\alpha^{12}, \alpha^8, \alpha^{14}, 1)$	$P_{3617} = (0, 1, 13, 1) = (0, 1, \alpha^{11}, 1)$
$P_{3573} = (4, 14, 12, 1) = (\alpha^2, \alpha^8, \alpha^{14}, 1)$	$P_{3618} = (1, 1, 13, 1) = (1, 1, \alpha^{11}, 1)$
$P_{3574} = (5, 14, 12, 1) = (\alpha^9, \alpha^8, \alpha^{14}, 1)$	$P_{3619} = (2, 1, 13, 1) = (\alpha, 1, \alpha^{11}, 1)$
$P_{3575} = (6, 14, 12, 1) = (\alpha^{13}, \alpha^8, \alpha^{14}, 1)$	$P_{3620} = (3, 1, 13, 1) = (\alpha^{12}, 1, \alpha^{11}, 1)$
$P_{3576} = (7, 14, 12, 1) = (\alpha^7, \alpha^8, \alpha^{14}, 1)$	$P_{3621} = (4, 1, 13, 1) = (\alpha^2, 1, \alpha^{11}, 1)$
$P_{3577} = (8, 14, 12, 1) = (\alpha^3, \alpha^8, \alpha^{14}, 1)$	$P_{3622} = (5, 1, 13, 1) = (\alpha^9, 1, \alpha^{11}, 1)$
$P_{3578} = (9, 14, 12, 1) = (\alpha^4, \alpha^8, \alpha^{14}, 1)$	$P_{3623} = (6, 1, 13, 1) = (\alpha^{13}, 1, \alpha^{11}, 1)$
$P_{3579} = (10, 14, 12, 1) = (\alpha^{10}, \alpha^8, \alpha^{14}, 1)$	$P_{3624} = (7, 1, 13, 1) = (\alpha^7, 1, \alpha^{11}, 1)$
$P_{3580} = (11, 14, 12, 1) = (\alpha^5, \alpha^8, \alpha^{14}, 1)$	$P_{3625} = (8, 1, 13, 1) = (\alpha^3, 1, \alpha^{11}, 1)$
$P_{3581} = (12, 14, 12, 1) = (\alpha^{14}, \alpha^8, \alpha^{14}, 1)$	$P_{3626} = (9, 1, 13, 1) = (\alpha^4, 1, \alpha^{11}, 1)$
$P_{3582} = (13, 14, 12, 1) = (\alpha^{11}, \alpha^8, \alpha^{14}, 1)$	$P_{3627} = (10, 1, 13, 1) = (\alpha^{10}, 1, \alpha^{11}, 1)$
$P_{3583} = (14, 14, 12, 1) = (\alpha^8, \alpha^8, \alpha^{14}, 1)$	$P_{3628} = (11, 1, 13, 1) = (\alpha^5, 1, \alpha^{11}, 1)$
$P_{3584} = (15, 14, 12, 1) = (\alpha^6, \alpha^8, \alpha$	

$P_{3634} = (1, 2, 13, 1) = (1, \alpha, \alpha^{11}, 1)$	$P_{3679} = (14, 4, 13, 1) = (\alpha^8, \alpha^2, \alpha^{11}, 1)$
$P_{3635} = (2, 2, 13, 1) = (\alpha, \alpha, \alpha^{11}, 1)$	$P_{3680} = (15, 4, 13, 1) = (\alpha^6, \alpha^2, \alpha^{11}, 1)$
$P_{3636} = (3, 2, 13, 1) = (\alpha^{12}, \alpha, \alpha^{11}, 1)$	$P_{3681} = (0, 5, 13, 1) = (0, \alpha^9, \alpha^{11}, 1)$
$P_{3637} = (4, 2, 13, 1) = (\alpha^2, \alpha, \alpha^{11}, 1)$	$P_{3682} = (1, 5, 13, 1) = (1, \alpha^9, \alpha^{11}, 1)$
$P_{3638} = (5, 2, 13, 1) = (\alpha^9, \alpha, \alpha^{11}, 1)$	$P_{3683} = (2, 5, 13, 1) = (\alpha, \alpha^9, \alpha^{11}, 1)$
$P_{3639} = (6, 2, 13, 1) = (\alpha^{13}, \alpha, \alpha^{11}, 1)$	$P_{3684} = (3, 5, 13, 1) = (\alpha^{12}, \alpha^9, \alpha^{11}, 1)$
$P_{3640} = (7, 2, 13, 1) = (\alpha^7, \alpha, \alpha^{11}, 1)$	$P_{3685} = (4, 5, 13, 1) = (\alpha^2, \alpha^9, \alpha^{11}, 1)$
$P_{3641} = (8, 2, 13, 1) = (\alpha^3, \alpha, \alpha^{11}, 1)$	$P_{3686} = (5, 5, 13, 1) = (\alpha^9, \alpha^9, \alpha^{11}, 1)$
$P_{3642} = (9, 2, 13, 1) = (\alpha^4, \alpha, \alpha^{11}, 1)$	$P_{3687} = (6, 5, 13, 1) = (\alpha^{13}, \alpha^9, \alpha^{11}, 1)$
$P_{3643} = (10, 2, 13, 1) = (\alpha^{10}, \alpha, \alpha^{11}, 1)$	$P_{3688} = (7, 5, 13, 1) = (\alpha^7, \alpha^9, \alpha^{11}, 1)$
$P_{3644} = (11, 2, 13, 1) = (\alpha^5, \alpha, \alpha^{11}, 1)$	$P_{3689} = (8, 5, 13, 1) = (\alpha^3, \alpha^9, \alpha^{11}, 1)$
$P_{3645} = (12, 2, 13, 1) = (\alpha^{14}, \alpha, \alpha^{11}, 1)$	$P_{3690} = (9, 5, 13, 1) = (\alpha^4, \alpha^9, \alpha^{11}, 1)$
$P_{3646} = (13, 2, 13, 1) = (\alpha^{11}, \alpha, \alpha^{11}, 1)$	$P_{3691} = (10, 5, 13, 1) = (\alpha^{10}, \alpha^9, \alpha^{11}, 1)$
$P_{3647} = (14, 2, 13, 1) = (\alpha^8, \alpha, \alpha^{11}, 1)$	$P_{3692} = (11, 5, 13, 1) = (\alpha^5, \alpha^9, \alpha^{11}, 1)$
$P_{3648} = (15, 2, 13, 1) = (\alpha^6, \alpha, \alpha^{11}, 1)$	$P_{3693} = (12, 5, 13, 1) = (\alpha^{14}, \alpha^9, \alpha^{11}, 1)$
$P_{3649} = (0, 3, 13, 1) = (0, \alpha^{12}, \alpha^{11}, 1)$	$P_{3694} = (13, 5, 13, 1) = (\alpha^{11}, \alpha^9, \alpha^{11}, 1)$
$P_{3650} = (1, 3, 13, 1) = (1, \alpha^{12}, \alpha^{11}, 1)$	$P_{3695} = (14, 5, 13, 1) = (\alpha^8, \alpha^9, \alpha^{11}, 1)$
$P_{3651} = (2, 3, 13, 1) = (\alpha, \alpha^{12}, \alpha^{11}, 1)$	$P_{3696} = (15, 5, 13, 1) = (\alpha^6, \alpha^9, \alpha^{11}, 1)$
$P_{3652} = (3, 3, 13, 1) = (\alpha^{12}, \alpha^{12}, \alpha^{11}, 1)$	$P_{3697} = (0, 6, 13, 1) = (0, \alpha^{13}, \alpha^{11}, 1)$
$P_{3653} = (4, 3, 13, 1) = (\alpha^2, \alpha^{12}, \alpha^{11}, 1)$	$P_{3698} = (1, 6, 13, 1) = (1, \alpha^{13}, \alpha^{11}, 1)$
$P_{3654} = (5, 3, 13, 1) = (\alpha^9, \alpha^{12}, \alpha^{11}, 1)$	$P_{3699} = (2, 6, 13, 1) = (\alpha, \alpha^{13}, \alpha^{11}, 1)$
$P_{3655} = (6, 3, 13, 1) = (\alpha^{13}, \alpha^{12}, \alpha^{11}, 1)$	$P_{3700} = (3, 6, 13, 1) = (\alpha^{12}, \alpha^{13}, \alpha^{11}, 1)$
$P_{3656} = (7, 3, 13, 1) = (\alpha^7, \alpha^{12}, \alpha^{11}, 1)$	$P_{3701} = (4, 6, 13, 1) = (\alpha^2, \alpha^{13}, \alpha^{11}, 1)$
$P_{3657} = (8, 3, 13, 1) = (\alpha^3, \alpha^{12}, \alpha^{11}, 1)$	$P_{3702} = (5, 6, 13, 1) = (\alpha^9, \alpha^{13}, \alpha^{11}, 1)$
$P_{3658} = (9, 3, 13, 1) = (\alpha^4, \alpha^{12}, \alpha^{11}, 1)$	$P_{3703} = (6, 6, 13, 1) = (\alpha^{13}, \alpha^{13}, \alpha^{11}, 1)$
$P_{3659} = (10, 3, 13, 1) = (\alpha^{10}, \alpha^{12}, \alpha^{11}, 1)$	$P_{3704} = (7, 6, 13, 1) = (\alpha^7, \alpha^{13}, \alpha^{11}, 1)$
$P_{3660} = (11, 3, 13, 1) = (\alpha^5, \alpha^{12}, \alpha^{11}, 1)$	$P_{3705} = (8, 6, 13, 1) = (\alpha^3, \alpha^{13}, \alpha^{11}, 1)$
$P_{3661} = (12, 3, 13, 1) = (\alpha^{14}, \alpha^{12}, \alpha^{11}, 1)$	$P_{3706} = (9, 6, 13, 1) = (\alpha^4, \alpha^{13}, \alpha^{11}, 1)$
$P_{3662} = (13, 3, 13, 1) = (\alpha^{11}, \alpha^{12}, \alpha^{11}, 1)$	$P_{3707} = (10, 6, 13, 1) = (\alpha^{10}, \alpha^{13}, \alpha^{11}, 1)$
$P_{3663} = (14, 3, 13, 1) = (\alpha^8, \alpha^{12}, \alpha^{11}, 1)$	$P_{3708} = (11, 6, 13, 1) = (\alpha^5, \alpha^{13}, \alpha^{11}, 1)$
$P_{3664} = (15, 3, 13, 1) = (\alpha^6, \alpha^{12}, \alpha^{11}, 1)$	$P_{3709} = (12, 6, 13, 1) = (\alpha^{14}, \alpha^{13}, \alpha^{11}, 1)$
$P_{3665} = (0, 4, 13, 1) = (0, \alpha^2, \alpha^{11}, 1)$	$P_{3710} = (13, 6, 13, 1) = (\alpha^{11}, \alpha^{13}, \alpha^{11}, 1)$
$P_{3666} = (1, 4, 13, 1) = (1, \alpha^2, \alpha^{11}, 1)$	$P_{3711} = (14, 6, 13, 1) = (\alpha^8, \alpha^{13}, \alpha^{11}, 1)$
$P_{3667} = (2, 4, 13, 1) = (\alpha, \alpha^2, \alpha^{11}, 1)$	$P_{3712} = (15, 6, 13, 1) = (\alpha^6, \alpha^{13}, \alpha^{11}, 1)$
$P_{3668} = (3, 4, 13, 1) = (\alpha^{12}, \alpha^2, \alpha^{11}, 1)$	$P_{3713} = (0, 7, 13, 1) = (0, \alpha^7, \alpha^{11}, 1)$
$P_{3669} = (4, 4, 13, 1) = (\alpha^2, \alpha^2, \alpha^{11}, 1)$	$P_{3714} = (1, 7, 13, 1) = (1, \alpha^7, \alpha^{11}, 1)$
$P_{3670} = (5, 4, 13, 1) = (\alpha^9, \alpha^2, \alpha^{11}, 1)$	$P_{3715} = (2, 7, 13, 1) = (\alpha, \alpha^7, \alpha^{11}, 1)$
$P_{3671} = (6, 4, 13, 1) = (\alpha^{13}, \alpha^2, \alpha^{11}, 1)$	$P_{3716} = (3, 7, 13, 1) = (\alpha^{12}, \alpha^7, \alpha^{11}, 1)$
$P_{3672} = (7, 4, 13, 1) = (\alpha^7, \alpha^2, \alpha^{11}, 1)$	$P_{3717} = (4, 7, 13, 1) = (\alpha^$

$$\begin{aligned}
P_{3724} &= (11, 7, 13, 1) = (\alpha^5, \alpha^7, \alpha^{11}, 1) \\
P_{3725} &= (12, 7, 13, 1) = (\alpha^{14}, \alpha^7, \alpha^{11}, 1) \\
P_{3726} &= (13, 7, 13, 1) = (\alpha^{11}, \alpha^7, \alpha^{11}, 1) \\
P_{3727} &= (14, 7, 13, 1) = (\alpha^8, \alpha^7, \alpha^{11}, 1) \\
P_{3728} &= (15, 7, 13, 1) = (\alpha^6, \alpha^7, \alpha^{11}, 1) \\
P_{3729} &= (0, 8, 13, 1) = (0, \alpha^3, \alpha^{11}, 1) \\
P_{3730} &= (1, 8, 13, 1) = (1, \alpha^3, \alpha^{11}, 1) \\
P_{3731} &= (2, 8, 13, 1) = (\alpha, \alpha^3, \alpha^{11}, 1) \\
P_{3732} &= (3, 8, 13, 1) = (\alpha^{12}, \alpha^3, \alpha^{11}, 1) \\
P_{3733} &= (4, 8, 13, 1) = (\alpha^2, \alpha^3, \alpha^{11}, 1) \\
P_{3734} &= (5, 8, 13, 1) = (\alpha^9, \alpha^3, \alpha^{11}, 1) \\
P_{3735} &= (6, 8, 13, 1) = (\alpha^{13}, \alpha^3, \alpha^{11}, 1) \\
P_{3736} &= (7, 8, 13, 1) = (\alpha^7, \alpha^3, \alpha^{11}, 1) \\
P_{3737} &= (8, 8, 13, 1) = (\alpha^3, \alpha^3, \alpha^{11}, 1) \\
P_{3738} &= (9, 8, 13, 1) = (\alpha^4, \alpha^3, \alpha^{11}, 1) \\
P_{3739} &= (10, 8, 13, 1) = (\alpha^{10}, \alpha^3, \alpha^{11}, 1) \\
P_{3740} &= (11, 8, 13, 1) = (\alpha^5, \alpha^3, \alpha^{11}, 1) \\
P_{3741} &= (12, 8, 13, 1) = (\alpha^{14}, \alpha^3, \alpha^{11}, 1) \\
P_{3742} &= (13, 8, 13, 1) = (\alpha^{11}, \alpha^3, \alpha^{11}, 1) \\
P_{3743} &= (14, 8, 13, 1) = (\alpha^8, \alpha^3, \alpha^{11}, 1) \\
P_{3744} &= (15, 8, 13, 1) = (\alpha^6, \alpha^3, \alpha^{11}, 1) \\
P_{3745} &= (0, 9, 13, 1) = (0, \alpha^4, \alpha^{11}, 1) \\
P_{3746} &= (1, 9, 13, 1) = (1, \alpha^4, \alpha^{11}, 1) \\
P_{3747} &= (2, 9, 13, 1) = (\alpha, \alpha^4, \alpha^{11}, 1) \\
P_{3748} &= (3, 9, 13, 1) = (\alpha^{12}, \alpha^4, \alpha^{11}, 1) \\
P_{3749} &= (4, 9, 13, 1) = (\alpha^2, \alpha^4, \alpha^{11}, 1) \\
P_{3750} &= (5, 9, 13, 1) = (\alpha^9, \alpha^4, \alpha^{11}, 1) \\
P_{3751} &= (6, 9, 13, 1) = (\alpha^{13}, \alpha^4, \alpha^{11}, 1) \\
P_{3752} &= (7, 9, 13, 1) = (\alpha^7, \alpha^4, \alpha^{11}, 1) \\
P_{3753} &= (8, 9, 13, 1) = (\alpha^3, \alpha^4, \alpha^{11}, 1) \\
P_{3754} &= (9, 9, 13, 1) = (\alpha^4, \alpha^4, \alpha^{11}, 1) \\
P_{3755} &= (10, 9, 13, 1) = (\alpha^{10}, \alpha^4, \alpha^{11}, 1) \\
P_{3756} &= (11, 9, 13, 1) = (\alpha^5, \alpha^4, \alpha^{11}, 1) \\
P_{3757} &= (12, 9, 13, 1) = (\alpha^{14}, \alpha^4, \alpha^{11}, 1) \\
P_{3758} &= (13, 9, 13, 1) = (\alpha^{11}, \alpha^4, \alpha^{11}, 1) \\
P_{3759} &= (14, 9, 13, 1) = (\alpha^8, \alpha^4, \alpha^{11}, 1) \\
P_{3760} &= (15, 9, 13, 1) = (\alpha^6, \alpha^4, \alpha^{11}, 1) \\
P_{3761} &= (0, 10, 13, 1) = (0, \alpha^{10}, \alpha^{11}, 1) \\
P_{3762} &= (1, 10, 13, 1) = (1, \alpha^{10}, \alpha^{11}, 1) \\
P_{3763} &= (2, 10, 13, 1) = (\alpha, \alpha^{10}, \alpha^{11}, 1) \\
P_{3764} &= (3, 10, 13, 1) = (\alpha^{12}, \alpha^{10}, \alpha^{11}, 1) \\
P_{3765} &= (4, 10, 13, 1) = (\alpha^2, \alpha^{10}, \alpha^{11}, 1) \\
P_{3766} &= (5, 10, 13, 1) = (\alpha^9, \alpha^{10}, \alpha^{11}, 1) \\
P_{3767} &= (6, 10, 13, 1) = (\alpha^{13}, \alpha^{10}, \alpha^{11}, 1) \\
P_{3768} &= (7, 10, 13, 1) = (\alpha^7, \alpha^{10}, \alpha^{11}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3769} &= (8, 10, 13, 1) = (\alpha^3, \alpha^{10}, \alpha^{11}, 1) \\
P_{3770} &= (9, 10, 13, 1) = (\alpha^4, \alpha^{10}, \alpha^{11}, 1) \\
P_{3771} &= (10, 10, 13, 1) = (\alpha^{10}, \alpha^{10}, \alpha^{11}, 1) \\
P_{3772} &= (11, 10, 13, 1) = (\alpha^5, \alpha^{10}, \alpha^{11}, 1) \\
P_{3773} &= (12, 10, 13, 1) = (\alpha^{14}, \alpha^{10}, \alpha^{11}, 1) \\
P_{3774} &= (13, 10, 13, 1) = (\alpha^{11}, \alpha^{10}, \alpha^{11}, 1) \\
P_{3775} &= (14, 10, 13, 1) = (\alpha^8, \alpha^{10}, \alpha^{11}, 1) \\
P_{3776} &= (15, 10, 13, 1) = (\alpha^6, \alpha^{10}, \alpha^{11}, 1) \\
P_{3777} &= (0, 11, 13, 1) = (0, \alpha^5, \alpha^{11}, 1) \\
P_{3778} &= (1, 11, 13, 1) = (1, \alpha^5, \alpha^{11}, 1) \\
P_{3779} &= (2, 11, 13, 1) = (\alpha, \alpha^5, \alpha^{11}, 1) \\
P_{3780} &= (3, 11, 13, 1) = (\alpha^{12}, \alpha^5, \alpha^{11}, 1) \\
P_{3781} &= (4, 11, 13, 1) = (\alpha^2, \alpha^5, \alpha^{11}, 1) \\
P_{3782} &= (5, 11, 13, 1) = (\alpha^9, \alpha^5, \alpha^{11}, 1) \\
P_{3783} &= (6, 11, 13, 1) = (\alpha^{13}, \alpha^5, \alpha^{11}, 1) \\
P_{3784} &= (7, 11, 13, 1) = (\alpha^7, \alpha^5, \alpha^{11}, 1) \\
P_{3785} &= (8, 11, 13, 1) = (\alpha^3, \alpha^5, \alpha^{11}, 1) \\
P_{3786} &= (9, 11, 13, 1) = (\alpha^4, \alpha^5, \alpha^{11}, 1) \\
P_{3787} &= (10, 11, 13, 1) = (\alpha^{10}, \alpha^5, \alpha^{11}, 1) \\
P_{3788} &= (11, 11, 13, 1) = (\alpha^5, \alpha^5, \alpha^{11}, 1) \\
P_{3789} &= (12, 11, 13, 1) = (\alpha^{14}, \alpha^5, \alpha^{11}, 1) \\
P_{3790} &= (13, 11, 13, 1) = (\alpha^{11}, \alpha^5, \alpha^{11}, 1) \\
P_{3791} &= (14, 11, 13, 1) = (\alpha^8, \alpha^5, \alpha^{11}, 1) \\
P_{3792} &= (15, 11, 13, 1) = (\alpha^6, \alpha^5, \alpha^{11}, 1) \\
P_{3793} &= (0, 12, 13, 1) = (0, \alpha^{14}, \alpha^{11}, 1) \\
P_{3794} &= (1, 12, 13, 1) = (1, \alpha^{14}, \alpha^{11}, 1) \\
P_{3795} &= (2, 12, 13, 1) = (\alpha, \alpha^{14}, \alpha^{11}, 1) \\
P_{3796} &= (3, 12, 13, 1) = (\alpha^{12}, \alpha^{14}, \alpha^{11}, 1) \\
P_{3797} &= (4, 12, 13, 1) = (\alpha^2, \alpha^{14}, \alpha^{11}, 1) \\
P_{3798} &= (5, 12, 13, 1) = (\alpha^9, \alpha^{14}, \alpha^{11}, 1) \\
P_{3799} &= (6, 12, 13, 1) = (\alpha^{13}, \alpha^{14}, \alpha^{11}, 1) \\
P_{3800} &= (7, 12, 13, 1) = (\alpha^7, \alpha^{14}, \alpha^{11}, 1) \\
P_{3801} &= (8, 12, 13, 1) = (\alpha^3, \alpha^{14}, \alpha^{11}, 1) \\
P_{3802} &= (9, 12, 13, 1) = (\alpha^4, \alpha^{14}, \alpha^{11}, 1) \\
P_{3803} &= (10, 12, 13, 1) = (\alpha^{10}, \alpha^{14}, \alpha^{11}, 1) \\
P_{3804} &= (11, 12, 13, 1) = (\alpha^5, \alpha^{14}, \alpha^{11}, 1) \\
P_{3805} &= (12, 12, 13, 1) = (\alpha^{14}, \alpha^{14}, \alpha^{11}, 1) \\
P_{3806} &= (13, 12, 13, 1) = (\alpha^{11}, \alpha^{14}, \alpha^{11}, 1) \\
P_{3807} &= (14, 12, 13, 1) = (\alpha^8, \alpha^{14}, \alpha^{11}, 1) \\
P_{3808} &= (15, 12, 13, 1) = (\alpha^6, \alpha^{14}, \alpha^{11}, 1) \\
P_{3809} &= (0, 13, 13, 1) = (0, \alpha^{11}, \alpha^{11}, 1) \\
P_{3810} &= (1, 13, 13, 1) = (1, \alpha^{11}, \alpha^{11}, 1) \\
P_{3811} &= (2, 13, 13, 1) = (\alpha, \alpha^{11}, \alpha^{11}, 1) \\
P_{3812} &= (3, 13, 13, 1) = (\alpha^{12}, \alpha^{11}, \alpha^{11}, 1) \\
P_{3813} &= (4, 13, 13, 1) = (\alpha^2, \alpha^{11}, \alpha^{11}, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3814} &= (5, 13, 13, 1) = (\alpha^9, \alpha^{11}, \alpha^{11}, 1) \\
P_{3815} &= (6, 13, 13, 1) = (\alpha^{13}, \alpha^{11}, \alpha^{11}, 1) \\
P_{3816} &= (7, 13, 13, 1) = (\alpha^7, \alpha^{11}, \alpha^{11}, 1) \\
P_{3817} &= (8, 13, 13, 1) = (\alpha^3, \alpha^{11}, \alpha^{11}, 1) \\
P_{3818} &= (9, 13, 13, 1) = (\alpha^4, \alpha^{11}, \alpha^{11}, 1) \\
P_{3819} &= (10, 13, 13, 1) = (\alpha^{10}, \alpha^{11}, \alpha^{11}, 1) \\
P_{3820} &= (11, 13, 13, 1) = (\alpha^5, \alpha^{11}, \alpha^{11}, 1) \\
P_{3821} &= (12, 13, 13, 1) = (\alpha^{14}, \alpha^{11}, \alpha^{11}, 1) \\
P_{3822} &= (13, 13, 13, 1) = (\alpha^{11}, \alpha^{11}, \alpha^{11}, 1) \\
P_{3823} &= (14, 13, 13, 1) = (\alpha^8, \alpha^{11}, \alpha^{11}, 1) \\
P_{3824} &= (15, 13, 13, 1) = (\alpha^6, \alpha^{11}, \alpha^{11}, 1) \\
P_{3825} &= (0, 14, 13, 1) = (0, \alpha^8, \alpha^{11}, 1) \\
P_{3826} &= (1, 14, 13, 1) = (1, \alpha^8, \alpha^{11}, 1) \\
P_{3827} &= (2, 14, 13, 1) = (\alpha, \alpha^8, \alpha^{11}, 1) \\
P_{3828} &= (3, 14, 13, 1) = (\alpha^{12}, \alpha^8, \alpha^{11}, 1) \\
P_{3829} &= (4, 14, 13, 1) = (\alpha^2, \alpha^8, \alpha^{11}, 1) \\
P_{3830} &= (5, 14, 13, 1) = (\alpha^9, \alpha^8, \alpha^{11}, 1) \\
P_{3831} &= (6, 14, 13, 1) = (\alpha^{13}, \alpha^8, \alpha^{11}, 1) \\
P_{3832} &= (7, 14, 13, 1) = (\alpha^7, \alpha^8, \alpha^{11}, 1) \\
P_{3833} &= (8, 14, 13, 1) = (\alpha^3, \alpha^8, \alpha^{11}, 1) \\
P_{3834} &= (9, 14, 13, 1) = (\alpha^4, \alpha^8, \alpha^{11}, 1) \\
P_{3835} &= (10, 14, 13, 1) = (\alpha^{10}, \alpha^8, \alpha^{11}, 1) \\
P_{3836} &= (11, 14, 13, 1) = (\alpha^5, \alpha^8, \alpha^{11}, 1) \\
P_{3837} &= (12, 14, 13, 1) = (\alpha^{14}, \alpha^8, \alpha^{11}, 1) \\
P_{3838} &= (13, 14, 13, 1) = (\alpha^{11}, \alpha^8, \alpha^{11}, 1) \\
P_{3839} &= (14, 14, 13, 1) = (\alpha^8, \alpha^8, \alpha^{11}, 1) \\
P_{3840} &= (15, 14, 13, 1) = (\alpha^6, \alpha^8, \alpha^{11}, 1) \\
P_{3841} &= (0, 15, 13, 1) = (0, \alpha^6, \alpha^{11}, 1) \\
P_{3842} &= (1, 15, 13, 1) = (1, \alpha^6, \alpha^{11}, 1) \\
P_{3843} &= (2, 15, 13, 1) = (\alpha, \alpha^6, \alpha^{11}, 1) \\
P_{3844} &= (3, 15, 13, 1) = (\alpha^{12}, \alpha^6, \alpha^{11}, 1) \\
P_{3845} &= (4, 15, 13, 1) = (\alpha^2, \alpha^6, \alpha^{11}, 1) \\
P_{3846} &= (5, 15, 13, 1) = (\alpha^9, \alpha^6, \alpha^{11}, 1) \\
P_{3847} &= (6, 15, 13, 1) = (\alpha^{13}, \alpha^6, \alpha^{11}, 1) \\
P_{3848} &= (7, 15, 13, 1) = (\alpha^7, \alpha^6, \alpha^{11}, 1) \\
P_{3849} &= (8, 15, 13, 1) = (\alpha^3, \alpha^6, \alpha^{11}, 1) \\
P_{3850} &= (9, 15, 13, 1) = (\alpha^4, \alpha^6, \alpha^{11}, 1) \\
P_{3851} &= (10, 15, 13, 1) = (\alpha^{10}, \alpha^6, \alpha^{11}, 1) \\
P_{3852} &= (11, 15, 13, 1) = (\alpha^5, \alpha^6, \alpha^{11}, 1) \\
P_{3853} &= (12, 15, 13, 1) = (\alpha^{14}, \alpha^6, \alpha^{11}, 1) \\
P_{3854} &= (13, 15, 13, 1) = (\alpha^{11}, \alpha^6, \alpha^{11}, 1) \\
P_{3855} &= (14, 15, 13, 1) = (\alpha^8, \alpha^6, \alpha^{11}, 1) \\
P_{3856} &= (15, 15, 13, 1) = (\alpha^6, \alpha^6, \alpha^{11}, 1) \\
P_{3857} &= (0, 0, 14, 1) = (0, 0, \alpha^8, 1) \\
P_{3858} &= (1, 0, 14, 1) = (1, 0, \alpha^8, 1) \\
P_{3859} &= (2, 0, 14, 1) = (\alpha, 0, \alpha^8, 1) \\
P_{3860} &= (3, 0, 14, 1) = (\alpha^{12}, 0, \alpha^8, 1) \\
P_{3861} &= (4, 0, 14, 1) = (\alpha^2, 0, \alpha^8, 1) \\
P_{3862} &= (5, 0, 14, 1) = (\alpha^9, 0, \alpha^8, 1) \\
P_{3863} &= (6, 0, 14, 1) = (\alpha^{13}, 0, \alpha^8, 1) \\
P_{3864} &= (7, 0, 14, 1) = (\alpha^7, 0, \alpha^8, 1) \\
P_{3865} &= (8, 0, 14, 1) = (\alpha^3, 0, \alpha^8, 1) \\
P_{3866} &= (9, 0, 14, 1) = (\alpha^4, 0, \alpha^8, 1) \\
P_{3867} &= (10, 0, 14, 1) = (\alpha^{10}, 0, \alpha^8, 1) \\
P_{3868} &= (11, 0, 14, 1) = (\alpha^5, 0, \alpha^8, 1) \\
P_{3869} &= (12, 0, 14, 1) = (\alpha^{14}, 0, \alpha^8, 1) \\
P_{3870} &= (13, 0, 14, 1) = (\alpha^{11}, 0, \alpha^8, 1) \\
P_{3871} &= (14, 0, 14, 1) = (\alpha^8, 0, \alpha^8, 1) \\
P_{3872} &= (15, 0, 14, 1) = (\alpha^6, 0, \alpha^8, 1) \\
P_{3873} &= (0, 1, 14, 1) = (0, 1, \alpha^8, 1) \\
P_{3874} &= (1, 1, 14, 1) = (1, 1, \alpha^8, 1) \\
P_{3875} &= (2, 1, 14, 1) = (\alpha, 1, \alpha^8, 1) \\
P_{3876} &= (3, 1, 14, 1) = (\alpha^{12}, 1, \alpha^8, 1) \\
P_{3877} &= (4, 1, 14, 1) = (\alpha^2, 1, \alpha^8, 1) \\
P_{3878} &= (5, 1, 14, 1) = (\alpha^9, 1, \alpha^8, 1) \\
P_{3879} &= (6, 1, 14, 1) = (\alpha^{13}, 1, \alpha^8, 1) \\
P_{3880} &= (7, 1, 14, 1) = (\alpha^7, 1, \alpha^8, 1) \\
P_{3881} &= (8, 1, 14, 1) = (\alpha^3, 1, \alpha^8, 1) \\
P_{3882} &= (9, 1, 14, 1) = (\alpha^4, 1, \alpha^8, 1) \\
P_{3883} &= (10, 1, 14, 1) = (\alpha^{10}, 1, \alpha^8, 1) \\
P_{3884} &= (11, 1, 14, 1) = (\alpha^5, 1, \alpha^8, 1) \\
P_{3885} &= (12, 1, 14, 1) = (\alpha^{14}, 1, \alpha^8, 1) \\
P_{3886} &= (13, 1, 14, 1) = (\alpha^{11}, 1, \alpha^8, 1) \\
P_{3887} &= (14, 1, 14, 1) = (\alpha^8, 1, \alpha^8, 1) \\
P_{3888} &= (15, 1, 14, 1) = (\alpha^6, 1, \alpha^8, 1) \\
P_{3889} &= (0, 2, 14, 1) = (0, \alpha, \alpha^8, 1) \\
P_{3890} &= (1, 2, 14, 1) = (1, \alpha, \alpha^8, 1) \\
P_{3891} &= (2, 2, 14, 1) = (\alpha, \alpha, \alpha^8, 1) \\
P_{3892} &= (3, 2, 14, 1) = (\alpha^{12}, \alpha, \alpha^8, 1) \\
P_{3893} &= (4, 2, 14, 1) = (\alpha^2, \alpha, \alpha^8, 1) \\
P_{3894} &= (5, 2, 14, 1) = (\alpha^9, \alpha, \alpha^8, 1) \\
P_{3895} &= (6, 2, 14, 1) = (\alpha^{13}, \alpha, \alpha^8, 1) \\
P_{3896} &= (7, 2, 14, 1) = (\alpha^7, \alpha, \alpha^8, 1) \\
P_{3897} &= (8, 2, 14, 1) = (\alpha^3, \alpha, \alpha^8, 1) \\
P_{3898} &= (9, 2, 14, 1) = (\alpha^4, \alpha, \alpha^8, 1) \\
P_{3899} &= (10, 2, 14, 1) = (\alpha^{10}, \alpha, \alpha^8, 1) \\
P_{3900} &= (11, 2, 14, 1) = (\alpha^5, \alpha, \alpha^8, 1) \\
P_{3901} &= (12, 2, 14, 1) = (\alpha^{14}, \alpha, \alpha^8, 1) \\
P_{3902} &= (13, 2, 14, 1) = (\alpha^{11}, \alpha, \alpha^8, 1) \\
P_{3903} &= (14, 2, 14, 1) = (\alpha^8, \alpha, \alpha^8, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3904} &= (15, 2, 14, 1) = (\alpha^6, \alpha, \alpha^8, 1) \\
P_{3905} &= (0, 3, 14, 1) = (0, \alpha^{12}, \alpha^8, 1) \\
P_{3906} &= (1, 3, 14, 1) = (1, \alpha^{12}, \alpha^8, 1) \\
P_{3907} &= (2, 3, 14, 1) = (\alpha, \alpha^{12}, \alpha^8, 1) \\
P_{3908} &= (3, 3, 14, 1) = (\alpha^{12}, \alpha^{12}, \alpha^8, 1) \\
P_{3909} &= (4, 3, 14, 1) = (\alpha^2, \alpha^{12}, \alpha^8, 1) \\
P_{3910} &= (5, 3, 14, 1) = (\alpha^9, \alpha^{12}, \alpha^8, 1) \\
P_{3911} &= (6, 3, 14, 1) = (\alpha^{13}, \alpha^{12}, \alpha^8, 1) \\
P_{3912} &= (7, 3, 14, 1) = (\alpha^7, \alpha^{12}, \alpha^8, 1) \\
P_{3913} &= (8, 3, 14, 1) = (\alpha^3, \alpha^{12}, \alpha^8, 1) \\
P_{3914} &= (9, 3, 14, 1) = (\alpha^4, \alpha^{12}, \alpha^8, 1) \\
P_{3915} &= (10, 3, 14, 1) = (\alpha^{10}, \alpha^{12}, \alpha^8, 1) \\
P_{3916} &= (11, 3, 14, 1) = (\alpha^5, \alpha^{12}, \alpha^8, 1) \\
P_{3917} &= (12, 3, 14, 1) = (\alpha^{14}, \alpha^{12}, \alpha^8, 1) \\
P_{3918} &= (13, 3, 14, 1) = (\alpha^{11}, \alpha^{12}, \alpha^8, 1) \\
P_{3919} &= (14, 3, 14, 1) = (\alpha^8, \alpha^{12}, \alpha^8, 1) \\
P_{3920} &= (15, 3, 14, 1) = (\alpha^6, \alpha^{12}, \alpha^8, 1) \\
P_{3921} &= (0, 4, 14, 1) = (0, \alpha^2, \alpha^8, 1) \\
P_{3922} &= (1, 4, 14, 1) = (1, \alpha^2, \alpha^8, 1) \\
P_{3923} &= (2, 4, 14, 1) = (\alpha, \alpha^2, \alpha^8, 1) \\
P_{3924} &= (3, 4, 14, 1) = (\alpha^{12}, \alpha^2, \alpha^8, 1) \\
P_{3925} &= (4, 4, 14, 1) = (\alpha^2, \alpha^2, \alpha^8, 1) \\
P_{3926} &= (5, 4, 14, 1) = (\alpha^9, \alpha^2, \alpha^8, 1) \\
P_{3927} &= (6, 4, 14, 1) = (\alpha^{13}, \alpha^2, \alpha^8, 1) \\
P_{3928} &= (7, 4, 14, 1) = (\alpha^7, \alpha^2, \alpha^8, 1) \\
P_{3929} &= (8, 4, 14, 1) = (\alpha^3, \alpha^2, \alpha^8, 1) \\
P_{3930} &= (9, 4, 14, 1) = (\alpha^4, \alpha^2, \alpha^8, 1) \\
P_{3931} &= (10, 4, 14, 1) = (\alpha^{10}, \alpha^2, \alpha^8, 1) \\
P_{3932} &= (11, 4, 14, 1) = (\alpha^5, \alpha^2, \alpha^8, 1) \\
P_{3933} &= (12, 4, 14, 1) = (\alpha^{14}, \alpha^2, \alpha^8, 1) \\
P_{3934} &= (13, 4, 14, 1) = (\alpha^{11}, \alpha^2, \alpha^8, 1) \\
P_{3935} &= (14, 4, 14, 1) = (\alpha^8, \alpha^2, \alpha^8, 1) \\
P_{3936} &= (15, 4, 14, 1) = (\alpha^6, \alpha^2, \alpha^8, 1) \\
P_{3937} &= (0, 5, 14, 1) = (0, \alpha^9, \alpha^8, 1) \\
P_{3938} &= (1, 5, 14, 1) = (1, \alpha^9, \alpha^8, 1) \\
P_{3939} &= (2, 5, 14, 1) = (\alpha, \alpha^9, \alpha^8, 1) \\
P_{3940} &= (3, 5, 14, 1) = (\alpha^{12}, \alpha^9, \alpha^8, 1) \\
P_{3941} &= (4, 5, 14, 1) = (\alpha^2, \alpha^9, \alpha^8, 1) \\
P_{3942} &= (5, 5, 14, 1) = (\alpha^9, \alpha^9, \alpha^8, 1) \\
P_{3943} &= (6, 5, 14, 1) = (\alpha^{13}, \alpha^9, \alpha^8, 1) \\
P_{3944} &= (7, 5, 14, 1) = (\alpha^7, \alpha^9, \alpha^8, 1) \\
P_{3945} &= (8, 5, 14, 1) = (\alpha^3, \alpha^9, \alpha^8, 1) \\
P_{3946} &= (9, 5, 14, 1) = (\alpha^4, \alpha^9, \alpha^8, 1) \\
P_{3947} &= (10, 5, 14, 1) = (\alpha^{10}, \alpha^9, \alpha^8, 1) \\
P_{3948} &= (11, 5, 14, 1) = (\alpha^5, \alpha^9, \alpha^8, 1) \\
P_{3949} &= (12, 5, 14, 1) = (\alpha^{14}, \alpha^9, \alpha^8, 1) \\
P_{3950} &= (13, 5, 14, 1) = (\alpha^{11}, \alpha^9, \alpha^8, 1) \\
P_{3951} &= (14, 5, 14, 1) = (\alpha^8, \alpha^9, \alpha^8, 1) \\
P_{3952} &= (15, 5, 14, 1) = (\alpha^6, \alpha^9, \alpha^8, 1) \\
P_{3953} &= (0, 6, 14, 1) = (0, \alpha^{13}, \alpha^8, 1) \\
P_{3954} &= (1, 6, 14, 1) = (1, \alpha^{13}, \alpha^8, 1) \\
P_{3955} &= (2, 6, 14, 1) = (\alpha, \alpha^{13}, \alpha^8, 1) \\
P_{3956} &= (3, 6, 14, 1) = (\alpha^{12}, \alpha^{13}, \alpha^8, 1) \\
P_{3957} &= (4, 6, 14, 1) = (\alpha^2, \alpha^{13}, \alpha^8, 1) \\
P_{3958} &= (5, 6, 14, 1) = (\alpha^9, \alpha^{13}, \alpha^8, 1) \\
P_{3959} &= (6, 6, 14, 1) = (\alpha^{13}, \alpha^{13}, \alpha^8, 1) \\
P_{3960} &= (7, 6, 14, 1) = (\alpha^7, \alpha^{13}, \alpha^8, 1) \\
P_{3961} &= (8, 6, 14, 1) = (\alpha^3, \alpha^{13}, \alpha^8, 1) \\
P_{3962} &= (9, 6, 14, 1) = (\alpha^4, \alpha^{13}, \alpha^8, 1) \\
P_{3963} &= (10, 6, 14, 1) = (\alpha^{10}, \alpha^{13}, \alpha^8, 1) \\
P_{3964} &= (11, 6, 14, 1) = (\alpha^5, \alpha^{13}, \alpha^8, 1) \\
P_{3965} &= (12, 6, 14, 1) = (\alpha^{14}, \alpha^{13}, \alpha^8, 1) \\
P_{3966} &= (13, 6, 14, 1) = (\alpha^{11}, \alpha^{13}, \alpha^8, 1) \\
P_{3967} &= (14, 6, 14, 1) = (\alpha^8, \alpha^{13}, \alpha^8, 1) \\
P_{3968} &= (15, 6, 14, 1) = (\alpha^6, \alpha^{13}, \alpha^8, 1) \\
P_{3969} &= (0, 7, 14, 1) = (0, \alpha^7, \alpha^8, 1) \\
P_{3970} &= (1, 7, 14, 1) = (1, \alpha^7, \alpha^8, 1) \\
P_{3971} &= (2, 7, 14, 1) = (\alpha, \alpha^7, \alpha^8, 1) \\
P_{3972} &= (3, 7, 14, 1) = (\alpha^{12}, \alpha^7, \alpha^8, 1) \\
P_{3973} &= (4, 7, 14, 1) = (\alpha^2, \alpha^7, \alpha^8, 1) \\
P_{3974} &= (5, 7, 14, 1) = (\alpha^9, \alpha^7, \alpha^8, 1) \\
P_{3975} &= (6, 7, 14, 1) = (\alpha^{13}, \alpha^7, \alpha^8, 1) \\
P_{3976} &= (7, 7, 14, 1) = (\alpha^7, \alpha^7, \alpha^8, 1) \\
P_{3977} &= (8, 7, 14, 1) = (\alpha^3, \alpha^7, \alpha^8, 1) \\
P_{3978} &= (9, 7, 14, 1) = (\alpha^4, \alpha^7, \alpha^8, 1) \\
P_{3979} &= (10, 7, 14, 1) = (\alpha^{10}, \alpha^7, \alpha^8, 1) \\
P_{3980} &= (11, 7, 14, 1) = (\alpha^5, \alpha^7, \alpha^8, 1) \\
P_{3981} &= (12, 7, 14, 1) = (\alpha^{14}, \alpha^7, \alpha^8, 1) \\
P_{3982} &= (13, 7, 14, 1) = (\alpha^{11}, \alpha^7, \alpha^8, 1) \\
P_{3983} &= (14, 7, 14, 1) = (\alpha^8, \alpha^7, \alpha^8, 1) \\
P_{3984} &= (15, 7, 14, 1) = (\alpha^6, \alpha^7, \alpha^8, 1) \\
P_{3985} &= (0, 8, 14, 1) = (0, \alpha^3, \alpha^8, 1) \\
P_{3986} &= (1, 8, 14, 1) = (1, \alpha^3, \alpha^8, 1) \\
P_{3987} &= (2, 8, 14, 1) = (\alpha, \alpha^3, \alpha^8, 1) \\
P_{3988} &= (3, 8, 14, 1) = (\alpha^{12}, \alpha^3, \alpha^8, 1) \\
P_{3989} &= (4, 8, 14, 1) = (\alpha^2, \alpha^3, \alpha^8, 1) \\
P_{3990} &= (5, 8, 14, 1) = (\alpha^9, \alpha^3, \alpha^8, 1) \\
P_{3991} &= (6, 8, 14, 1) = (\alpha^{13}, \alpha^3, \alpha^8, 1) \\
P_{3992} &= (7, 8, 14, 1) = (\alpha^7, \alpha^3, \alpha^8, 1) \\
P_{3993} &= (8, 8, 14, 1) = (\alpha^3, \alpha^3, \alpha^8, 1)
\end{aligned}$$

$$\begin{aligned}
P_{3994} &= (9, 8, 14, 1) = (\alpha^4, \alpha^3, \alpha^8, 1) \\
P_{3995} &= (10, 8, 14, 1) = (\alpha^{10}, \alpha^3, \alpha^8, 1) \\
P_{3996} &= (11, 8, 14, 1) = (\alpha^5, \alpha^3, \alpha^8, 1) \\
P_{3997} &= (12, 8, 14, 1) = (\alpha^{14}, \alpha^3, \alpha^8, 1) \\
P_{3998} &= (13, 8, 14, 1) = (\alpha^{11}, \alpha^3, \alpha^8, 1) \\
P_{3999} &= (14, 8, 14, 1) = (\alpha^8, \alpha^3, \alpha^8, 1) \\
P_{4000} &= (15, 8, 14, 1) = (\alpha^6, \alpha^3, \alpha^8, 1) \\
P_{4001} &= (0, 9, 14, 1) = (0, \alpha^4, \alpha^8, 1) \\
P_{4002} &= (1, 9, 14, 1) = (1, \alpha^4, \alpha^8, 1) \\
P_{4003} &= (2, 9, 14, 1) = (\alpha, \alpha^4, \alpha^8, 1) \\
P_{4004} &= (3, 9, 14, 1) = (\alpha^{12}, \alpha^4, \alpha^8, 1) \\
P_{4005} &= (4, 9, 14, 1) = (\alpha^2, \alpha^4, \alpha^8, 1) \\
P_{4006} &= (5, 9, 14, 1) = (\alpha^9, \alpha^4, \alpha^8, 1) \\
P_{4007} &= (6, 9, 14, 1) = (\alpha^{13}, \alpha^4, \alpha^8, 1) \\
P_{4008} &= (7, 9, 14, 1) = (\alpha^7, \alpha^4, \alpha^8, 1) \\
P_{4009} &= (8, 9, 14, 1) = (\alpha^3, \alpha^4, \alpha^8, 1) \\
P_{4010} &= (9, 9, 14, 1) = (\alpha^4, \alpha^4, \alpha^8, 1) \\
P_{4011} &= (10, 9, 14, 1) = (\alpha^{10}, \alpha^4, \alpha^8, 1) \\
P_{4012} &= (11, 9, 14, 1) = (\alpha^5, \alpha^4, \alpha^8, 1) \\
P_{4013} &= (12, 9, 14, 1) = (\alpha^{14}, \alpha^4, \alpha^8, 1) \\
P_{4014} &= (13, 9, 14, 1) = (\alpha^{11}, \alpha^4, \alpha^8, 1) \\
P_{4015} &= (14, 9, 14, 1) = (\alpha^8, \alpha^4, \alpha^8, 1) \\
P_{4016} &= (15, 9, 14, 1) = (\alpha^6, \alpha^4, \alpha^8, 1) \\
P_{4017} &= (0, 10, 14, 1) = (0, \alpha^{10}, \alpha^8, 1) \\
P_{4018} &= (1, 10, 14, 1) = (1, \alpha^{10}, \alpha^8, 1) \\
P_{4019} &= (2, 10, 14, 1) = (\alpha, \alpha^{10}, \alpha^8, 1) \\
P_{4020} &= (3, 10, 14, 1) = (\alpha^{12}, \alpha^{10}, \alpha^8, 1) \\
P_{4021} &= (4, 10, 14, 1) = (\alpha^2, \alpha^{10}, \alpha^8, 1) \\
P_{4022} &= (5, 10, 14, 1) = (\alpha^9, \alpha^{10}, \alpha^8, 1) \\
P_{4023} &= (6, 10, 14, 1) = (\alpha^{13}, \alpha^{10}, \alpha^8, 1) \\
P_{4024} &= (7, 10, 14, 1) = (\alpha^7, \alpha^{10}, \alpha^8, 1) \\
P_{4025} &= (8, 10, 14, 1) = (\alpha^3, \alpha^{10}, \alpha^8, 1) \\
P_{4026} &= (9, 10, 14, 1) = (\alpha^4, \alpha^{10}, \alpha^8, 1) \\
P_{4027} &= (10, 10, 14, 1) = (\alpha^{10}, \alpha^{10}, \alpha^8, 1) \\
P_{4028} &= (11, 10, 14, 1) = (\alpha^5, \alpha^{10}, \alpha^8, 1) \\
P_{4029} &= (12, 10, 14, 1) = (\alpha^{14}, \alpha^{10}, \alpha^8, 1) \\
P_{4030} &= (13, 10, 14, 1) = (\alpha^{11}, \alpha^{10}, \alpha^8, 1) \\
P_{4031} &= (14, 10, 14, 1) = (\alpha^8, \alpha^{10}, \alpha^8, 1) \\
P_{4032} &= (15, 10, 14, 1) = (\alpha^6, \alpha^{10}, \alpha^8, 1) \\
P_{4033} &= (0, 11, 14, 1) = (0, \alpha^5, \alpha^8, 1) \\
P_{4034} &= (1, 11, 14, 1) = (1, \alpha^5, \alpha^8, 1) \\
P_{4035} &= (2, 11, 14, 1) = (\alpha, \alpha^5, \alpha^8, 1) \\
P_{4036} &= (3, 11, 14, 1) = (\alpha^{12}, \alpha^5, \alpha^8, 1) \\
P_{4037} &= (4, 11, 14, 1) = (\alpha^2, \alpha^5, \alpha^8, 1) \\
P_{4038} &= (5, 11, 14, 1) = (\alpha^9, \alpha^5, \alpha^8, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4039} &= (6, 11, 14, 1) = (\alpha^{13}, \alpha^5, \alpha^8, 1) \\
P_{4040} &= (7, 11, 14, 1) = (\alpha^7, \alpha^5, \alpha^8, 1) \\
P_{4041} &= (8, 11, 14, 1) = (\alpha^3, \alpha^5, \alpha^8, 1) \\
P_{4042} &= (9, 11, 14, 1) = (\alpha^4, \alpha^5, \alpha^8, 1) \\
P_{4043} &= (10, 11, 14, 1) = (\alpha^{10}, \alpha^5, \alpha^8, 1) \\
P_{4044} &= (11, 11, 14, 1) = (\alpha^5, \alpha^5, \alpha^8, 1) \\
P_{4045} &= (12, 11, 14, 1) = (\alpha^{14}, \alpha^5, \alpha^8, 1) \\
P_{4046} &= (13, 11, 14, 1) = (\alpha^{11}, \alpha^5, \alpha^8, 1) \\
P_{4047} &= (14, 11, 14, 1) = (\alpha^8, \alpha^5, \alpha^8, 1) \\
P_{4048} &= (15, 11, 14, 1) = (\alpha^6, \alpha^5, \alpha^8, 1) \\
P_{4049} &= (0, 12, 14, 1) = (0, \alpha^{14}, \alpha^8, 1) \\
P_{4050} &= (1, 12, 14, 1) = (1, \alpha^{14}, \alpha^8, 1) \\
P_{4051} &= (2, 12, 14, 1) = (\alpha, \alpha^{14}, \alpha^8, 1) \\
P_{4052} &= (3, 12, 14, 1) = (\alpha^{12}, \alpha^{14}, \alpha^8, 1) \\
P_{4053} &= (4, 12, 14, 1) = (\alpha^2, \alpha^{14}, \alpha^8, 1) \\
P_{4054} &= (5, 12, 14, 1) = (\alpha^9, \alpha^{14}, \alpha^8, 1) \\
P_{4055} &= (6, 12, 14, 1) = (\alpha^{13}, \alpha^{14}, \alpha^8, 1) \\
P_{4056} &= (7, 12, 14, 1) = (\alpha^7, \alpha^{14}, \alpha^8, 1) \\
P_{4057} &= (8, 12, 14, 1) = (\alpha^3, \alpha^{14}, \alpha^8, 1) \\
P_{4058} &= (9, 12, 14, 1) = (\alpha^4, \alpha^{14}, \alpha^8, 1) \\
P_{4059} &= (10, 12, 14, 1) = (\alpha^{10}, \alpha^{14}, \alpha^8, 1) \\
P_{4060} &= (11, 12, 14, 1) = (\alpha^5, \alpha^{14}, \alpha^8, 1) \\
P_{4061} &= (12, 12, 14, 1) = (\alpha^{14}, \alpha^{14}, \alpha^8, 1) \\
P_{4062} &= (13, 12, 14, 1) = (\alpha^{11}, \alpha^{14}, \alpha^8, 1) \\
P_{4063} &= (14, 12, 14, 1) = (\alpha^8, \alpha^{14}, \alpha^8, 1) \\
P_{4064} &= (15, 12, 14, 1) = (\alpha^6, \alpha^{14}, \alpha^8, 1) \\
P_{4065} &= (0, 13, 14, 1) = (0, \alpha^{11}, \alpha^8, 1) \\
P_{4066} &= (1, 13, 14, 1) = (1, \alpha^{11}, \alpha^8, 1) \\
P_{4067} &= (2, 13, 14, 1) = (\alpha, \alpha^{11}, \alpha^8, 1) \\
P_{4068} &= (3, 13, 14, 1) = (\alpha^{12}, \alpha^{11}, \alpha^8, 1) \\
P_{4069} &= (4, 13, 14, 1) = (\alpha^2, \alpha^{11}, \alpha^8, 1) \\
P_{4070} &= (5, 13, 14, 1) = (\alpha^9, \alpha^{11}, \alpha^8, 1) \\
P_{4071} &= (6, 13, 14, 1) = (\alpha^{13}, \alpha^{11}, \alpha^8, 1) \\
P_{4072} &= (7, 13, 14, 1) = (\alpha^7, \alpha^{11}, \alpha^8, 1) \\
P_{4073} &= (8, 13, 14, 1) = (\alpha^3, \alpha^{11}, \alpha^8, 1) \\
P_{4074} &= (9, 13, 14, 1) = (\alpha^4, \alpha^{11}, \alpha^8, 1) \\
P_{4075} &= (10, 13, 14, 1) = (\alpha^{10}, \alpha^{11}, \alpha^8, 1) \\
P_{4076} &= (11, 13, 14, 1) = (\alpha^5, \alpha^{11}, \alpha^8, 1) \\
P_{4077} &= (12, 13, 14, 1) = (\alpha^{14}, \alpha^{11}, \alpha^8, 1) \\
P_{4078} &= (13, 13, 14, 1) = (\alpha^{11}, \alpha^{11}, \alpha^8, 1) \\
P_{4079} &= (14, 13, 14, 1) = (\alpha^8, \alpha^{11}, \alpha^8, 1) \\
P_{4080} &= (15, 13, 14, 1) = (\alpha^6, \alpha^{11}, \alpha^8, 1) \\
P_{4081} &= (0, 14, 14, 1) = (0, \alpha^8, \alpha^8, 1) \\
P_{4082} &= (1, 14, 14, 1) = (1, \alpha^8, \alpha^8, 1) \\
P_{4083} &= (2, 14, 14, 1) = (\alpha, \alpha^8, \alpha^8, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4084} &= (3, 14, 14, 1) = (\alpha^{12}, \alpha^8, \alpha^8, 1) \\
P_{4085} &= (4, 14, 14, 1) = (\alpha^2, \alpha^8, \alpha^8, 1) \\
P_{4086} &= (5, 14, 14, 1) = (\alpha^9, \alpha^8, \alpha^8, 1) \\
P_{4087} &= (6, 14, 14, 1) = (\alpha^{13}, \alpha^8, \alpha^8, 1) \\
P_{4088} &= (7, 14, 14, 1) = (\alpha^7, \alpha^8, \alpha^8, 1) \\
P_{4089} &= (8, 14, 14, 1) = (\alpha^3, \alpha^8, \alpha^8, 1) \\
P_{4090} &= (9, 14, 14, 1) = (\alpha^4, \alpha^8, \alpha^8, 1) \\
P_{4091} &= (10, 14, 14, 1) = (\alpha^{10}, \alpha^8, \alpha^8, 1) \\
P_{4092} &= (11, 14, 14, 1) = (\alpha^5, \alpha^8, \alpha^8, 1) \\
P_{4093} &= (12, 14, 14, 1) = (\alpha^{14}, \alpha^8, \alpha^8, 1) \\
P_{4094} &= (13, 14, 14, 1) = (\alpha^{11}, \alpha^8, \alpha^8, 1) \\
P_{4095} &= (14, 14, 14, 1) = (\alpha^8, \alpha^8, \alpha^8, 1) \\
P_{4096} &= (15, 14, 14, 1) = (\alpha^6, \alpha^8, \alpha^8, 1) \\
P_{4097} &= (0, 15, 14, 1) = (0, \alpha^6, \alpha^8, 1) \\
P_{4098} &= (1, 15, 14, 1) = (1, \alpha^6, \alpha^8, 1) \\
P_{4099} &= (2, 15, 14, 1) = (\alpha, \alpha^6, \alpha^8, 1) \\
P_{4100} &= (3, 15, 14, 1) = (\alpha^{12}, \alpha^6, \alpha^8, 1) \\
P_{4101} &= (4, 15, 14, 1) = (\alpha^2, \alpha^6, \alpha^8, 1) \\
P_{4102} &= (5, 15, 14, 1) = (\alpha^9, \alpha^6, \alpha^8, 1) \\
P_{4103} &= (6, 15, 14, 1) = (\alpha^{13}, \alpha^6, \alpha^8, 1) \\
P_{4104} &= (7, 15, 14, 1) = (\alpha^7, \alpha^6, \alpha^8, 1) \\
P_{4105} &= (8, 15, 14, 1) = (\alpha^3, \alpha^6, \alpha^8, 1) \\
P_{4106} &= (9, 15, 14, 1) = (\alpha^4, \alpha^6, \alpha^8, 1) \\
P_{4107} &= (10, 15, 14, 1) = (\alpha^{10}, \alpha^6, \alpha^8, 1) \\
P_{4108} &= (11, 15, 14, 1) = (\alpha^5, \alpha^6, \alpha^8, 1) \\
P_{4109} &= (12, 15, 14, 1) = (\alpha^{14}, \alpha^6, \alpha^8, 1) \\
P_{4110} &= (13, 15, 14, 1) = (\alpha^{11}, \alpha^6, \alpha^8, 1) \\
P_{4111} &= (14, 15, 14, 1) = (\alpha^8, \alpha^6, \alpha^8, 1) \\
P_{4112} &= (15, 15, 14, 1) = (\alpha^6, \alpha^6, \alpha^8, 1) \\
P_{4113} &= (0, 0, 15, 1) = (0, 0, \alpha^6, 1) \\
P_{4114} &= (1, 0, 15, 1) = (1, 0, \alpha^6, 1) \\
P_{4115} &= (2, 0, 15, 1) = (\alpha, 0, \alpha^6, 1) \\
P_{4116} &= (3, 0, 15, 1) = (\alpha^{12}, 0, \alpha^6, 1) \\
P_{4117} &= (4, 0, 15, 1) = (\alpha^2, 0, \alpha^6, 1) \\
P_{4118} &= (5, 0, 15, 1) = (\alpha^9, 0, \alpha^6, 1) \\
P_{4119} &= (6, 0, 15, 1) = (\alpha^{13}, 0, \alpha^6, 1) \\
P_{4120} &= (7, 0, 15, 1) = (\alpha^7, 0, \alpha^6, 1) \\
P_{4121} &= (8, 0, 15, 1) = (\alpha^3, 0, \alpha^6, 1) \\
P_{4122} &= (9, 0, 15, 1) = (\alpha^4, 0, \alpha^6, 1) \\
P_{4123} &= (10, 0, 15, 1) = (\alpha^{10}, 0, \alpha^6, 1) \\
P_{4124} &= (11, 0, 15, 1) = (\alpha^5, 0, \alpha^6, 1) \\
P_{4125} &= (12, 0, 15, 1) = (\alpha^{14}, 0, \alpha^6, 1) \\
P_{4126} &= (13, 0, 15, 1) = (\alpha^{11}, 0, \alpha^6, 1) \\
P_{4127} &= (14, 0, 15, 1) = (\alpha^8, 0, \alpha^6, 1) \\
P_{4128} &= (15, 0, 15, 1) = (\alpha^6, 0, \alpha^6, 1) \\
P_{4129} &= (0, 1, 15, 1) = (0, 1, \alpha^6, 1) \\
P_{4130} &= (1, 1, 15, 1) = (1, 1, \alpha^6, 1) \\
P_{4131} &= (2, 1, 15, 1) = (\alpha, 1, \alpha^6, 1) \\
P_{4132} &= (3, 1, 15, 1) = (\alpha^{12}, 1, \alpha^6, 1) \\
P_{4133} &= (4, 1, 15, 1) = (\alpha^2, 1, \alpha^6, 1) \\
P_{4134} &= (5, 1, 15, 1) = (\alpha^9, 1, \alpha^6, 1) \\
P_{4135} &= (6, 1, 15, 1) = (\alpha^{13}, 1, \alpha^6, 1) \\
P_{4136} &= (7, 1, 15, 1) = (\alpha^7, 1, \alpha^6, 1) \\
P_{4137} &= (8, 1, 15, 1) = (\alpha^3, 1, \alpha^6, 1) \\
P_{4138} &= (9, 1, 15, 1) = (\alpha^4, 1, \alpha^6, 1) \\
P_{4139} &= (10, 1, 15, 1) = (\alpha^{10}, 1, \alpha^6, 1) \\
P_{4140} &= (11, 1, 15, 1) = (\alpha^5, 1, \alpha^6, 1) \\
P_{4141} &= (12, 1, 15, 1) = (\alpha^{14}, 1, \alpha^6, 1) \\
P_{4142} &= (13, 1, 15, 1) = (\alpha^{11}, 1, \alpha^6, 1) \\
P_{4143} &= (14, 1, 15, 1) = (\alpha^8, 1, \alpha^6, 1) \\
P_{4144} &= (15, 1, 15, 1) = (\alpha^6, 1, \alpha^6, 1) \\
P_{4145} &= (0, 2, 15, 1) = (0, \alpha, \alpha^6, 1) \\
P_{4146} &= (1, 2, 15, 1) = (1, \alpha, \alpha^6, 1) \\
P_{4147} &= (2, 2, 15, 1) = (\alpha, \alpha, \alpha^6, 1) \\
P_{4148} &= (3, 2, 15, 1) = (\alpha^{12}, \alpha, \alpha^6, 1) \\
P_{4149} &= (4, 2, 15, 1) = (\alpha^2, \alpha, \alpha^6, 1) \\
P_{4150} &= (5, 2, 15, 1) = (\alpha^9, \alpha, \alpha^6, 1) \\
P_{4151} &= (6, 2, 15, 1) = (\alpha^{13}, \alpha, \alpha^6, 1) \\
P_{4152} &= (7, 2, 15, 1) = (\alpha^7, \alpha, \alpha^6, 1) \\
P_{4153} &= (8, 2, 15, 1) = (\alpha^3, \alpha, \alpha^6, 1) \\
P_{4154} &= (9, 2, 15, 1) = (\alpha^4, \alpha, \alpha^6, 1) \\
P_{4155} &= (10, 2, 15, 1) = (\alpha^{10}, \alpha, \alpha^6, 1) \\
P_{4156} &= (11, 2, 15, 1) = (\alpha^5, \alpha, \alpha^6, 1) \\
P_{4157} &= (12, 2, 15, 1) = (\alpha^{14}, \alpha, \alpha^6, 1) \\
P_{4158} &= (13, 2, 15, 1) = (\alpha^{11}, \alpha, \alpha^6, 1) \\
P_{4159} &= (14, 2, 15, 1) = (\alpha^8, \alpha, \alpha^6, 1) \\
P_{4160} &= (15, 2, 15, 1) = (\alpha^6, \alpha, \alpha^6, 1) \\
P_{4161} &= (0, 3, 15, 1) = (0, \alpha^{12}, \alpha^6, 1) \\
P_{4162} &= (1, 3, 15, 1) = (1, \alpha^{12}, \alpha^6, 1) \\
P_{4163} &= (2, 3, 15, 1) = (\alpha, \alpha^{12}, \alpha^6, 1) \\
P_{4164} &= (3, 3, 15, 1) = (\alpha^{12}, \alpha^{12}, \alpha^6, 1) \\
P_{4165} &= (4, 3, 15, 1) = (\alpha^2, \alpha^{12}, \alpha^6, 1) \\
P_{4166} &= (5, 3, 15, 1) = (\alpha^9, \alpha^{12}, \alpha^6, 1) \\
P_{4167} &= (6, 3, 15, 1) = (\alpha^{13}, \alpha^{12}, \alpha^6, 1) \\
P_{4168} &= (7, 3, 15, 1) = (\alpha^7, \alpha^{12}, \alpha^6, 1) \\
P_{4169} &= (8, 3, 15, 1) = (\alpha^3, \alpha^{12}, \alpha^6, 1) \\
P_{4170} &= (9, 3, 15, 1) = (\alpha^4, \alpha^{12}, \alpha^6, 1) \\
P_{4171} &= (10, 3, 15, 1) = (\alpha^{10}, \alpha^{12}, \alpha^6, 1) \\
P_{4172} &= (11, 3, 15, 1) = (\alpha^5, \alpha^{12}, \alpha^6, 1) \\
P_{4173} &= (12, 3, 15, 1) = (\alpha^{14}, \alpha^{12}, \alpha^6, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4174} &= (13, 3, 15, 1) = (\alpha^{11}, \alpha^{12}, \alpha^6, 1) \\
P_{4175} &= (14, 3, 15, 1) = (\alpha^8, \alpha^{12}, \alpha^6, 1) \\
P_{4176} &= (15, 3, 15, 1) = (\alpha^6, \alpha^{12}, \alpha^6, 1) \\
P_{4177} &= (0, 4, 15, 1) = (0, \alpha^2, \alpha^6, 1) \\
P_{4178} &= (1, 4, 15, 1) = (1, \alpha^2, \alpha^6, 1) \\
P_{4179} &= (2, 4, 15, 1) = (\alpha, \alpha^2, \alpha^6, 1) \\
P_{4180} &= (3, 4, 15, 1) = (\alpha^{12}, \alpha^2, \alpha^6, 1) \\
P_{4181} &= (4, 4, 15, 1) = (\alpha^2, \alpha^2, \alpha^6, 1) \\
P_{4182} &= (5, 4, 15, 1) = (\alpha^9, \alpha^2, \alpha^6, 1) \\
P_{4183} &= (6, 4, 15, 1) = (\alpha^{13}, \alpha^2, \alpha^6, 1) \\
P_{4184} &= (7, 4, 15, 1) = (\alpha^7, \alpha^2, \alpha^6, 1) \\
P_{4185} &= (8, 4, 15, 1) = (\alpha^3, \alpha^2, \alpha^6, 1) \\
P_{4186} &= (9, 4, 15, 1) = (\alpha^4, \alpha^2, \alpha^6, 1) \\
P_{4187} &= (10, 4, 15, 1) = (\alpha^{10}, \alpha^2, \alpha^6, 1) \\
P_{4188} &= (11, 4, 15, 1) = (\alpha^5, \alpha^2, \alpha^6, 1) \\
P_{4189} &= (12, 4, 15, 1) = (\alpha^{14}, \alpha^2, \alpha^6, 1) \\
P_{4190} &= (13, 4, 15, 1) = (\alpha^{11}, \alpha^2, \alpha^6, 1) \\
P_{4191} &= (14, 4, 15, 1) = (\alpha^8, \alpha^2, \alpha^6, 1) \\
P_{4192} &= (15, 4, 15, 1) = (\alpha^6, \alpha^2, \alpha^6, 1) \\
P_{4193} &= (0, 5, 15, 1) = (0, \alpha^9, \alpha^6, 1) \\
P_{4194} &= (1, 5, 15, 1) = (1, \alpha^9, \alpha^6, 1) \\
P_{4195} &= (2, 5, 15, 1) = (\alpha, \alpha^9, \alpha^6, 1) \\
P_{4196} &= (3, 5, 15, 1) = (\alpha^{12}, \alpha^9, \alpha^6, 1) \\
P_{4197} &= (4, 5, 15, 1) = (\alpha^2, \alpha^9, \alpha^6, 1) \\
P_{4198} &= (5, 5, 15, 1) = (\alpha^9, \alpha^9, \alpha^6, 1) \\
P_{4199} &= (6, 5, 15, 1) = (\alpha^{13}, \alpha^9, \alpha^6, 1) \\
P_{4200} &= (7, 5, 15, 1) = (\alpha^7, \alpha^9, \alpha^6, 1) \\
P_{4201} &= (8, 5, 15, 1) = (\alpha^3, \alpha^9, \alpha^6, 1) \\
P_{4202} &= (9, 5, 15, 1) = (\alpha^4, \alpha^9, \alpha^6, 1) \\
P_{4203} &= (10, 5, 15, 1) = (\alpha^{10}, \alpha^9, \alpha^6, 1) \\
P_{4204} &= (11, 5, 15, 1) = (\alpha^5, \alpha^9, \alpha^6, 1) \\
P_{4205} &= (12, 5, 15, 1) = (\alpha^{14}, \alpha^9, \alpha^6, 1) \\
P_{4206} &= (13, 5, 15, 1) = (\alpha^{11}, \alpha^9, \alpha^6, 1) \\
P_{4207} &= (14, 5, 15, 1) = (\alpha^8, \alpha^9, \alpha^6, 1) \\
P_{4208} &= (15, 5, 15, 1) = (\alpha^6, \alpha^9, \alpha^6, 1) \\
P_{4209} &= (0, 6, 15, 1) = (0, \alpha^{13}, \alpha^6, 1) \\
P_{4210} &= (1, 6, 15, 1) = (1, \alpha^{13}, \alpha^6, 1) \\
P_{4211} &= (2, 6, 15, 1) = (\alpha, \alpha^{13}, \alpha^6, 1) \\
P_{4212} &= (3, 6, 15, 1) = (\alpha^{12}, \alpha^{13}, \alpha^6, 1) \\
P_{4213} &= (4, 6, 15, 1) = (\alpha^2, \alpha^{13}, \alpha^6, 1) \\
P_{4214} &= (5, 6, 15, 1) = (\alpha^9, \alpha^{13}, \alpha^6, 1) \\
P_{4215} &= (6, 6, 15, 1) = (\alpha^{13}, \alpha^{13}, \alpha^6, 1) \\
P_{4216} &= (7, 6, 15, 1) = (\alpha^7, \alpha^{13}, \alpha^6, 1) \\
P_{4217} &= (8, 6, 15, 1) = (\alpha^3, \alpha^{13}, \alpha^6, 1) \\
P_{4218} &= (9, 6, 15, 1) = (\alpha^4, \alpha^{13}, \alpha^6, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4219} &= (10, 6, 15, 1) = (\alpha^{10}, \alpha^{13}, \alpha^6, 1) \\
P_{4220} &= (11, 6, 15, 1) = (\alpha^5, \alpha^{13}, \alpha^6, 1) \\
P_{4221} &= (12, 6, 15, 1) = (\alpha^{14}, \alpha^{13}, \alpha^6, 1) \\
P_{4222} &= (13, 6, 15, 1) = (\alpha^{11}, \alpha^{13}, \alpha^6, 1) \\
P_{4223} &= (14, 6, 15, 1) = (\alpha^8, \alpha^{13}, \alpha^6, 1) \\
P_{4224} &= (15, 6, 15, 1) = (\alpha^6, \alpha^{13}, \alpha^6, 1) \\
P_{4225} &= (0, 7, 15, 1) = (0, \alpha^7, \alpha^6, 1) \\
P_{4226} &= (1, 7, 15, 1) = (1, \alpha^7, \alpha^6, 1) \\
P_{4227} &= (2, 7, 15, 1) = (\alpha, \alpha^7, \alpha^6, 1) \\
P_{4228} &= (3, 7, 15, 1) = (\alpha^{12}, \alpha^7, \alpha^6, 1) \\
P_{4229} &= (4, 7, 15, 1) = (\alpha^2, \alpha^7, \alpha^6, 1) \\
P_{4230} &= (5, 7, 15, 1) = (\alpha^9, \alpha^7, \alpha^6, 1) \\
P_{4231} &= (6, 7, 15, 1) = (\alpha^{13}, \alpha^7, \alpha^6, 1) \\
P_{4232} &= (7, 7, 15, 1) = (\alpha^7, \alpha^7, \alpha^6, 1) \\
P_{4233} &= (8, 7, 15, 1) = (\alpha^3, \alpha^7, \alpha^6, 1) \\
P_{4234} &= (9, 7, 15, 1) = (\alpha^4, \alpha^7, \alpha^6, 1) \\
P_{4235} &= (10, 7, 15, 1) = (\alpha^{10}, \alpha^7, \alpha^6, 1) \\
P_{4236} &= (11, 7, 15, 1) = (\alpha^5, \alpha^7, \alpha^6, 1) \\
P_{4237} &= (12, 7, 15, 1) = (\alpha^{14}, \alpha^7, \alpha^6, 1) \\
P_{4238} &= (13, 7, 15, 1) = (\alpha^{11}, \alpha^7, \alpha^6, 1) \\
P_{4239} &= (14, 7, 15, 1) = (\alpha^8, \alpha^7, \alpha^6, 1) \\
P_{4240} &= (15, 7, 15, 1) = (\alpha^6, \alpha^7, \alpha^6, 1) \\
P_{4241} &= (0, 8, 15, 1) = (0, \alpha^3, \alpha^6, 1) \\
P_{4242} &= (1, 8, 15, 1) = (1, \alpha^3, \alpha^6, 1) \\
P_{4243} &= (2, 8, 15, 1) = (\alpha, \alpha^3, \alpha^6, 1) \\
P_{4244} &= (3, 8, 15, 1) = (\alpha^{12}, \alpha^3, \alpha^6, 1) \\
P_{4245} &= (4, 8, 15, 1) = (\alpha^2, \alpha^3, \alpha^6, 1) \\
P_{4246} &= (5, 8, 15, 1) = (\alpha^9, \alpha^3, \alpha^6, 1) \\
P_{4247} &= (6, 8, 15, 1) = (\alpha^{13}, \alpha^3, \alpha^6, 1) \\
P_{4248} &= (7, 8, 15, 1) = (\alpha^7, \alpha^3, \alpha^6, 1) \\
P_{4249} &= (8, 8, 15, 1) = (\alpha^3, \alpha^3, \alpha^6, 1) \\
P_{4250} &= (9, 8, 15, 1) = (\alpha^4, \alpha^3, \alpha^6, 1) \\
P_{4251} &= (10, 8, 15, 1) = (\alpha^{10}, \alpha^3, \alpha^6, 1) \\
P_{4252} &= (11, 8, 15, 1) = (\alpha^5, \alpha^3, \alpha^6, 1) \\
P_{4253} &= (12, 8, 15, 1) = (\alpha^{14}, \alpha^3, \alpha^6, 1) \\
P_{4254} &= (13, 8, 15, 1) = (\alpha^{11}, \alpha^3, \alpha^6, 1) \\
P_{4255} &= (14, 8, 15, 1) = (\alpha^8, \alpha^3, \alpha^6, 1) \\
P_{4256} &= (15, 8, 15, 1) = (\alpha^6, \alpha^3, \alpha^6, 1) \\
P_{4257} &= (0, 9, 15, 1) = (0, \alpha^4, \alpha^6, 1) \\
P_{4258} &= (1, 9, 15, 1) = (1, \alpha^4, \alpha^6, 1) \\
P_{4259} &= (2, 9, 15, 1) = (\alpha, \alpha^4, \alpha^6, 1) \\
P_{4260} &= (3, 9, 15, 1) = (\alpha^{12}, \alpha^4, \alpha^6, 1) \\
P_{4261} &= (4, 9, 15, 1) = (\alpha^2, \alpha^4, \alpha^6, 1) \\
P_{4262} &= (5, 9, 15, 1) = (\alpha^9, \alpha^4, \alpha^6, 1) \\
P_{4263} &= (6, 9, 15, 1) = (\alpha^{13}, \alpha^4, \alpha^6, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4264} &= (7, 9, 15, 1) = (\alpha^7, \alpha^4, \alpha^6, 1) \\
P_{4265} &= (8, 9, 15, 1) = (\alpha^3, \alpha^4, \alpha^6, 1) \\
P_{4266} &= (9, 9, 15, 1) = (\alpha^4, \alpha^4, \alpha^6, 1) \\
P_{4267} &= (10, 9, 15, 1) = (\alpha^{10}, \alpha^4, \alpha^6, 1) \\
P_{4268} &= (11, 9, 15, 1) = (\alpha^5, \alpha^4, \alpha^6, 1) \\
P_{4269} &= (12, 9, 15, 1) = (\alpha^{14}, \alpha^4, \alpha^6, 1) \\
P_{4270} &= (13, 9, 15, 1) = (\alpha^{11}, \alpha^4, \alpha^6, 1) \\
P_{4271} &= (14, 9, 15, 1) = (\alpha^8, \alpha^4, \alpha^6, 1) \\
P_{4272} &= (15, 9, 15, 1) = (\alpha^6, \alpha^4, \alpha^6, 1) \\
P_{4273} &= (0, 10, 15, 1) = (0, \alpha^{10}, \alpha^6, 1) \\
P_{4274} &= (1, 10, 15, 1) = (1, \alpha^{10}, \alpha^6, 1) \\
P_{4275} &= (2, 10, 15, 1) = (\alpha, \alpha^{10}, \alpha^6, 1) \\
P_{4276} &= (3, 10, 15, 1) = (\alpha^{12}, \alpha^{10}, \alpha^6, 1) \\
P_{4277} &= (4, 10, 15, 1) = (\alpha^2, \alpha^{10}, \alpha^6, 1) \\
P_{4278} &= (5, 10, 15, 1) = (\alpha^9, \alpha^{10}, \alpha^6, 1) \\
P_{4279} &= (6, 10, 15, 1) = (\alpha^{13}, \alpha^{10}, \alpha^6, 1) \\
P_{4280} &= (7, 10, 15, 1) = (\alpha^7, \alpha^{10}, \alpha^6, 1) \\
P_{4281} &= (8, 10, 15, 1) = (\alpha^3, \alpha^{10}, \alpha^6, 1) \\
P_{4282} &= (9, 10, 15, 1) = (\alpha^4, \alpha^{10}, \alpha^6, 1) \\
P_{4283} &= (10, 10, 15, 1) = (\alpha^{10}, \alpha^{10}, \alpha^6, 1) \\
P_{4284} &= (11, 10, 15, 1) = (\alpha^5, \alpha^{10}, \alpha^6, 1) \\
P_{4285} &= (12, 10, 15, 1) = (\alpha^{14}, \alpha^{10}, \alpha^6, 1) \\
P_{4286} &= (13, 10, 15, 1) = (\alpha^{11}, \alpha^{10}, \alpha^6, 1) \\
P_{4287} &= (14, 10, 15, 1) = (\alpha^8, \alpha^{10}, \alpha^6, 1) \\
P_{4288} &= (15, 10, 15, 1) = (\alpha^6, \alpha^{10}, \alpha^6, 1) \\
P_{4289} &= (0, 11, 15, 1) = (0, \alpha^5, \alpha^6, 1) \\
P_{4290} &= (1, 11, 15, 1) = (1, \alpha^5, \alpha^6, 1) \\
P_{4291} &= (2, 11, 15, 1) = (\alpha, \alpha^5, \alpha^6, 1) \\
P_{4292} &= (3, 11, 15, 1) = (\alpha^{12}, \alpha^5, \alpha^6, 1) \\
P_{4293} &= (4, 11, 15, 1) = (\alpha^2, \alpha^5, \alpha^6, 1) \\
P_{4294} &= (5, 11, 15, 1) = (\alpha^9, \alpha^5, \alpha^6, 1) \\
P_{4295} &= (6, 11, 15, 1) = (\alpha^{13}, \alpha^5, \alpha^6, 1) \\
P_{4296} &= (7, 11, 15, 1) = (\alpha^7, \alpha^5, \alpha^6, 1) \\
P_{4297} &= (8, 11, 15, 1) = (\alpha^3, \alpha^5, \alpha^6, 1) \\
P_{4298} &= (9, 11, 15, 1) = (\alpha^4, \alpha^5, \alpha^6, 1) \\
P_{4299} &= (10, 11, 15, 1) = (\alpha^{10}, \alpha^5, \alpha^6, 1) \\
P_{4300} &= (11, 11, 15, 1) = (\alpha^5, \alpha^5, \alpha^6, 1) \\
P_{4301} &= (12, 11, 15, 1) = (\alpha^{14}, \alpha^5, \alpha^6, 1) \\
P_{4302} &= (13, 11, 15, 1) = (\alpha^{11}, \alpha^5, \alpha^6, 1) \\
P_{4303} &= (14, 11, 15, 1) = (\alpha^8, \alpha^5, \alpha^6, 1) \\
P_{4304} &= (15, 11, 15, 1) = (\alpha^6, \alpha^5, \alpha^6, 1) \\
P_{4305} &= (0, 12, 15, 1) = (0, \alpha^{14}, \alpha^6, 1) \\
P_{4306} &= (1, 12, 15, 1) = (1, \alpha^{14}, \alpha^6, 1) \\
P_{4307} &= (2, 12, 15, 1) = (\alpha, \alpha^{14}, \alpha^6, 1) \\
P_{4308} &= (3, 12, 15, 1) = (\alpha^{12}, \alpha^{14}, \alpha^6, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4309} &= (4, 12, 15, 1) = (\alpha^2, \alpha^{14}, \alpha^6, 1) \\
P_{4310} &= (5, 12, 15, 1) = (\alpha^9, \alpha^{14}, \alpha^6, 1) \\
P_{4311} &= (6, 12, 15, 1) = (\alpha^{13}, \alpha^{14}, \alpha^6, 1) \\
P_{4312} &= (7, 12, 15, 1) = (\alpha^7, \alpha^{14}, \alpha^6, 1) \\
P_{4313} &= (8, 12, 15, 1) = (\alpha^3, \alpha^{14}, \alpha^6, 1) \\
P_{4314} &= (9, 12, 15, 1) = (\alpha^4, \alpha^{14}, \alpha^6, 1) \\
P_{4315} &= (10, 12, 15, 1) = (\alpha^{10}, \alpha^{14}, \alpha^6, 1) \\
P_{4316} &= (11, 12, 15, 1) = (\alpha^5, \alpha^{14}, \alpha^6, 1) \\
P_{4317} &= (12, 12, 15, 1) = (\alpha^{14}, \alpha^{14}, \alpha^6, 1) \\
P_{4318} &= (13, 12, 15, 1) = (\alpha^{11}, \alpha^{14}, \alpha^6, 1) \\
P_{4319} &= (14, 12, 15, 1) = (\alpha^8, \alpha^{14}, \alpha^6, 1) \\
P_{4320} &= (15, 12, 15, 1) = (\alpha^6, \alpha^{14}, \alpha^6, 1) \\
P_{4321} &= (0, 13, 15, 1) = (0, \alpha^{11}, \alpha^6, 1) \\
P_{4322} &= (1, 13, 15, 1) = (1, \alpha^{11}, \alpha^6, 1) \\
P_{4323} &= (2, 13, 15, 1) = (\alpha, \alpha^{11}, \alpha^6, 1) \\
P_{4324} &= (3, 13, 15, 1) = (\alpha^{12}, \alpha^{11}, \alpha^6, 1) \\
P_{4325} &= (4, 13, 15, 1) = (\alpha^2, \alpha^{11}, \alpha^6, 1) \\
P_{4326} &= (5, 13, 15, 1) = (\alpha^9, \alpha^{11}, \alpha^6, 1) \\
P_{4327} &= (6, 13, 15, 1) = (\alpha^{13}, \alpha^{11}, \alpha^6, 1) \\
P_{4328} &= (7, 13, 15, 1) = (\alpha^7, \alpha^{11}, \alpha^6, 1) \\
P_{4329} &= (8, 13, 15, 1) = (\alpha^3, \alpha^{11}, \alpha^6, 1) \\
P_{4330} &= (9, 13, 15, 1) = (\alpha^4, \alpha^{11}, \alpha^6, 1) \\
P_{4331} &= (10, 13, 15, 1) = (\alpha^{10}, \alpha^{11}, \alpha^6, 1) \\
P_{4332} &= (11, 13, 15, 1) = (\alpha^5, \alpha^{11}, \alpha^6, 1) \\
P_{4333} &= (12, 13, 15, 1) = (\alpha^{14}, \alpha^{11}, \alpha^6, 1) \\
P_{4334} &= (13, 13, 15, 1) = (\alpha^{11}, \alpha^{11}, \alpha^6, 1) \\
P_{4335} &= (14, 13, 15, 1) = (\alpha^8, \alpha^{11}, \alpha^6, 1) \\
P_{4336} &= (15, 13, 15, 1) = (\alpha^6, \alpha^{11}, \alpha^6, 1) \\
P_{4337} &= (0, 14, 15, 1) = (0, \alpha^8, \alpha^6, 1) \\
P_{4338} &= (1, 14, 15, 1) = (1, \alpha^8, \alpha^6, 1) \\
P_{4339} &= (2, 14, 15, 1) = (\alpha, \alpha^8, \alpha^6, 1) \\
P_{4340} &= (3, 14, 15, 1) = (\alpha^{12}, \alpha^8, \alpha^6, 1) \\
P_{4341} &= (4, 14, 15, 1) = (\alpha^2, \alpha^8, \alpha^6, 1) \\
P_{4342} &= (5, 14, 15, 1) = (\alpha^9, \alpha^8, \alpha^6, 1) \\
P_{4343} &= (6, 14, 15, 1) = (\alpha^{13}, \alpha^8, \alpha^6, 1) \\
P_{4344} &= (7, 14, 15, 1) = (\alpha^7, \alpha^8, \alpha^6, 1) \\
P_{4345} &= (8, 14, 15, 1) = (\alpha^3, \alpha^8, \alpha^6, 1) \\
P_{4346} &= (9, 14, 15, 1) = (\alpha^4, \alpha^8, \alpha^6, 1) \\
P_{4347} &= (10, 14, 15, 1) = (\alpha^{10}, \alpha^8, \alpha^6, 1) \\
P_{4348} &= (11, 14, 15, 1) = (\alpha^5, \alpha^8, \alpha^6, 1) \\
P_{4349} &= (12, 14, 15, 1) = (\alpha^{14}, \alpha^8, \alpha^6, 1) \\
P_{4350} &= (13, 14, 15, 1) = (\alpha^{11}, \alpha^8, \alpha^6, 1) \\
P_{4351} &= (14, 14, 15, 1) = (\alpha^8, \alpha^8, \alpha^6, 1) \\
P_{4352} &= (15, 14, 15, 1) = (\alpha^6, \alpha^8, \alpha^6, 1) \\
P_{4353} &= (0, 15, 15, 1) = (0, \alpha^6, \alpha^6, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4354} &= (1, 15, 15, 1) = (1, \alpha^6, \alpha^6, 1) \\
P_{4355} &= (2, 15, 15, 1) = (\alpha, \alpha^6, \alpha^6, 1) \\
P_{4356} &= (3, 15, 15, 1) = (\alpha^{12}, \alpha^6, \alpha^6, 1) \\
P_{4357} &= (4, 15, 15, 1) = (\alpha^2, \alpha^6, \alpha^6, 1) \\
P_{4358} &= (5, 15, 15, 1) = (\alpha^9, \alpha^6, \alpha^6, 1) \\
P_{4359} &= (6, 15, 15, 1) = (\alpha^{13}, \alpha^6, \alpha^6, 1) \\
P_{4360} &= (7, 15, 15, 1) = (\alpha^7, \alpha^6, \alpha^6, 1) \\
P_{4361} &= (8, 15, 15, 1) = (\alpha^3, \alpha^6, \alpha^6, 1)
\end{aligned}$$

$$\begin{aligned}
P_{4362} &= (9, 15, 15, 1) = (\alpha^4, \alpha^6, \alpha^6, 1) \\
P_{4363} &= (10, 15, 15, 1) = (\alpha^{10}, \alpha^6, \alpha^6, 1) \\
P_{4364} &= (11, 15, 15, 1) = (\alpha^5, \alpha^6, \alpha^6, 1) \\
P_{4365} &= (12, 15, 15, 1) = (\alpha^{14}, \alpha^6, \alpha^6, 1) \\
P_{4366} &= (13, 15, 15, 1) = (\alpha^{11}, \alpha^6, \alpha^6, 1) \\
P_{4367} &= (14, 15, 15, 1) = (\alpha^8, \alpha^6, \alpha^6, 1) \\
P_{4368} &= (15, 15, 15, 1) = (\alpha^6, \alpha^6, \alpha^6, 1)
\end{aligned}$$

Baer subgeometry:

$P_0 = (1, 0, 0, 0)$	$P_{206} = (1, 1, 10, 0)$	$P_{556} = (1, 10, 10, 10)$	$P_{3010} = (1, 11, 10, 1)$
$P_1 = (0, 1, 0, 0)$	$P_{275} = (1, 0, 0, 1)$	$P_{689} = (0, 1, 11, 11)$	$P_{3019} = (1, 10, 1, 11)$
$P_2 = (0, 0, 1, 0)$	$P_{284} = (1, 0, 0, 11)$	$P_{690} = (1, 10, 1, 1)$	$P_{3020} = (1, 1, 11, 10)$
$P_3 = (0, 0, 0, 1)$	$P_{285} = (1, 0, 0, 10)$	$P_{699} = (1, 1, 11, 11)$	$P_{3089} = (0, 0, 1, 10)$
$P_4 = (1, 1, 1, 1)$	$P_{290} = (0, 1, 0, 1)$	$P_{700} = (1, 11, 10, 10)$	$P_{3090} = (1, 0, 11, 1)$
$P_5 = (1, 1, 0, 0)$	$P_{291} = (1, 1, 0, 1)$	$P_{705} = (0, 1, 10, 10)$	$P_{3099} = (1, 0, 10, 11)$
$P_{14} = (1, 11, 0, 0)$	$P_{300} = (1, 11, 0, 11)$	$P_{706} = (1, 11, 1, 1)$	$P_{3100} = (1, 0, 1, 10)$
$P_{15} = (1, 10, 0, 0)$	$P_{301} = (1, 10, 0, 10)$	$P_{715} = (1, 10, 11, 11)$	$P_{3105} = (0, 1, 11, 1)$
$P_{20} = (1, 0, 1, 0)$	$P_{434} = (0, 1, 0, 11)$	$P_{716} = (1, 1, 10, 10)$	$P_{3106} = (1, 1, 11, 1)$
$P_{29} = (1, 0, 11, 0)$	$P_{435} = (1, 10, 0, 1)$	$P_{2833} = (0, 0, 1, 11)$	$P_{3115} = (1, 11, 10, 11)$
$P_{30} = (1, 0, 10, 0)$	$P_{444} = (1, 1, 0, 11)$	$P_{2834} = (1, 0, 10, 1)$	$P_{3116} = (1, 10, 1, 10)$
$P_{35} = (0, 1, 1, 0)$	$P_{445} = (1, 11, 0, 10)$	$P_{2843} = (1, 0, 1, 11)$	$P_{3249} = (0, 1, 10, 11)$
$P_{36} = (1, 1, 1, 0)$	$P_{450} = (0, 1, 0, 10)$	$P_{2844} = (1, 0, 11, 10)$	$P_{3250} = (1, 10, 11, 1)$
$P_{45} = (1, 11, 11, 0)$	$P_{451} = (1, 11, 0, 1)$	$P_{2849} = (0, 1, 10, 1)$	$P_{3259} = (1, 1, 10, 11)$
$P_{46} = (1, 10, 10, 0)$	$P_{460} = (1, 10, 0, 11)$	$P_{2850} = (1, 1, 10, 1)$	$P_{3260} = (1, 11, 1, 10)$
$P_{179} = (0, 1, 11, 0)$	$P_{461} = (1, 1, 0, 10)$	$P_{2859} = (1, 11, 1, 11)$	$P_{3265} = (0, 1, 1, 10)$
$P_{180} = (1, 10, 1, 0)$	$P_{530} = (0, 0, 1, 1)$	$P_{2860} = (1, 10, 11, 10)$	$P_{3266} = (1, 11, 11, 1)$
$P_{189} = (1, 1, 11, 0)$	$P_{531} = (1, 0, 1, 1)$	$P_{2993} = (0, 1, 1, 11)$	$P_{3275} = (1, 10, 10, 11)$
$P_{190} = (1, 11, 10, 0)$	$P_{540} = (1, 0, 11, 11)$	$P_{2994} = (1, 10, 10, 1)$	$P_{3276} = (1, 1, 1, 10)$
$P_{195} = (0, 1, 10, 0)$	$P_{541} = (1, 0, 10, 10)$	$P_{3003} = (1, 1, 1, 11)$	
$P_{196} = (1, 11, 1, 0)$	$P_{546} = (0, 1, 1, 1)$	$P_{3004} = (1, 11, 11, 10)$	
$P_{205} = (1, 10, 11, 0)$	$P_{555} = (1, 11, 11, 11)$	$P_{3009} = (0, 1, 11, 10)$	

There are 85 elements in the Baer subgeometry.

Normalized from the left:

$P_0 = (1, 0, 0, 0)$	$P_6 = (1, 12, 0, 0)$	$P_{12} = (1, 3, 0, 0)$	$P_{18} = (1, 7, 0, 0)$
$P_1 = (0, 1, 0, 0)$	$P_7 = (1, 8, 0, 0)$	$P_{13} = (1, 13, 0, 0)$	$P_{19} = (1, 5, 0, 0)$
$P_2 = (0, 0, 1, 0)$	$P_8 = (1, 6, 0, 0)$	$P_{14} = (1, 11, 0, 0)$	$P_{20} = (1, 0, 1, 0)$
$P_3 = (0, 0, 0, 1)$	$P_9 = (1, 15, 0, 0)$	$P_{15} = (1, 10, 0, 0)$	$P_{21} = (1, 0, 12, 0)$
$P_4 = (1, 1, 1, 1)$	$P_{10} = (1, 4, 0, 0)$	$P_{16} = (1, 2, 0, 0)$	$P_{22} = (1, 0, 8, 0)$
$P_5 = (1, 1, 0, 0)$	$P_{11} = (1, 14, 0, 0)$	$P_{17} = (1, 9, 0, 0)$	$P_{23} = (1, 0, 6, 0)$

$P_{24} = (1, 0, 15, 0)$	$P_{69} = (1, 13, 12, 0)$	$P_{114} = (1, 8, 5, 0)$	$P_{159} = (1, 9, 2, 0)$
$P_{25} = (1, 0, 4, 0)$	$P_{70} = (1, 1, 8, 0)$	$P_{115} = (0, 1, 4, 0)$	$P_{160} = (1, 7, 9, 0)$
$P_{26} = (1, 0, 14, 0)$	$P_{71} = (1, 10, 6, 0)$	$P_{116} = (1, 6, 1, 0)$	$P_{161} = (1, 10, 7, 0)$
$P_{27} = (1, 0, 3, 0)$	$P_{72} = (1, 8, 15, 0)$	$P_{117} = (1, 3, 12, 0)$	$P_{162} = (1, 3, 5, 0)$
$P_{28} = (1, 0, 13, 0)$	$P_{73} = (1, 12, 4, 0)$	$P_{118} = (1, 2, 8, 0)$	$P_{163} = (0, 1, 13, 0)$
$P_{29} = (1, 0, 11, 0)$	$P_{74} = (1, 11, 14, 0)$	$P_{119} = (1, 13, 6, 0)$	$P_{164} = (1, 9, 1, 0)$
$P_{30} = (1, 0, 10, 0)$	$P_{75} = (1, 5, 3, 0)$	$P_{120} = (1, 9, 15, 0)$	$P_{165} = (1, 8, 12, 0)$
$P_{31} = (1, 0, 2, 0)$	$P_{76} = (1, 14, 13, 0)$	$P_{121} = (1, 1, 4, 0)$	$P_{166} = (1, 7, 8, 0)$
$P_{32} = (1, 0, 9, 0)$	$P_{77} = (1, 4, 11, 0)$	$P_{122} = (1, 15, 14, 0)$	$P_{167} = (1, 4, 6, 0)$
$P_{33} = (1, 0, 7, 0)$	$P_{78} = (1, 7, 10, 0)$	$P_{123} = (1, 10, 3, 0)$	$P_{168} = (1, 10, 15, 0)$
$P_{34} = (1, 0, 5, 0)$	$P_{79} = (1, 6, 2, 0)$	$P_{124} = (1, 5, 13, 0)$	$P_{169} = (1, 15, 4, 0)$
$P_{35} = (0, 1, 1, 0)$	$P_{80} = (1, 2, 9, 0)$	$P_{125} = (1, 8, 11, 0)$	$P_{170} = (1, 3, 14, 0)$
$P_{36} = (1, 1, 1, 0)$	$P_{81} = (1, 9, 7, 0)$	$P_{126} = (1, 14, 10, 0)$	$P_{171} = (1, 2, 3, 0)$
$P_{37} = (1, 12, 12, 0)$	$P_{82} = (1, 15, 5, 0)$	$P_{127} = (1, 12, 2, 0)$	$P_{172} = (1, 1, 13, 0)$
$P_{38} = (1, 8, 8, 0)$	$P_{83} = (0, 1, 6, 0)$	$P_{128} = (1, 4, 9, 0)$	$P_{173} = (1, 5, 11, 0)$
$P_{39} = (1, 6, 6, 0)$	$P_{84} = (1, 4, 1, 0)$	$P_{129} = (1, 11, 7, 0)$	$P_{174} = (1, 12, 10, 0)$
$P_{40} = (1, 15, 15, 0)$	$P_{85} = (1, 2, 12, 0)$	$P_{130} = (1, 7, 5, 0)$	$P_{175} = (1, 11, 2, 0)$
$P_{41} = (1, 4, 4, 0)$	$P_{86} = (1, 11, 8, 0)$	$P_{131} = (0, 1, 14, 0)$	$P_{176} = (1, 14, 9, 0)$
$P_{42} = (1, 14, 14, 0)$	$P_{87} = (1, 1, 6, 0)$	$P_{132} = (1, 7, 1, 0)$	$P_{177} = (1, 13, 7, 0)$
$P_{43} = (1, 3, 3, 0)$	$P_{88} = (1, 14, 15, 0)$	$P_{133} = (1, 15, 12, 0)$	$P_{178} = (1, 6, 5, 0)$
$P_{44} = (1, 13, 13, 0)$	$P_{89} = (1, 9, 4, 0)$	$P_{134} = (1, 10, 8, 0)$	$P_{179} = (0, 1, 11, 0)$
$P_{45} = (1, 11, 11, 0)$	$P_{90} = (1, 10, 14, 0)$	$P_{135} = (1, 11, 6, 0)$	$P_{180} = (1, 10, 1, 0)$
$P_{46} = (1, 10, 10, 0)$	$P_{91} = (1, 12, 3, 0)$	$P_{136} = (1, 6, 15, 0)$	$P_{181} = (1, 5, 12, 0)$
$P_{47} = (1, 2, 2, 0)$	$P_{92} = (1, 6, 13, 0)$	$P_{137} = (1, 5, 4, 0)$	$P_{182} = (1, 6, 8, 0)$
$P_{48} = (1, 9, 9, 0)$	$P_{93} = (1, 7, 11, 0)$	$P_{138} = (1, 1, 14, 0)$	$P_{183} = (1, 14, 6, 0)$
$P_{49} = (1, 7, 7, 0)$	$P_{94} = (1, 3, 10, 0)$	$P_{139} = (1, 9, 3, 0)$	$P_{184} = (1, 2, 15, 0)$
$P_{50} = (1, 5, 5, 0)$	$P_{95} = (1, 8, 2, 0)$	$P_{140} = (1, 8, 13, 0)$	$P_{185} = (1, 3, 4, 0)$
$P_{51} = (0, 1, 12, 0)$	$P_{96} = (1, 15, 9, 0)$	$P_{141} = (1, 3, 11, 0)$	$P_{186} = (1, 8, 14, 0)$
$P_{52} = (1, 2, 1, 0)$	$P_{97} = (1, 5, 7, 0)$	$P_{142} = (1, 4, 10, 0)$	$P_{187} = (1, 7, 3, 0)$
$P_{53} = (1, 1, 12, 0)$	$P_{98} = (1, 13, 5, 0)$	$P_{143} = (1, 14, 2, 0)$	$P_{188} = (1, 15, 13, 0)$
$P_{54} = (1, 9, 8, 0)$	$P_{99} = (0, 1, 15, 0)$	$P_{144} = (1, 13, 9, 0)$	$P_{189} = (1, 1, 11, 0)$
$P_{55} = (1, 12, 6, 0)$	$P_{100} = (1, 5, 1, 0)$	$P_{145} = (1, 12, 7, 0)$	$P_{190} = (1, 11, 10, 0)$
$P_{56} = (1, 7, 15, 0)$	$P_{101} = (1, 14, 12, 0)$	$P_{146} = (1, 2, 5, 0)$	$P_{191} = (1, 13, 2, 0)$
$P_{57} = (1, 8, 4, 0)$	$P_{102} = (1, 3, 8, 0)$	$P_{147} = (0, 1, 3, 0)$	$P_{192} = (1, 12, 9, 0)$
$P_{58} = (1, 5, 14, 0)$	$P_{103} = (1, 7, 6, 0)$	$P_{148} = (1, 8, 1, 0)$	$P_{193} = (1, 4, 7, 0)$
$P_{59} = (1, 6, 3, 0)$	$P_{104} = (1, 1, 15, 0)$	$P_{149} = (1, 4, 12, 0)$	$P_{194} = (1, 9, 5, 0)$
$P_{60} = (1, 3, 13, 0)$	$P_{105} = (1, 13, 4, 0)$	$P_{150} = (1, 15, 8, 0)$	$P_{195} = (0, 1, 10, 0)$
$P_{61} = (1, 15, 11, 0)$	$P_{106} = (1, 4, 14, 0)$	$P_{151} = (1, 2, 6, 0)$	$P_{196} = (1, 11, 1, 0)$
$P_{62} = (1, 13, 10, 0)$	$P_{107} = (1, 15, 3, 0)$	$P_{152} = (1, 5, 15, 0)$	$P_{197} = (1, 9, 12, 0)$
$P_{63} = (1, 4, 2, 0)$	$P_{108} = (1, 11, 13, 0)$	$P_{153} = (1, 11, 4, 0)$	$P_{198} = (1, 14, 8, 0)$
$P_{64} = (1, 11, 9, 0)$	$P_{109} = (1, 12, 11, 0)$	$P_{154} = (1, 13, 14, 0)$	$P_{199} = (1, 8, 6, 0)$
$P_{65} = (1, 14, 7, 0)$	$P_{110} = (1, 9, 10, 0)$	$P_{155} = (1, 1, 3, 0)$	$P_{200} = (1, 13, 15, 0)$
$P_{66} = (1, 10, 5, 0)$	$P_{111} = (1, 10, 2, 0)$	$P_{156} = (1, 12, 13, 0)$	$P_{201} = (1, 7, 4, 0)$
$P_{67} = (0, 1, 8, 0)$	$P_{112} = (1, 6, 9, 0)$	$P_{157} = (1, 14, 11, 0)$	$P_{202} = (1, 6, 14, 0)$
$P_{68} = (1, 3, 1, 0)$	$P_{113} = (1, 2, 7, 0)$	$P_{158} = (1, 6, 10, 0)$	$P_{203} = (1, 4, 3, 0)$

$P_{204} = (1, 2, 13, 0)$	$P_{249} = (1, 10, 4, 0)$	$P_{294} = (1, 6, 0, 6)$	$P_{339} = (1, 4, 0, 1)$
$P_{205} = (1, 10, 11, 0)$	$P_{250} = (1, 2, 14, 0)$	$P_{295} = (1, 15, 0, 15)$	$P_{340} = (1, 2, 0, 12)$
$P_{206} = (1, 1, 10, 0)$	$P_{251} = (1, 11, 3, 0)$	$P_{296} = (1, 4, 0, 4)$	$P_{341} = (1, 11, 0, 8)$
$P_{207} = (1, 15, 2, 0)$	$P_{252} = (1, 9, 13, 0)$	$P_{297} = (1, 14, 0, 14)$	$P_{342} = (1, 1, 0, 6)$
$P_{208} = (1, 5, 9, 0)$	$P_{253} = (1, 6, 11, 0)$	$P_{298} = (1, 3, 0, 3)$	$P_{343} = (1, 14, 0, 15)$
$P_{209} = (1, 3, 7, 0)$	$P_{254} = (1, 8, 10, 0)$	$P_{299} = (1, 13, 0, 13)$	$P_{344} = (1, 9, 0, 4)$
$P_{210} = (1, 12, 5, 0)$	$P_{255} = (1, 5, 2, 0)$	$P_{300} = (1, 11, 0, 11)$	$P_{345} = (1, 10, 0, 14)$
$P_{211} = (0, 1, 2, 0)$	$P_{256} = (1, 3, 9, 0)$	$P_{301} = (1, 10, 0, 10)$	$P_{346} = (1, 12, 0, 3)$
$P_{212} = (1, 12, 1, 0)$	$P_{257} = (1, 1, 7, 0)$	$P_{302} = (1, 2, 0, 2)$	$P_{347} = (1, 6, 0, 13)$
$P_{213} = (1, 6, 12, 0)$	$P_{258} = (1, 4, 5, 0)$	$P_{303} = (1, 9, 0, 9)$	$P_{348} = (1, 7, 0, 11)$
$P_{214} = (1, 4, 8, 0)$	$P_{259} = (0, 1, 5, 0)$	$P_{304} = (1, 7, 0, 7)$	$P_{349} = (1, 3, 0, 10)$
$P_{215} = (1, 3, 6, 0)$	$P_{260} = (1, 15, 1, 0)$	$P_{305} = (1, 5, 0, 5)$	$P_{350} = (1, 8, 0, 2)$
$P_{216} = (1, 11, 15, 0)$	$P_{261} = (1, 11, 12, 0)$	$P_{306} = (0, 1, 0, 12)$	$P_{351} = (1, 15, 0, 9)$
$P_{217} = (1, 2, 4, 0)$	$P_{262} = (1, 5, 8, 0)$	$P_{307} = (1, 2, 0, 1)$	$P_{352} = (1, 5, 0, 7)$
$P_{218} = (1, 7, 14, 0)$	$P_{263} = (1, 9, 6, 0)$	$P_{308} = (1, 1, 0, 12)$	$P_{353} = (1, 13, 0, 5)$
$P_{219} = (1, 13, 3, 0)$	$P_{264} = (1, 3, 15, 0)$	$P_{309} = (1, 9, 0, 8)$	$P_{354} = (0, 1, 0, 15)$
$P_{220} = (1, 10, 13, 0)$	$P_{265} = (1, 14, 4, 0)$	$P_{310} = (1, 12, 0, 6)$	$P_{355} = (1, 5, 0, 1)$
$P_{221} = (1, 9, 11, 0)$	$P_{266} = (1, 12, 14, 0)$	$P_{311} = (1, 7, 0, 15)$	$P_{356} = (1, 14, 0, 12)$
$P_{222} = (1, 5, 10, 0)$	$P_{267} = (1, 8, 3, 0)$	$P_{312} = (1, 8, 0, 4)$	$P_{357} = (1, 3, 0, 8)$
$P_{223} = (1, 1, 2, 0)$	$P_{268} = (1, 4, 13, 0)$	$P_{313} = (1, 5, 0, 14)$	$P_{358} = (1, 7, 0, 6)$
$P_{224} = (1, 8, 9, 0)$	$P_{269} = (1, 13, 11, 0)$	$P_{314} = (1, 6, 0, 3)$	$P_{359} = (1, 1, 0, 15)$
$P_{225} = (1, 15, 7, 0)$	$P_{270} = (1, 2, 10, 0)$	$P_{315} = (1, 3, 0, 13)$	$P_{360} = (1, 13, 0, 4)$
$P_{226} = (1, 14, 5, 0)$	$P_{271} = (1, 7, 2, 0)$	$P_{316} = (1, 15, 0, 11)$	$P_{361} = (1, 4, 0, 14)$
$P_{227} = (0, 1, 9, 0)$	$P_{272} = (1, 10, 9, 0)$	$P_{317} = (1, 13, 0, 10)$	$P_{362} = (1, 15, 0, 3)$
$P_{228} = (1, 13, 1, 0)$	$P_{273} = (1, 6, 7, 0)$	$P_{318} = (1, 4, 0, 2)$	$P_{363} = (1, 11, 0, 13)$
$P_{229} = (1, 10, 12, 0)$	$P_{274} = (1, 1, 5, 0)$	$P_{319} = (1, 11, 0, 9)$	$P_{364} = (1, 12, 0, 11)$
$P_{230} = (1, 12, 8, 0)$	$P_{275} = (1, 0, 0, 1)$	$P_{320} = (1, 14, 0, 7)$	$P_{365} = (1, 9, 0, 10)$
$P_{231} = (1, 5, 6, 0)$	$P_{276} = (1, 0, 0, 12)$	$P_{321} = (1, 10, 0, 5)$	$P_{366} = (1, 10, 0, 2)$
$P_{232} = (1, 4, 15, 0)$	$P_{277} = (1, 0, 0, 8)$	$P_{322} = (0, 1, 0, 8)$	$P_{367} = (1, 6, 0, 9)$
$P_{233} = (1, 6, 4, 0)$	$P_{278} = (1, 0, 0, 6)$	$P_{323} = (1, 3, 0, 1)$	$P_{368} = (1, 2, 0, 7)$
$P_{234} = (1, 9, 14, 0)$	$P_{279} = (1, 0, 0, 15)$	$P_{324} = (1, 13, 0, 12)$	$P_{369} = (1, 8, 0, 5)$
$P_{235} = (1, 14, 3, 0)$	$P_{280} = (1, 0, 0, 4)$	$P_{325} = (1, 1, 0, 8)$	$P_{370} = (0, 1, 0, 4)$
$P_{236} = (1, 7, 13, 0)$	$P_{281} = (1, 0, 0, 14)$	$P_{326} = (1, 10, 0, 6)$	$P_{371} = (1, 6, 0, 1)$
$P_{237} = (1, 2, 11, 0)$	$P_{282} = (1, 0, 0, 3)$	$P_{327} = (1, 8, 0, 15)$	$P_{372} = (1, 3, 0, 12)$
$P_{238} = (1, 15, 10, 0)$	$P_{283} = (1, 0, 0, 13)$	$P_{328} = (1, 12, 0, 4)$	$P_{373} = (1, 2, 0, 8)$
$P_{239} = (1, 3, 2, 0)$	$P_{284} = (1, 0, 0, 11)$	$P_{329} = (1, 11, 0, 14)$	$P_{374} = (1, 13, 0, 6)$
$P_{240} = (1, 1, 9, 0)$	$P_{285} = (1, 0, 0, 10)$	$P_{330} = (1, 5, 0, 3)$	$P_{375} = (1, 9, 0, 15)$
$P_{241} = (1, 8, 7, 0)$	$P_{286} = (1, 0, 0, 2)$	$P_{331} = (1, 14, 0, 13)$	$P_{376} = (1, 1, 0, 4)$
$P_{242} = (1, 11, 5, 0)$	$P_{287} = (1, 0, 0, 9)$	$P_{332} = (1, 4, 0, 11)$	$P_{377} = (1, 15, 0, 14)$
$P_{243} = (0, 1, 7, 0)$	$P_{288} = (1, 0, 0, 7)$	$P_{333} = (1, 7, 0, 10)$	$P_{378} = (1, 10, 0, 3)$
$P_{244} = (1, 14, 1, 0)$	$P_{289} = (1, 0, 0, 5)$	$P_{334} = (1, 6, 0, 2)$	$P_{379} = (1, 5, 0, 13)$
$P_{245} = (1, 7, 12, 0)$	$P_{290} = (0, 1, 0, 1)$	$P_{335} = (1, 2, 0, 9)$	$P_{380} = (1, 8, 0, 11)$
$P_{246} = (1, 13, 8, 0)$	$P_{291} = (1, 1, 0, 1)$	$P_{336} = (1, 9, 0, 7)$	$P_{381} = (1, 14, 0, 10)$
$P_{247} = (1, 15, 6, 0)$	$P_{292} = (1, 12, 0, 12)$	$P_{337} = (1, 15, 0, 5)$	$P_{382} = (1, 12, 0, 2)$
$P_{248} = (1, 12, 15, 0)$	$P_{293} = (1, 8, 0, 8)$	$P_{338} = (0, 1, 0, 6)$	$P_{383} = (1, 4, 0, 9)$

$P_{384} = (1, 11, 0, 7)$	$P_{429} = (1, 12, 0, 10)$	$P_{474} = (1, 13, 0, 3)$	$P_{519} = (1, 3, 0, 15)$
$P_{385} = (1, 7, 0, 5)$	$P_{430} = (1, 11, 0, 2)$	$P_{475} = (1, 10, 0, 13)$	$P_{520} = (1, 14, 0, 4)$
$P_{386} = (0, 1, 0, 14)$	$P_{431} = (1, 14, 0, 9)$	$P_{476} = (1, 9, 0, 11)$	$P_{521} = (1, 12, 0, 14)$
$P_{387} = (1, 7, 0, 1)$	$P_{432} = (1, 13, 0, 7)$	$P_{477} = (1, 5, 0, 10)$	$P_{522} = (1, 8, 0, 3)$
$P_{388} = (1, 15, 0, 12)$	$P_{433} = (1, 6, 0, 5)$	$P_{478} = (1, 1, 0, 2)$	$P_{523} = (1, 4, 0, 13)$
$P_{389} = (1, 10, 0, 8)$	$P_{434} = (0, 1, 0, 11)$	$P_{479} = (1, 8, 0, 9)$	$P_{524} = (1, 13, 0, 11)$
$P_{390} = (1, 11, 0, 6)$	$P_{435} = (1, 10, 0, 1)$	$P_{480} = (1, 15, 0, 7)$	$P_{525} = (1, 2, 0, 10)$
$P_{391} = (1, 6, 0, 15)$	$P_{436} = (1, 5, 0, 12)$	$P_{481} = (1, 14, 0, 5)$	$P_{526} = (1, 7, 0, 2)$
$P_{392} = (1, 5, 0, 4)$	$P_{437} = (1, 6, 0, 8)$	$P_{482} = (0, 1, 0, 9)$	$P_{527} = (1, 10, 0, 9)$
$P_{393} = (1, 1, 0, 14)$	$P_{438} = (1, 14, 0, 6)$	$P_{483} = (1, 13, 0, 1)$	$P_{528} = (1, 6, 0, 7)$
$P_{394} = (1, 9, 0, 3)$	$P_{439} = (1, 2, 0, 15)$	$P_{484} = (1, 10, 0, 12)$	$P_{529} = (1, 1, 0, 5)$
$P_{395} = (1, 8, 0, 13)$	$P_{440} = (1, 3, 0, 4)$	$P_{485} = (1, 12, 0, 8)$	$P_{530} = (0, 0, 1, 1)$
$P_{396} = (1, 3, 0, 11)$	$P_{441} = (1, 8, 0, 14)$	$P_{486} = (1, 5, 0, 6)$	$P_{531} = (1, 0, 1, 1)$
$P_{397} = (1, 4, 0, 10)$	$P_{442} = (1, 7, 0, 3)$	$P_{487} = (1, 4, 0, 15)$	$P_{532} = (1, 0, 12, 12)$
$P_{398} = (1, 14, 0, 2)$	$P_{443} = (1, 15, 0, 13)$	$P_{488} = (1, 6, 0, 4)$	$P_{533} = (1, 0, 8, 8)$
$P_{399} = (1, 13, 0, 9)$	$P_{444} = (1, 1, 0, 11)$	$P_{489} = (1, 9, 0, 14)$	$P_{534} = (1, 0, 6, 6)$
$P_{400} = (1, 12, 0, 7)$	$P_{445} = (1, 11, 0, 10)$	$P_{490} = (1, 14, 0, 3)$	$P_{535} = (1, 0, 15, 15)$
$P_{401} = (1, 2, 0, 5)$	$P_{446} = (1, 13, 0, 2)$	$P_{491} = (1, 7, 0, 13)$	$P_{536} = (1, 0, 4, 4)$
$P_{402} = (0, 1, 0, 3)$	$P_{447} = (1, 12, 0, 9)$	$P_{492} = (1, 2, 0, 11)$	$P_{537} = (1, 0, 14, 14)$
$P_{403} = (1, 8, 0, 1)$	$P_{448} = (1, 4, 0, 7)$	$P_{493} = (1, 15, 0, 10)$	$P_{538} = (1, 0, 3, 3)$
$P_{404} = (1, 4, 0, 12)$	$P_{449} = (1, 9, 0, 5)$	$P_{494} = (1, 3, 0, 2)$	$P_{539} = (1, 0, 13, 13)$
$P_{405} = (1, 15, 0, 8)$	$P_{450} = (0, 1, 0, 10)$	$P_{495} = (1, 1, 0, 9)$	$P_{540} = (1, 0, 11, 11)$
$P_{406} = (1, 2, 0, 6)$	$P_{451} = (1, 11, 0, 1)$	$P_{496} = (1, 8, 0, 7)$	$P_{541} = (1, 0, 10, 10)$
$P_{407} = (1, 5, 0, 15)$	$P_{452} = (1, 9, 0, 12)$	$P_{497} = (1, 11, 0, 5)$	$P_{542} = (1, 0, 2, 2)$
$P_{408} = (1, 11, 0, 4)$	$P_{453} = (1, 14, 0, 8)$	$P_{498} = (0, 1, 0, 7)$	$P_{543} = (1, 0, 9, 9)$
$P_{409} = (1, 13, 0, 14)$	$P_{454} = (1, 8, 0, 6)$	$P_{499} = (1, 14, 0, 1)$	$P_{544} = (1, 0, 7, 7)$
$P_{410} = (1, 1, 0, 3)$	$P_{455} = (1, 13, 0, 15)$	$P_{500} = (1, 7, 0, 12)$	$P_{545} = (1, 0, 5, 5)$
$P_{411} = (1, 12, 0, 13)$	$P_{456} = (1, 7, 0, 4)$	$P_{501} = (1, 13, 0, 8)$	$P_{546} = (0, 1, 1, 1)$
$P_{412} = (1, 14, 0, 11)$	$P_{457} = (1, 6, 0, 14)$	$P_{502} = (1, 15, 0, 6)$	$P_{547} = (1, 12, 12, 12)$
$P_{413} = (1, 6, 0, 10)$	$P_{458} = (1, 4, 0, 3)$	$P_{503} = (1, 12, 0, 15)$	$P_{548} = (1, 8, 8, 8)$
$P_{414} = (1, 9, 0, 2)$	$P_{459} = (1, 2, 0, 13)$	$P_{504} = (1, 10, 0, 4)$	$P_{549} = (1, 6, 6, 6)$
$P_{415} = (1, 7, 0, 9)$	$P_{460} = (1, 10, 0, 11)$	$P_{505} = (1, 2, 0, 14)$	$P_{550} = (1, 15, 15, 15)$
$P_{416} = (1, 10, 0, 7)$	$P_{461} = (1, 1, 0, 10)$	$P_{506} = (1, 11, 0, 3)$	$P_{551} = (1, 4, 4, 4)$
$P_{417} = (1, 3, 0, 5)$	$P_{462} = (1, 15, 0, 2)$	$P_{507} = (1, 9, 0, 13)$	$P_{552} = (1, 14, 14, 14)$
$P_{418} = (0, 1, 0, 13)$	$P_{463} = (1, 5, 0, 9)$	$P_{508} = (1, 6, 0, 11)$	$P_{553} = (1, 3, 3, 3)$
$P_{419} = (1, 9, 0, 1)$	$P_{464} = (1, 3, 0, 7)$	$P_{509} = (1, 8, 0, 10)$	$P_{554} = (1, 13, 13, 13)$
$P_{420} = (1, 8, 0, 12)$	$P_{465} = (1, 12, 0, 5)$	$P_{510} = (1, 5, 0, 2)$	$P_{555} = (1, 11, 11, 11)$
$P_{421} = (1, 7, 0, 8)$	$P_{466} = (0, 1, 0, 2)$	$P_{511} = (1, 3, 0, 9)$	$P_{556} = (1, 10, 10, 10)$
$P_{422} = (1, 4, 0, 6)$	$P_{467} = (1, 12, 0, 1)$	$P_{512} = (1, 1, 0, 7)$	$P_{557} = (1, 2, 2, 2)$
$P_{423} = (1, 10, 0, 15)$	$P_{468} = (1, 6, 0, 12)$	$P_{513} = (1, 4, 0, 5)$	$P_{558} = (1, 9, 9, 9)$
$P_{424} = (1, 15, 0, 4)$	$P_{469} = (1, 4, 0, 8)$	$P_{514} = (0, 1, 0, 5)$	$P_{559} = (1, 7, 7, 7)$
$P_{425} = (1, 3, 0, 14)$	$P_{470} = (1, 3, 0, 6)$	$P_{515} = (1, 15, 0, 1)$	$P_{560} = (1, 5, 5, 5)$
$P_{426} = (1, 2, 0, 3)$	$P_{471} = (1, 11, 0, 15)$	$P_{516} = (1, 11, 0, 12)$	$P_{561} = (0, 1, 12, 12)$
$P_{427} = (1, 1, 0, 13)$	$P_{472} = (1, 2, 0, 4)$	$P_{517} = (1, 5, 0, 8)$	$P_{562} = (1, 2, 1, 1)$
$P_{428} = (1, 5, 0, 11)$	$P_{473} = (1, 7, 0, 14)$	$P_{518} = (1, 9, 0, 6)$	$P_{563} = (1, 1, 12, 12)$

$P_{564} = (1, 9, 8, 8)$	$P_{609} = (0, 1, 15, 15)$	$P_{654} = (1, 13, 9, 9)$	$P_{699} = (1, 1, 11, 11)$
$P_{565} = (1, 12, 6, 6)$	$P_{610} = (1, 5, 1, 1)$	$P_{655} = (1, 12, 7, 7)$	$P_{700} = (1, 11, 10, 10)$
$P_{566} = (1, 7, 15, 15)$	$P_{611} = (1, 14, 12, 12)$	$P_{656} = (1, 2, 5, 5)$	$P_{701} = (1, 13, 2, 2)$
$P_{567} = (1, 8, 4, 4)$	$P_{612} = (1, 3, 8, 8)$	$P_{657} = (0, 1, 3, 3)$	$P_{702} = (1, 12, 9, 9)$
$P_{568} = (1, 5, 14, 14)$	$P_{613} = (1, 7, 6, 6)$	$P_{658} = (1, 8, 1, 1)$	$P_{703} = (1, 4, 7, 7)$
$P_{569} = (1, 6, 3, 3)$	$P_{614} = (1, 1, 15, 15)$	$P_{659} = (1, 4, 12, 12)$	$P_{704} = (1, 9, 5, 5)$
$P_{570} = (1, 3, 13, 13)$	$P_{615} = (1, 13, 4, 4)$	$P_{660} = (1, 15, 8, 8)$	$P_{705} = (0, 1, 10, 10)$
$P_{571} = (1, 15, 11, 11)$	$P_{616} = (1, 4, 14, 14)$	$P_{661} = (1, 2, 6, 6)$	$P_{706} = (1, 11, 1, 1)$
$P_{572} = (1, 13, 10, 10)$	$P_{617} = (1, 15, 3, 3)$	$P_{662} = (1, 5, 15, 15)$	$P_{707} = (1, 9, 12, 12)$
$P_{573} = (1, 4, 2, 2)$	$P_{618} = (1, 11, 13, 13)$	$P_{663} = (1, 11, 4, 4)$	$P_{708} = (1, 14, 8, 8)$
$P_{574} = (1, 11, 9, 9)$	$P_{619} = (1, 12, 11, 11)$	$P_{664} = (1, 13, 14, 14)$	$P_{709} = (1, 8, 6, 6)$
$P_{575} = (1, 14, 7, 7)$	$P_{620} = (1, 9, 10, 10)$	$P_{665} = (1, 1, 3, 3)$	$P_{710} = (1, 13, 15, 15)$
$P_{576} = (1, 10, 5, 5)$	$P_{621} = (1, 10, 2, 2)$	$P_{666} = (1, 12, 13, 13)$	$P_{711} = (1, 7, 4, 4)$
$P_{577} = (0, 1, 8, 8)$	$P_{622} = (1, 6, 9, 9)$	$P_{667} = (1, 14, 11, 11)$	$P_{712} = (1, 6, 14, 14)$
$P_{578} = (1, 3, 1, 1)$	$P_{623} = (1, 2, 7, 7)$	$P_{668} = (1, 6, 10, 10)$	$P_{713} = (1, 4, 3, 3)$
$P_{579} = (1, 13, 12, 12)$	$P_{624} = (1, 8, 5, 5)$	$P_{669} = (1, 9, 2, 2)$	$P_{714} = (1, 2, 13, 13)$
$P_{580} = (1, 1, 8, 8)$	$P_{625} = (0, 1, 4, 4)$	$P_{670} = (1, 7, 9, 9)$	$P_{715} = (1, 10, 11, 11)$
$P_{581} = (1, 10, 6, 6)$	$P_{626} = (1, 6, 1, 1)$	$P_{671} = (1, 10, 7, 7)$	$P_{716} = (1, 1, 10, 10)$
$P_{582} = (1, 8, 15, 15)$	$P_{627} = (1, 3, 12, 12)$	$P_{672} = (1, 3, 5, 5)$	$P_{717} = (1, 15, 2, 2)$
$P_{583} = (1, 12, 4, 4)$	$P_{628} = (1, 2, 8, 8)$	$P_{673} = (0, 1, 13, 13)$	$P_{718} = (1, 5, 9, 9)$
$P_{584} = (1, 11, 14, 14)$	$P_{629} = (1, 13, 6, 6)$	$P_{674} = (1, 9, 1, 1)$	$P_{719} = (1, 3, 7, 7)$
$P_{585} = (1, 5, 3, 3)$	$P_{630} = (1, 9, 15, 15)$	$P_{675} = (1, 8, 12, 12)$	$P_{720} = (1, 12, 5, 5)$
$P_{586} = (1, 14, 13, 13)$	$P_{631} = (1, 1, 4, 4)$	$P_{676} = (1, 7, 8, 8)$	$P_{721} = (0, 1, 2, 2)$
$P_{587} = (1, 4, 11, 11)$	$P_{632} = (1, 15, 14, 14)$	$P_{677} = (1, 4, 6, 6)$	$P_{722} = (1, 12, 1, 1)$
$P_{588} = (1, 7, 10, 10)$	$P_{633} = (1, 10, 3, 3)$	$P_{678} = (1, 10, 15, 15)$	$P_{723} = (1, 6, 12, 12)$
$P_{589} = (1, 6, 2, 2)$	$P_{634} = (1, 5, 13, 13)$	$P_{679} = (1, 15, 4, 4)$	$P_{724} = (1, 4, 8, 8)$
$P_{590} = (1, 2, 9, 9)$	$P_{635} = (1, 8, 11, 11)$	$P_{680} = (1, 3, 14, 14)$	$P_{725} = (1, 3, 6, 6)$
$P_{591} = (1, 9, 7, 7)$	$P_{636} = (1, 14, 10, 10)$	$P_{681} = (1, 2, 3, 3)$	$P_{726} = (1, 11, 15, 15)$
$P_{592} = (1, 15, 5, 5)$	$P_{637} = (1, 12, 2, 2)$	$P_{682} = (1, 1, 13, 13)$	$P_{727} = (1, 2, 4, 4)$
$P_{593} = (0, 1, 6, 6)$	$P_{638} = (1, 4, 9, 9)$	$P_{683} = (1, 5, 11, 11)$	$P_{728} = (1, 7, 14, 14)$
$P_{594} = (1, 4, 1, 1)$	$P_{639} = (1, 11, 7, 7)$	$P_{684} = (1, 12, 10, 10)$	$P_{729} = (1, 13, 3, 3)$
$P_{595} = (1, 2, 12, 12)$	$P_{640} = (1, 7, 5, 5)$	$P_{685} = (1, 11, 2, 2)$	$P_{730} = (1, 10, 13, 13)$
$P_{596} = (1, 11, 8, 8)$	$P_{641} = (0, 1, 14, 14)$	$P_{686} = (1, 14, 9, 9)$	$P_{731} = (1, 9, 11, 11)$
$P_{597} = (1, 1, 6, 6)$	$P_{642} = (1, 7, 1, 1)$	$P_{687} = (1, 13, 7, 7)$	$P_{732} = (1, 5, 10, 10)$
$P_{598} = (1, 14, 15, 15)$	$P_{643} = (1, 15, 12, 12)$	$P_{688} = (1, 6, 5, 5)$	$P_{733} = (1, 1, 2, 2)$
$P_{599} = (1, 9, 4, 4)$	$P_{644} = (1, 10, 8, 8)$	$P_{689} = (0, 1, 11, 11)$	$P_{734} = (1, 8, 9, 9)$
$P_{600} = (1, 10, 14, 14)$	$P_{645} = (1, 11, 6, 6)$	$P_{690} = (1, 10, 1, 1)$	$P_{735} = (1, 15, 7, 7)$
$P_{601} = (1, 12, 3, 3)$	$P_{646} = (1, 6, 15, 15)$	$P_{691} = (1, 5, 12, 12)$	$P_{736} = (1, 14, 5, 5)$
$P_{602} = (1, 6, 13, 13)$	$P_{647} = (1, 5, 4, 4)$	$P_{692} = (1, 6, 8, 8)$	$P_{737} = (0, 1, 9, 9)$
$P_{603} = (1, 7, 11, 11)$	$P_{648} = (1, 1, 14, 14)$	$P_{693} = (1, 14, 6, 6)$	$P_{738} = (1, 13, 1, 1)$
$P_{604} = (1, 3, 10, 10)$	$P_{649} = (1, 9, 3, 3)$	$P_{694} = (1, 2, 15, 15)$	$P_{739} = (1, 10, 12, 12)$
$P_{605} = (1, 8, 2, 2)$	$P_{650} = (1, 8, 13, 13)$	$P_{695} = (1, 3, 4, 4)$	$P_{740} = (1, 12, 8, 8)$
$P_{606} = (1, 15, 9, 9)$	$P_{651} = (1, 3, 11, 11)$	$P_{696} = (1, 8, 14, 14)$	$P_{741} = (1, 5, 6, 6)$
$P_{607} = (1, 5, 7, 7)$	$P_{652} = (1, 4, 10, 10)$	$P_{697} = (1, 7, 3, 3)$	$P_{742} = (1, 4, 15, 15)$
$P_{608} = (1, 13, 5, 5)$	$P_{653} = (1, 14, 2, 2)$	$P_{698} = (1, 15, 13, 13)$	$P_{743} = (1, 6, 4, 4)$

$P_{744} = (1, 9, 14, 14)$	$P_{789} = (1, 0, 12, 6)$	$P_{834} = (1, 3, 2, 1)$	$P_{879} = (1, 2, 14, 7)$
$P_{745} = (1, 14, 3, 3)$	$P_{790} = (1, 0, 7, 15)$	$P_{835} = (1, 13, 1, 12)$	$P_{880} = (1, 8, 10, 5)$
$P_{746} = (1, 7, 13, 13)$	$P_{791} = (1, 0, 8, 4)$	$P_{836} = (1, 1, 9, 8)$	$P_{881} = (0, 1, 8, 4)$
$P_{747} = (1, 2, 11, 11)$	$P_{792} = (1, 0, 5, 14)$	$P_{837} = (1, 10, 12, 6)$	$P_{882} = (1, 6, 2, 1)$
$P_{748} = (1, 15, 10, 10)$	$P_{793} = (1, 0, 6, 3)$	$P_{838} = (1, 8, 7, 15)$	$P_{883} = (1, 3, 1, 12)$
$P_{749} = (1, 3, 2, 2)$	$P_{794} = (1, 0, 3, 13)$	$P_{839} = (1, 12, 8, 4)$	$P_{884} = (1, 2, 9, 8)$
$P_{750} = (1, 1, 9, 9)$	$P_{795} = (1, 0, 15, 11)$	$P_{840} = (1, 11, 5, 14)$	$P_{885} = (1, 13, 12, 6)$
$P_{751} = (1, 8, 7, 7)$	$P_{796} = (1, 0, 13, 10)$	$P_{841} = (1, 5, 6, 3)$	$P_{886} = (1, 9, 7, 15)$
$P_{752} = (1, 11, 5, 5)$	$P_{797} = (1, 0, 4, 2)$	$P_{842} = (1, 14, 3, 13)$	$P_{887} = (1, 1, 8, 4)$
$P_{753} = (0, 1, 7, 7)$	$P_{798} = (1, 0, 11, 9)$	$P_{843} = (1, 4, 15, 11)$	$P_{888} = (1, 15, 5, 14)$
$P_{754} = (1, 14, 1, 1)$	$P_{799} = (1, 0, 14, 7)$	$P_{844} = (1, 7, 13, 10)$	$P_{889} = (1, 10, 6, 3)$
$P_{755} = (1, 7, 12, 12)$	$P_{800} = (1, 0, 10, 5)$	$P_{845} = (1, 6, 4, 2)$	$P_{890} = (1, 5, 3, 13)$
$P_{756} = (1, 13, 8, 8)$	$P_{801} = (0, 1, 2, 1)$	$P_{846} = (1, 2, 11, 9)$	$P_{891} = (1, 8, 15, 11)$
$P_{757} = (1, 15, 6, 6)$	$P_{802} = (1, 1, 2, 1)$	$P_{847} = (1, 9, 14, 7)$	$P_{892} = (1, 14, 13, 10)$
$P_{758} = (1, 12, 15, 15)$	$P_{803} = (1, 12, 1, 12)$	$P_{848} = (1, 15, 10, 5)$	$P_{893} = (1, 12, 4, 2)$
$P_{759} = (1, 10, 4, 4)$	$P_{804} = (1, 8, 9, 8)$	$P_{849} = (0, 1, 12, 6)$	$P_{894} = (1, 4, 11, 9)$
$P_{760} = (1, 2, 14, 14)$	$P_{805} = (1, 6, 12, 6)$	$P_{850} = (1, 4, 2, 1)$	$P_{895} = (1, 11, 14, 7)$
$P_{761} = (1, 11, 3, 3)$	$P_{806} = (1, 15, 7, 15)$	$P_{851} = (1, 2, 1, 12)$	$P_{896} = (1, 7, 10, 5)$
$P_{762} = (1, 9, 13, 13)$	$P_{807} = (1, 4, 8, 4)$	$P_{852} = (1, 11, 9, 8)$	$P_{897} = (0, 1, 5, 14)$
$P_{763} = (1, 6, 11, 11)$	$P_{808} = (1, 14, 5, 14)$	$P_{853} = (1, 1, 12, 6)$	$P_{898} = (1, 7, 2, 1)$
$P_{764} = (1, 8, 10, 10)$	$P_{809} = (1, 3, 6, 3)$	$P_{854} = (1, 14, 7, 15)$	$P_{899} = (1, 15, 1, 12)$
$P_{765} = (1, 5, 2, 2)$	$P_{810} = (1, 13, 3, 13)$	$P_{855} = (1, 9, 8, 4)$	$P_{900} = (1, 10, 9, 8)$
$P_{766} = (1, 3, 9, 9)$	$P_{811} = (1, 11, 15, 11)$	$P_{856} = (1, 10, 5, 14)$	$P_{901} = (1, 11, 12, 6)$
$P_{767} = (1, 1, 7, 7)$	$P_{812} = (1, 10, 13, 10)$	$P_{857} = (1, 12, 6, 3)$	$P_{902} = (1, 6, 7, 15)$
$P_{768} = (1, 4, 5, 5)$	$P_{813} = (1, 2, 4, 2)$	$P_{858} = (1, 6, 3, 13)$	$P_{903} = (1, 5, 8, 4)$
$P_{769} = (0, 1, 5, 5)$	$P_{814} = (1, 9, 11, 9)$	$P_{859} = (1, 7, 15, 11)$	$P_{904} = (1, 1, 5, 14)$
$P_{770} = (1, 15, 1, 1)$	$P_{815} = (1, 7, 14, 7)$	$P_{860} = (1, 3, 13, 10)$	$P_{905} = (1, 9, 6, 3)$
$P_{771} = (1, 11, 12, 12)$	$P_{816} = (1, 5, 10, 5)$	$P_{861} = (1, 8, 4, 2)$	$P_{906} = (1, 8, 3, 13)$
$P_{772} = (1, 5, 8, 8)$	$P_{817} = (0, 1, 1, 12)$	$P_{862} = (1, 15, 11, 9)$	$P_{907} = (1, 3, 15, 11)$
$P_{773} = (1, 9, 6, 6)$	$P_{818} = (1, 2, 2, 1)$	$P_{863} = (1, 5, 14, 7)$	$P_{908} = (1, 4, 13, 10)$
$P_{774} = (1, 3, 15, 15)$	$P_{819} = (1, 1, 1, 12)$	$P_{864} = (1, 13, 10, 5)$	$P_{909} = (1, 14, 4, 2)$
$P_{775} = (1, 14, 4, 4)$	$P_{820} = (1, 9, 9, 8)$	$P_{865} = (0, 1, 7, 15)$	$P_{910} = (1, 13, 11, 9)$
$P_{776} = (1, 12, 14, 14)$	$P_{821} = (1, 12, 12, 6)$	$P_{866} = (1, 5, 2, 1)$	$P_{911} = (1, 12, 14, 7)$
$P_{777} = (1, 8, 3, 3)$	$P_{822} = (1, 7, 7, 15)$	$P_{867} = (1, 14, 1, 12)$	$P_{912} = (1, 2, 10, 5)$
$P_{778} = (1, 4, 13, 13)$	$P_{823} = (1, 8, 8, 4)$	$P_{868} = (1, 3, 9, 8)$	$P_{913} = (0, 1, 6, 3)$
$P_{779} = (1, 13, 11, 11)$	$P_{824} = (1, 5, 5, 14)$	$P_{869} = (1, 7, 12, 6)$	$P_{914} = (1, 8, 2, 1)$
$P_{780} = (1, 2, 10, 10)$	$P_{825} = (1, 6, 6, 3)$	$P_{870} = (1, 1, 7, 15)$	$P_{915} = (1, 4, 1, 12)$
$P_{781} = (1, 7, 2, 2)$	$P_{826} = (1, 3, 3, 13)$	$P_{871} = (1, 13, 8, 4)$	$P_{916} = (1, 15, 9, 8)$
$P_{782} = (1, 10, 9, 9)$	$P_{827} = (1, 15, 15, 11)$	$P_{872} = (1, 4, 5, 14)$	$P_{917} = (1, 2, 12, 6)$
$P_{783} = (1, 6, 7, 7)$	$P_{828} = (1, 13, 13, 10)$	$P_{873} = (1, 15, 6, 3)$	$P_{918} = (1, 5, 7, 15)$
$P_{784} = (1, 1, 5, 5)$	$P_{829} = (1, 4, 4, 2)$	$P_{874} = (1, 11, 3, 13)$	$P_{919} = (1, 11, 8, 4)$
$P_{785} = (0, 0, 1, 12)$	$P_{830} = (1, 11, 11, 9)$	$P_{875} = (1, 12, 15, 11)$	$P_{920} = (1, 13, 5, 14)$
$P_{786} = (1, 0, 2, 1)$	$P_{831} = (1, 14, 14, 7)$	$P_{876} = (1, 9, 13, 10)$	$P_{921} = (1, 1, 6, 3)$
$P_{787} = (1, 0, 1, 12)$	$P_{832} = (1, 10, 10, 5)$	$P_{877} = (1, 10, 4, 2)$	$P_{922} = (1, 12, 3, 13)$
$P_{788} = (1, 0, 9, 8)$	$P_{833} = (0, 1, 9, 8)$	$P_{878} = (1, 6, 11, 9)$	$P_{923} = (1, 14, 15, 11)$

$P_{924} = (1, 6, 13, 10)$	$P_{969} = (1, 4, 6, 3)$	$P_{1014} = (1, 12, 7, 15)$	$P_{1059} = (1, 12, 13, 12)$
$P_{925} = (1, 9, 4, 2)$	$P_{970} = (1, 2, 3, 13)$	$P_{1015} = (1, 10, 8, 4)$	$P_{1060} = (1, 8, 1, 8)$
$P_{926} = (1, 7, 11, 9)$	$P_{971} = (1, 10, 15, 11)$	$P_{1016} = (1, 2, 5, 14)$	$P_{1061} = (1, 6, 10, 6)$
$P_{927} = (1, 10, 14, 7)$	$P_{972} = (1, 1, 13, 10)$	$P_{1017} = (1, 11, 6, 3)$	$P_{1062} = (1, 15, 8, 15)$
$P_{928} = (1, 3, 10, 5)$	$P_{973} = (1, 15, 4, 2)$	$P_{1018} = (1, 9, 3, 13)$	$P_{1063} = (1, 4, 12, 4)$
$P_{929} = (0, 1, 3, 13)$	$P_{974} = (1, 5, 11, 9)$	$P_{1019} = (1, 6, 15, 11)$	$P_{1064} = (1, 14, 11, 14)$
$P_{930} = (1, 9, 2, 1)$	$P_{975} = (1, 3, 14, 7)$	$P_{1020} = (1, 8, 13, 10)$	$P_{1065} = (1, 3, 5, 3)$
$P_{931} = (1, 8, 1, 12)$	$P_{976} = (1, 12, 10, 5)$	$P_{1021} = (1, 5, 4, 2)$	$P_{1066} = (1, 13, 14, 13)$
$P_{932} = (1, 7, 9, 8)$	$P_{977} = (0, 1, 4, 2)$	$P_{1022} = (1, 3, 11, 9)$	$P_{1067} = (1, 11, 4, 11)$
$P_{933} = (1, 4, 12, 6)$	$P_{978} = (1, 12, 2, 1)$	$P_{1023} = (1, 1, 14, 7)$	$P_{1068} = (1, 10, 7, 10)$
$P_{934} = (1, 10, 7, 15)$	$P_{979} = (1, 6, 1, 12)$	$P_{1024} = (1, 4, 10, 5)$	$P_{1069} = (1, 2, 6, 2)$
$P_{935} = (1, 15, 8, 4)$	$P_{980} = (1, 4, 9, 8)$	$P_{1025} = (0, 1, 10, 5)$	$P_{1070} = (1, 9, 2, 9)$
$P_{936} = (1, 3, 5, 14)$	$P_{981} = (1, 3, 12, 6)$	$P_{1026} = (1, 15, 2, 1)$	$P_{1071} = (1, 7, 9, 7)$
$P_{937} = (1, 2, 6, 3)$	$P_{982} = (1, 11, 7, 15)$	$P_{1027} = (1, 11, 1, 12)$	$P_{1072} = (1, 5, 15, 5)$
$P_{938} = (1, 1, 3, 13)$	$P_{983} = (1, 2, 8, 4)$	$P_{1028} = (1, 5, 9, 8)$	$P_{1073} = (0, 1, 13, 12)$
$P_{939} = (1, 5, 15, 11)$	$P_{984} = (1, 7, 5, 14)$	$P_{1029} = (1, 9, 12, 6)$	$P_{1074} = (1, 2, 3, 1)$
$P_{940} = (1, 12, 13, 10)$	$P_{985} = (1, 13, 6, 3)$	$P_{1030} = (1, 3, 7, 15)$	$P_{1075} = (1, 1, 13, 12)$
$P_{941} = (1, 11, 4, 2)$	$P_{986} = (1, 10, 3, 13)$	$P_{1031} = (1, 14, 8, 4)$	$P_{1076} = (1, 9, 1, 8)$
$P_{942} = (1, 14, 11, 9)$	$P_{987} = (1, 9, 15, 11)$	$P_{1032} = (1, 12, 5, 14)$	$P_{1077} = (1, 12, 10, 6)$
$P_{943} = (1, 13, 14, 7)$	$P_{988} = (1, 5, 13, 10)$	$P_{1033} = (1, 8, 6, 3)$	$P_{1078} = (1, 7, 8, 15)$
$P_{944} = (1, 6, 10, 5)$	$P_{989} = (1, 1, 4, 2)$	$P_{1034} = (1, 4, 3, 13)$	$P_{1079} = (1, 8, 12, 4)$
$P_{945} = (0, 1, 15, 11)$	$P_{990} = (1, 8, 11, 9)$	$P_{1035} = (1, 13, 15, 11)$	$P_{1080} = (1, 5, 11, 14)$
$P_{946} = (1, 10, 2, 1)$	$P_{991} = (1, 15, 14, 7)$	$P_{1036} = (1, 2, 13, 10)$	$P_{1081} = (1, 6, 5, 3)$
$P_{947} = (1, 5, 1, 12)$	$P_{992} = (1, 14, 10, 5)$	$P_{1037} = (1, 7, 4, 2)$	$P_{1082} = (1, 3, 14, 13)$
$P_{948} = (1, 6, 9, 8)$	$P_{993} = (0, 1, 11, 9)$	$P_{1038} = (1, 10, 11, 9)$	$P_{1083} = (1, 15, 4, 11)$
$P_{949} = (1, 14, 12, 6)$	$P_{994} = (1, 13, 2, 1)$	$P_{1039} = (1, 6, 14, 7)$	$P_{1084} = (1, 13, 7, 10)$
$P_{950} = (1, 2, 7, 15)$	$P_{995} = (1, 10, 1, 12)$	$P_{1040} = (1, 1, 10, 5)$	$P_{1085} = (1, 4, 6, 2)$
$P_{951} = (1, 3, 8, 4)$	$P_{996} = (1, 12, 9, 8)$	$P_{1041} = (0, 0, 1, 8)$	$P_{1086} = (1, 11, 2, 9)$
$P_{952} = (1, 8, 5, 14)$	$P_{997} = (1, 5, 12, 6)$	$P_{1042} = (1, 0, 3, 1)$	$P_{1087} = (1, 14, 9, 7)$
$P_{953} = (1, 7, 6, 3)$	$P_{998} = (1, 4, 7, 15)$	$P_{1043} = (1, 0, 13, 12)$	$P_{1088} = (1, 10, 15, 5)$
$P_{954} = (1, 15, 3, 13)$	$P_{999} = (1, 6, 8, 4)$	$P_{1044} = (1, 0, 1, 8)$	$P_{1089} = (0, 1, 1, 8)$
$P_{955} = (1, 1, 15, 11)$	$P_{1000} = (1, 9, 5, 14)$	$P_{1045} = (1, 0, 10, 6)$	$P_{1090} = (1, 3, 3, 1)$
$P_{956} = (1, 11, 13, 10)$	$P_{1001} = (1, 14, 6, 3)$	$P_{1046} = (1, 0, 8, 15)$	$P_{1091} = (1, 13, 13, 12)$
$P_{957} = (1, 13, 4, 2)$	$P_{1002} = (1, 7, 3, 13)$	$P_{1047} = (1, 0, 12, 4)$	$P_{1092} = (1, 1, 1, 8)$
$P_{958} = (1, 12, 11, 9)$	$P_{1003} = (1, 2, 15, 11)$	$P_{1048} = (1, 0, 11, 14)$	$P_{1093} = (1, 10, 10, 6)$
$P_{959} = (1, 4, 14, 7)$	$P_{1004} = (1, 15, 13, 10)$	$P_{1049} = (1, 0, 5, 3)$	$P_{1094} = (1, 8, 8, 15)$
$P_{960} = (1, 9, 10, 5)$	$P_{1005} = (1, 3, 4, 2)$	$P_{1050} = (1, 0, 14, 13)$	$P_{1095} = (1, 12, 12, 4)$
$P_{961} = (0, 1, 13, 10)$	$P_{1006} = (1, 1, 11, 9)$	$P_{1051} = (1, 0, 4, 11)$	$P_{1096} = (1, 11, 11, 14)$
$P_{962} = (1, 11, 2, 1)$	$P_{1007} = (1, 8, 14, 7)$	$P_{1052} = (1, 0, 7, 10)$	$P_{1097} = (1, 5, 5, 3)$
$P_{963} = (1, 9, 1, 12)$	$P_{1008} = (1, 11, 10, 5)$	$P_{1053} = (1, 0, 6, 2)$	$P_{1098} = (1, 14, 14, 13)$
$P_{964} = (1, 14, 9, 8)$	$P_{1009} = (0, 1, 14, 7)$	$P_{1054} = (1, 0, 2, 9)$	$P_{1099} = (1, 4, 4, 11)$
$P_{965} = (1, 8, 12, 6)$	$P_{1010} = (1, 14, 2, 1)$	$P_{1055} = (1, 0, 9, 7)$	$P_{1100} = (1, 7, 7, 10)$
$P_{966} = (1, 13, 7, 15)$	$P_{1011} = (1, 7, 1, 12)$	$P_{1056} = (1, 0, 15, 5)$	$P_{1101} = (1, 6, 6, 2)$
$P_{967} = (1, 7, 8, 4)$	$P_{1012} = (1, 13, 9, 8)$	$P_{1057} = (0, 1, 3, 1)$	$P_{1102} = (1, 2, 2, 9)$
$P_{968} = (1, 6, 5, 14)$	$P_{1013} = (1, 15, 12, 6)$	$P_{1058} = (1, 1, 3, 1)$	$P_{1103} = (1, 9, 9, 7)$

$P_{1104} = (1, 15, 15, 5)$	$P_{1149} = (1, 12, 6, 2)$	$P_{1194} = (1, 1, 14, 13)$	$P_{1239} = (1, 2, 12, 4)$
$P_{1105} = (0, 1, 10, 6)$	$P_{1150} = (1, 4, 2, 9)$	$P_{1195} = (1, 5, 4, 11)$	$P_{1240} = (1, 7, 11, 14)$
$P_{1106} = (1, 4, 3, 1)$	$P_{1151} = (1, 11, 9, 7)$	$P_{1196} = (1, 12, 7, 10)$	$P_{1241} = (1, 13, 5, 3)$
$P_{1107} = (1, 2, 13, 12)$	$P_{1152} = (1, 7, 15, 5)$	$P_{1197} = (1, 11, 6, 2)$	$P_{1242} = (1, 10, 14, 13)$
$P_{1108} = (1, 11, 1, 8)$	$P_{1153} = (0, 1, 11, 14)$	$P_{1198} = (1, 14, 2, 9)$	$P_{1243} = (1, 9, 4, 11)$
$P_{1109} = (1, 1, 10, 6)$	$P_{1154} = (1, 7, 3, 1)$	$P_{1199} = (1, 13, 9, 7)$	$P_{1244} = (1, 5, 7, 10)$
$P_{1110} = (1, 14, 8, 15)$	$P_{1155} = (1, 15, 13, 12)$	$P_{1200} = (1, 6, 15, 5)$	$P_{1245} = (1, 1, 6, 2)$
$P_{1111} = (1, 9, 12, 4)$	$P_{1156} = (1, 10, 1, 8)$	$P_{1201} = (0, 1, 4, 11)$	$P_{1246} = (1, 8, 2, 9)$
$P_{1112} = (1, 10, 11, 14)$	$P_{1157} = (1, 11, 10, 6)$	$P_{1202} = (1, 10, 3, 1)$	$P_{1247} = (1, 15, 9, 7)$
$P_{1113} = (1, 12, 5, 3)$	$P_{1158} = (1, 6, 8, 15)$	$P_{1203} = (1, 5, 13, 12)$	$P_{1248} = (1, 14, 15, 5)$
$P_{1114} = (1, 6, 14, 13)$	$P_{1159} = (1, 5, 12, 4)$	$P_{1204} = (1, 6, 1, 8)$	$P_{1249} = (0, 1, 2, 9)$
$P_{1115} = (1, 7, 4, 11)$	$P_{1160} = (1, 1, 11, 14)$	$P_{1205} = (1, 14, 10, 6)$	$P_{1250} = (1, 13, 3, 1)$
$P_{1116} = (1, 3, 7, 10)$	$P_{1161} = (1, 9, 5, 3)$	$P_{1206} = (1, 2, 8, 15)$	$P_{1251} = (1, 10, 13, 12)$
$P_{1117} = (1, 8, 6, 2)$	$P_{1162} = (1, 8, 14, 13)$	$P_{1207} = (1, 3, 12, 4)$	$P_{1252} = (1, 12, 1, 8)$
$P_{1118} = (1, 15, 2, 9)$	$P_{1163} = (1, 3, 4, 11)$	$P_{1208} = (1, 8, 11, 14)$	$P_{1253} = (1, 5, 10, 6)$
$P_{1119} = (1, 5, 9, 7)$	$P_{1164} = (1, 4, 7, 10)$	$P_{1209} = (1, 7, 5, 3)$	$P_{1254} = (1, 4, 8, 15)$
$P_{1120} = (1, 13, 15, 5)$	$P_{1165} = (1, 14, 6, 2)$	$P_{1210} = (1, 15, 14, 13)$	$P_{1255} = (1, 6, 12, 4)$
$P_{1121} = (0, 1, 8, 15)$	$P_{1166} = (1, 13, 2, 9)$	$P_{1211} = (1, 1, 4, 11)$	$P_{1256} = (1, 9, 11, 14)$
$P_{1122} = (1, 5, 3, 1)$	$P_{1167} = (1, 12, 9, 7)$	$P_{1212} = (1, 11, 7, 10)$	$P_{1257} = (1, 14, 5, 3)$
$P_{1123} = (1, 14, 13, 12)$	$P_{1168} = (1, 2, 15, 5)$	$P_{1213} = (1, 13, 6, 2)$	$P_{1258} = (1, 7, 14, 13)$
$P_{1124} = (1, 3, 1, 8)$	$P_{1169} = (0, 1, 5, 3)$	$P_{1214} = (1, 12, 2, 9)$	$P_{1259} = (1, 2, 4, 11)$
$P_{1125} = (1, 7, 10, 6)$	$P_{1170} = (1, 8, 3, 1)$	$P_{1215} = (1, 4, 9, 7)$	$P_{1260} = (1, 15, 7, 10)$
$P_{1126} = (1, 1, 8, 15)$	$P_{1171} = (1, 4, 13, 12)$	$P_{1216} = (1, 9, 15, 5)$	$P_{1261} = (1, 3, 6, 2)$
$P_{1127} = (1, 13, 12, 4)$	$P_{1172} = (1, 15, 1, 8)$	$P_{1217} = (0, 1, 7, 10)$	$P_{1262} = (1, 1, 2, 9)$
$P_{1128} = (1, 4, 11, 14)$	$P_{1173} = (1, 2, 10, 6)$	$P_{1218} = (1, 11, 3, 1)$	$P_{1263} = (1, 8, 9, 7)$
$P_{1129} = (1, 15, 5, 3)$	$P_{1174} = (1, 5, 8, 15)$	$P_{1219} = (1, 9, 13, 12)$	$P_{1264} = (1, 11, 15, 5)$
$P_{1130} = (1, 11, 14, 13)$	$P_{1175} = (1, 11, 12, 4)$	$P_{1220} = (1, 14, 1, 8)$	$P_{1265} = (0, 1, 9, 7)$
$P_{1131} = (1, 12, 4, 11)$	$P_{1176} = (1, 13, 11, 14)$	$P_{1221} = (1, 8, 10, 6)$	$P_{1266} = (1, 14, 3, 1)$
$P_{1132} = (1, 9, 7, 10)$	$P_{1177} = (1, 1, 5, 3)$	$P_{1222} = (1, 13, 8, 15)$	$P_{1267} = (1, 7, 13, 12)$
$P_{1133} = (1, 10, 6, 2)$	$P_{1178} = (1, 12, 14, 13)$	$P_{1223} = (1, 7, 12, 4)$	$P_{1268} = (1, 13, 1, 8)$
$P_{1134} = (1, 6, 2, 9)$	$P_{1179} = (1, 14, 4, 11)$	$P_{1224} = (1, 6, 11, 14)$	$P_{1269} = (1, 15, 10, 6)$
$P_{1135} = (1, 2, 9, 7)$	$P_{1180} = (1, 6, 7, 10)$	$P_{1225} = (1, 4, 5, 3)$	$P_{1270} = (1, 12, 8, 15)$
$P_{1136} = (1, 8, 15, 5)$	$P_{1181} = (1, 9, 6, 2)$	$P_{1226} = (1, 2, 14, 13)$	$P_{1271} = (1, 10, 12, 4)$
$P_{1137} = (0, 1, 12, 4)$	$P_{1182} = (1, 7, 2, 9)$	$P_{1227} = (1, 10, 4, 11)$	$P_{1272} = (1, 2, 11, 14)$
$P_{1138} = (1, 6, 3, 1)$	$P_{1183} = (1, 10, 9, 7)$	$P_{1228} = (1, 1, 7, 10)$	$P_{1273} = (1, 11, 5, 3)$
$P_{1139} = (1, 3, 13, 12)$	$P_{1184} = (1, 3, 15, 5)$	$P_{1229} = (1, 15, 6, 2)$	$P_{1274} = (1, 9, 14, 13)$
$P_{1140} = (1, 2, 1, 8)$	$P_{1185} = (0, 1, 14, 13)$	$P_{1230} = (1, 5, 2, 9)$	$P_{1275} = (1, 6, 4, 11)$
$P_{1141} = (1, 13, 10, 6)$	$P_{1186} = (1, 9, 3, 1)$	$P_{1231} = (1, 3, 9, 7)$	$P_{1276} = (1, 8, 7, 10)$
$P_{1142} = (1, 9, 8, 15)$	$P_{1187} = (1, 8, 13, 12)$	$P_{1232} = (1, 12, 15, 5)$	$P_{1277} = (1, 5, 6, 2)$
$P_{1143} = (1, 1, 12, 4)$	$P_{1188} = (1, 7, 1, 8)$	$P_{1233} = (0, 1, 6, 2)$	$P_{1278} = (1, 3, 2, 9)$
$P_{1144} = (1, 15, 11, 14)$	$P_{1189} = (1, 4, 10, 6)$	$P_{1234} = (1, 12, 3, 1)$	$P_{1279} = (1, 1, 9, 7)$
$P_{1145} = (1, 10, 5, 3)$	$P_{1190} = (1, 10, 8, 15)$	$P_{1235} = (1, 6, 13, 12)$	$P_{1280} = (1, 4, 15, 5)$
$P_{1146} = (1, 5, 14, 13)$	$P_{1191} = (1, 15, 12, 4)$	$P_{1236} = (1, 4, 1, 8)$	$P_{1281} = (0, 1, 15, 5)$
$P_{1147} = (1, 8, 4, 11)$	$P_{1192} = (1, 3, 11, 14)$	$P_{1237} = (1, 3, 10, 6)$	$P_{1282} = (1, 15, 3, 1)$
$P_{1148} = (1, 14, 7, 10)$	$P_{1193} = (1, 2, 5, 3)$	$P_{1238} = (1, 11, 8, 15)$	$P_{1283} = (1, 11, 13, 12)$

$P_{1284} = (1, 5, 1, 8)$	$P_{1329} = (0, 1, 2, 12)$	$P_{1374} = (1, 15, 15, 9)$	$P_{1419} = (1, 3, 7, 11)$
$P_{1285} = (1, 9, 10, 6)$	$P_{1330} = (1, 2, 4, 1)$	$P_{1375} = (1, 5, 5, 7)$	$P_{1420} = (1, 4, 3, 10)$
$P_{1286} = (1, 3, 8, 15)$	$P_{1331} = (1, 1, 2, 12)$	$P_{1376} = (1, 13, 13, 5)$	$P_{1421} = (1, 14, 8, 2)$
$P_{1287} = (1, 14, 12, 4)$	$P_{1332} = (1, 9, 11, 8)$	$P_{1377} = (0, 1, 14, 15)$	$P_{1422} = (1, 13, 15, 9)$
$P_{1288} = (1, 12, 11, 14)$	$P_{1333} = (1, 12, 1, 6)$	$P_{1378} = (1, 5, 4, 1)$	$P_{1423} = (1, 12, 5, 7)$
$P_{1289} = (1, 8, 5, 3)$	$P_{1334} = (1, 7, 14, 15)$	$P_{1379} = (1, 14, 2, 12)$	$P_{1424} = (1, 2, 13, 5)$
$P_{1290} = (1, 4, 14, 13)$	$P_{1335} = (1, 8, 9, 4)$	$P_{1380} = (1, 3, 11, 8)$	$P_{1425} = (0, 1, 12, 3)$
$P_{1291} = (1, 13, 4, 11)$	$P_{1336} = (1, 5, 10, 14)$	$P_{1381} = (1, 7, 1, 6)$	$P_{1426} = (1, 8, 4, 1)$
$P_{1292} = (1, 2, 7, 10)$	$P_{1337} = (1, 6, 12, 3)$	$P_{1382} = (1, 1, 14, 15)$	$P_{1427} = (1, 4, 2, 12)$
$P_{1293} = (1, 7, 6, 2)$	$P_{1338} = (1, 3, 6, 13)$	$P_{1383} = (1, 13, 9, 4)$	$P_{1428} = (1, 15, 11, 8)$
$P_{1294} = (1, 10, 2, 9)$	$P_{1339} = (1, 15, 7, 11)$	$P_{1384} = (1, 4, 10, 14)$	$P_{1429} = (1, 2, 1, 6)$
$P_{1295} = (1, 6, 9, 7)$	$P_{1340} = (1, 13, 3, 10)$	$P_{1385} = (1, 15, 12, 3)$	$P_{1430} = (1, 5, 14, 15)$
$P_{1296} = (1, 1, 15, 5)$	$P_{1341} = (1, 4, 8, 2)$	$P_{1386} = (1, 11, 6, 13)$	$P_{1431} = (1, 11, 9, 4)$
$P_{1297} = (0, 0, 1, 6)$	$P_{1342} = (1, 11, 15, 9)$	$P_{1387} = (1, 12, 7, 11)$	$P_{1432} = (1, 13, 10, 14)$
$P_{1298} = (1, 0, 4, 1)$	$P_{1343} = (1, 14, 5, 7)$	$P_{1388} = (1, 9, 3, 10)$	$P_{1433} = (1, 1, 12, 3)$
$P_{1299} = (1, 0, 2, 12)$	$P_{1344} = (1, 10, 13, 5)$	$P_{1389} = (1, 10, 8, 2)$	$P_{1434} = (1, 12, 6, 13)$
$P_{1300} = (1, 0, 11, 8)$	$P_{1345} = (0, 1, 11, 8)$	$P_{1390} = (1, 6, 15, 9)$	$P_{1435} = (1, 14, 7, 11)$
$P_{1301} = (1, 0, 1, 6)$	$P_{1346} = (1, 3, 4, 1)$	$P_{1391} = (1, 2, 5, 7)$	$P_{1436} = (1, 6, 3, 10)$
$P_{1302} = (1, 0, 14, 15)$	$P_{1347} = (1, 13, 2, 12)$	$P_{1392} = (1, 8, 13, 5)$	$P_{1437} = (1, 9, 8, 2)$
$P_{1303} = (1, 0, 9, 4)$	$P_{1348} = (1, 1, 11, 8)$	$P_{1393} = (0, 1, 9, 4)$	$P_{1438} = (1, 7, 15, 9)$
$P_{1304} = (1, 0, 10, 14)$	$P_{1349} = (1, 10, 1, 6)$	$P_{1394} = (1, 6, 4, 1)$	$P_{1439} = (1, 10, 5, 7)$
$P_{1305} = (1, 0, 12, 3)$	$P_{1350} = (1, 8, 14, 15)$	$P_{1395} = (1, 3, 2, 12)$	$P_{1440} = (1, 3, 13, 5)$
$P_{1306} = (1, 0, 6, 13)$	$P_{1351} = (1, 12, 9, 4)$	$P_{1396} = (1, 2, 11, 8)$	$P_{1441} = (0, 1, 6, 13)$
$P_{1307} = (1, 0, 7, 11)$	$P_{1352} = (1, 11, 10, 14)$	$P_{1397} = (1, 13, 1, 6)$	$P_{1442} = (1, 9, 4, 1)$
$P_{1308} = (1, 0, 3, 10)$	$P_{1353} = (1, 5, 12, 3)$	$P_{1398} = (1, 9, 14, 15)$	$P_{1443} = (1, 8, 2, 12)$
$P_{1309} = (1, 0, 8, 2)$	$P_{1354} = (1, 14, 6, 13)$	$P_{1399} = (1, 1, 9, 4)$	$P_{1444} = (1, 7, 11, 8)$
$P_{1310} = (1, 0, 15, 9)$	$P_{1355} = (1, 4, 7, 11)$	$P_{1400} = (1, 15, 10, 14)$	$P_{1445} = (1, 4, 1, 6)$
$P_{1311} = (1, 0, 5, 7)$	$P_{1356} = (1, 7, 3, 10)$	$P_{1401} = (1, 10, 12, 3)$	$P_{1446} = (1, 10, 14, 15)$
$P_{1312} = (1, 0, 13, 5)$	$P_{1357} = (1, 6, 8, 2)$	$P_{1402} = (1, 5, 6, 13)$	$P_{1447} = (1, 15, 9, 4)$
$P_{1313} = (0, 1, 4, 1)$	$P_{1358} = (1, 2, 15, 9)$	$P_{1403} = (1, 8, 7, 11)$	$P_{1448} = (1, 3, 10, 14)$
$P_{1314} = (1, 1, 4, 1)$	$P_{1359} = (1, 9, 5, 7)$	$P_{1404} = (1, 14, 3, 10)$	$P_{1449} = (1, 2, 12, 3)$
$P_{1315} = (1, 12, 2, 12)$	$P_{1360} = (1, 15, 13, 5)$	$P_{1405} = (1, 12, 8, 2)$	$P_{1450} = (1, 1, 6, 13)$
$P_{1316} = (1, 8, 11, 8)$	$P_{1361} = (0, 1, 1, 6)$	$P_{1406} = (1, 4, 15, 9)$	$P_{1451} = (1, 5, 7, 11)$
$P_{1317} = (1, 6, 1, 6)$	$P_{1362} = (1, 4, 4, 1)$	$P_{1407} = (1, 11, 5, 7)$	$P_{1452} = (1, 12, 3, 10)$
$P_{1318} = (1, 15, 14, 15)$	$P_{1363} = (1, 2, 2, 12)$	$P_{1408} = (1, 7, 13, 5)$	$P_{1453} = (1, 11, 8, 2)$
$P_{1319} = (1, 4, 9, 4)$	$P_{1364} = (1, 11, 11, 8)$	$P_{1409} = (0, 1, 10, 14)$	$P_{1454} = (1, 14, 15, 9)$
$P_{1320} = (1, 14, 10, 14)$	$P_{1365} = (1, 1, 1, 6)$	$P_{1410} = (1, 7, 4, 1)$	$P_{1455} = (1, 13, 5, 7)$
$P_{1321} = (1, 3, 12, 3)$	$P_{1366} = (1, 14, 14, 15)$	$P_{1411} = (1, 15, 2, 12)$	$P_{1456} = (1, 6, 13, 5)$
$P_{1322} = (1, 13, 6, 13)$	$P_{1367} = (1, 9, 9, 4)$	$P_{1412} = (1, 10, 11, 8)$	$P_{1457} = (0, 1, 7, 11)$
$P_{1323} = (1, 11, 7, 11)$	$P_{1368} = (1, 10, 10, 14)$	$P_{1413} = (1, 11, 1, 6)$	$P_{1458} = (1, 10, 4, 1)$
$P_{1324} = (1, 10, 3, 10)$	$P_{1369} = (1, 12, 12, 3)$	$P_{1414} = (1, 6, 14, 15)$	$P_{1459} = (1, 5, 2, 12)$
$P_{1325} = (1, 2, 8, 2)$	$P_{1370} = (1, 6, 6, 13)$	$P_{1415} = (1, 5, 9, 4)$	$P_{1460} = (1, 6, 11, 8)$
$P_{1326} = (1, 9, 15, 9)$	$P_{1371} = (1, 7, 7, 11)$	$P_{1416} = (1, 1, 10, 14)$	$P_{1461} = (1, 14, 1, 6)$
$P_{1327} = (1, 7, 5, 7)$	$P_{1372} = (1, 3, 3, 10)$	$P_{1417} = (1, 9, 12, 3)$	$P_{1462} = (1, 2, 14, 15)$
$P_{1328} = (1, 5, 13, 5)$	$P_{1373} = (1, 8, 8, 2)$	$P_{1418} = (1, 8, 6, 13)$	$P_{1463} = (1, 3, 9, 4)$

$P_{1464} = (1, 8, 10, 14)$	$P_{1509} = (1, 5, 1, 6)$	$P_{1554} = (1, 0, 5, 1)$	$P_{1599} = (1, 14, 2, 7)$
$P_{1465} = (1, 7, 12, 3)$	$P_{1510} = (1, 4, 14, 15)$	$P_{1555} = (1, 0, 14, 12)$	$P_{1600} = (1, 10, 8, 5)$
$P_{1466} = (1, 15, 6, 13)$	$P_{1511} = (1, 6, 9, 4)$	$P_{1556} = (1, 0, 3, 8)$	$P_{1601} = (0, 1, 3, 8)$
$P_{1467} = (1, 1, 7, 11)$	$P_{1512} = (1, 9, 10, 14)$	$P_{1557} = (1, 0, 7, 6)$	$P_{1602} = (1, 3, 5, 1)$
$P_{1468} = (1, 11, 3, 10)$	$P_{1513} = (1, 14, 12, 3)$	$P_{1558} = (1, 0, 1, 15)$	$P_{1603} = (1, 13, 14, 12)$
$P_{1469} = (1, 13, 8, 2)$	$P_{1514} = (1, 7, 6, 13)$	$P_{1559} = (1, 0, 13, 4)$	$P_{1604} = (1, 1, 3, 8)$
$P_{1470} = (1, 12, 15, 9)$	$P_{1515} = (1, 2, 7, 11)$	$P_{1560} = (1, 0, 4, 14)$	$P_{1605} = (1, 10, 7, 6)$
$P_{1471} = (1, 4, 5, 7)$	$P_{1516} = (1, 15, 3, 10)$	$P_{1561} = (1, 0, 15, 3)$	$P_{1606} = (1, 8, 1, 15)$
$P_{1472} = (1, 9, 13, 5)$	$P_{1517} = (1, 3, 8, 2)$	$P_{1562} = (1, 0, 11, 13)$	$P_{1607} = (1, 12, 13, 4)$
$P_{1473} = (0, 1, 3, 10)$	$P_{1518} = (1, 1, 15, 9)$	$P_{1563} = (1, 0, 12, 11)$	$P_{1608} = (1, 11, 4, 14)$
$P_{1474} = (1, 11, 4, 1)$	$P_{1519} = (1, 8, 5, 7)$	$P_{1564} = (1, 0, 9, 10)$	$P_{1609} = (1, 5, 15, 3)$
$P_{1475} = (1, 9, 2, 12)$	$P_{1520} = (1, 11, 13, 5)$	$P_{1565} = (1, 0, 10, 2)$	$P_{1610} = (1, 14, 11, 13)$
$P_{1476} = (1, 14, 11, 8)$	$P_{1521} = (0, 1, 5, 7)$	$P_{1566} = (1, 0, 6, 9)$	$P_{1611} = (1, 4, 12, 11)$
$P_{1477} = (1, 8, 1, 6)$	$P_{1522} = (1, 14, 4, 1)$	$P_{1567} = (1, 0, 2, 7)$	$P_{1612} = (1, 7, 9, 10)$
$P_{1478} = (1, 13, 14, 15)$	$P_{1523} = (1, 7, 2, 12)$	$P_{1568} = (1, 0, 8, 5)$	$P_{1613} = (1, 6, 10, 2)$
$P_{1479} = (1, 7, 9, 4)$	$P_{1524} = (1, 13, 11, 8)$	$P_{1569} = (0, 1, 5, 1)$	$P_{1614} = (1, 2, 6, 9)$
$P_{1480} = (1, 6, 10, 14)$	$P_{1525} = (1, 15, 1, 6)$	$P_{1570} = (1, 1, 5, 1)$	$P_{1615} = (1, 9, 2, 7)$
$P_{1481} = (1, 4, 12, 3)$	$P_{1526} = (1, 12, 14, 15)$	$P_{1571} = (1, 12, 14, 12)$	$P_{1616} = (1, 15, 8, 5)$
$P_{1482} = (1, 2, 6, 13)$	$P_{1527} = (1, 10, 9, 4)$	$P_{1572} = (1, 8, 3, 8)$	$P_{1617} = (0, 1, 7, 6)$
$P_{1483} = (1, 10, 7, 11)$	$P_{1528} = (1, 2, 10, 14)$	$P_{1573} = (1, 6, 7, 6)$	$P_{1618} = (1, 4, 5, 1)$
$P_{1484} = (1, 1, 3, 10)$	$P_{1529} = (1, 11, 12, 3)$	$P_{1574} = (1, 15, 1, 15)$	$P_{1619} = (1, 2, 14, 12)$
$P_{1485} = (1, 15, 8, 2)$	$P_{1530} = (1, 9, 6, 13)$	$P_{1575} = (1, 4, 13, 4)$	$P_{1620} = (1, 11, 3, 8)$
$P_{1486} = (1, 5, 15, 9)$	$P_{1531} = (1, 6, 7, 11)$	$P_{1576} = (1, 14, 4, 14)$	$P_{1621} = (1, 1, 7, 6)$
$P_{1487} = (1, 3, 5, 7)$	$P_{1532} = (1, 8, 3, 10)$	$P_{1577} = (1, 3, 15, 3)$	$P_{1622} = (1, 14, 1, 15)$
$P_{1488} = (1, 12, 13, 5)$	$P_{1533} = (1, 5, 8, 2)$	$P_{1578} = (1, 13, 11, 13)$	$P_{1623} = (1, 9, 13, 4)$
$P_{1489} = (0, 1, 8, 2)$	$P_{1534} = (1, 3, 15, 9)$	$P_{1579} = (1, 11, 12, 11)$	$P_{1624} = (1, 10, 4, 14)$
$P_{1490} = (1, 12, 4, 1)$	$P_{1535} = (1, 1, 5, 7)$	$P_{1580} = (1, 10, 9, 10)$	$P_{1625} = (1, 12, 15, 3)$
$P_{1491} = (1, 6, 2, 12)$	$P_{1536} = (1, 4, 13, 5)$	$P_{1581} = (1, 2, 10, 2)$	$P_{1626} = (1, 6, 11, 13)$
$P_{1492} = (1, 4, 11, 8)$	$P_{1537} = (0, 1, 13, 5)$	$P_{1582} = (1, 9, 6, 9)$	$P_{1627} = (1, 7, 12, 11)$
$P_{1493} = (1, 3, 1, 6)$	$P_{1538} = (1, 15, 4, 1)$	$P_{1583} = (1, 7, 2, 7)$	$P_{1628} = (1, 3, 9, 10)$
$P_{1494} = (1, 11, 14, 15)$	$P_{1539} = (1, 11, 2, 12)$	$P_{1584} = (1, 5, 8, 5)$	$P_{1629} = (1, 8, 10, 2)$
$P_{1495} = (1, 2, 9, 4)$	$P_{1540} = (1, 5, 11, 8)$	$P_{1585} = (0, 1, 14, 12)$	$P_{1630} = (1, 15, 6, 9)$
$P_{1496} = (1, 7, 10, 14)$	$P_{1541} = (1, 9, 1, 6)$	$P_{1586} = (1, 2, 5, 1)$	$P_{1631} = (1, 5, 2, 7)$
$P_{1497} = (1, 13, 12, 3)$	$P_{1542} = (1, 3, 14, 15)$	$P_{1587} = (1, 1, 14, 12)$	$P_{1632} = (1, 13, 8, 5)$
$P_{1498} = (1, 10, 6, 13)$	$P_{1543} = (1, 14, 9, 4)$	$P_{1588} = (1, 9, 3, 8)$	$P_{1633} = (0, 1, 1, 15)$
$P_{1499} = (1, 9, 7, 11)$	$P_{1544} = (1, 12, 10, 14)$	$P_{1589} = (1, 12, 7, 6)$	$P_{1634} = (1, 5, 5, 1)$
$P_{1500} = (1, 5, 3, 10)$	$P_{1545} = (1, 8, 12, 3)$	$P_{1590} = (1, 7, 1, 15)$	$P_{1635} = (1, 14, 14, 12)$
$P_{1501} = (1, 1, 8, 2)$	$P_{1546} = (1, 4, 6, 13)$	$P_{1591} = (1, 8, 13, 4)$	$P_{1636} = (1, 3, 3, 8)$
$P_{1502} = (1, 8, 15, 9)$	$P_{1547} = (1, 13, 7, 11)$	$P_{1592} = (1, 5, 4, 14)$	$P_{1637} = (1, 7, 7, 6)$
$P_{1503} = (1, 15, 5, 7)$	$P_{1548} = (1, 2, 3, 10)$	$P_{1593} = (1, 6, 15, 3)$	$P_{1638} = (1, 1, 1, 15)$
$P_{1504} = (1, 14, 13, 5)$	$P_{1549} = (1, 7, 8, 2)$	$P_{1594} = (1, 3, 11, 13)$	$P_{1639} = (1, 13, 13, 4)$
$P_{1505} = (0, 1, 15, 9)$	$P_{1550} = (1, 10, 15, 9)$	$P_{1595} = (1, 15, 12, 11)$	$P_{1640} = (1, 4, 4, 14)$
$P_{1506} = (1, 13, 4, 1)$	$P_{1551} = (1, 6, 5, 7)$	$P_{1596} = (1, 13, 9, 10)$	$P_{1641} = (1, 15, 15, 3)$
$P_{1507} = (1, 10, 2, 12)$	$P_{1552} = (1, 1, 13, 5)$	$P_{1597} = (1, 4, 10, 2)$	$P_{1642} = (1, 11, 11, 13)$
$P_{1508} = (1, 12, 11, 8)$	$P_{1553} = (0, 0, 1, 15)$	$P_{1598} = (1, 11, 6, 9)$	$P_{1643} = (1, 12, 12, 11)$

$P_{1644} = (1, 9, 9, 10)$	$P_{1689} = (1, 1, 15, 3)$	$P_{1734} = (1, 13, 1, 15)$	$P_{1779} = (1, 7, 14, 12)$
$P_{1645} = (1, 10, 10, 2)$	$P_{1690} = (1, 12, 11, 13)$	$P_{1735} = (1, 7, 13, 4)$	$P_{1780} = (1, 13, 3, 8)$
$P_{1646} = (1, 6, 6, 9)$	$P_{1691} = (1, 14, 12, 11)$	$P_{1736} = (1, 6, 4, 14)$	$P_{1781} = (1, 15, 7, 6)$
$P_{1647} = (1, 2, 2, 7)$	$P_{1692} = (1, 6, 9, 10)$	$P_{1737} = (1, 4, 15, 3)$	$P_{1782} = (1, 12, 1, 15)$
$P_{1648} = (1, 8, 8, 5)$	$P_{1693} = (1, 9, 10, 2)$	$P_{1738} = (1, 2, 11, 13)$	$P_{1783} = (1, 10, 13, 4)$
$P_{1649} = (0, 1, 13, 4)$	$P_{1694} = (1, 7, 6, 9)$	$P_{1739} = (1, 10, 12, 11)$	$P_{1784} = (1, 2, 4, 14)$
$P_{1650} = (1, 6, 5, 1)$	$P_{1695} = (1, 10, 2, 7)$	$P_{1740} = (1, 1, 9, 10)$	$P_{1785} = (1, 11, 15, 3)$
$P_{1651} = (1, 3, 14, 12)$	$P_{1696} = (1, 3, 8, 5)$	$P_{1741} = (1, 15, 10, 2)$	$P_{1786} = (1, 9, 11, 13)$
$P_{1652} = (1, 2, 3, 8)$	$P_{1697} = (0, 1, 11, 13)$	$P_{1742} = (1, 5, 6, 9)$	$P_{1787} = (1, 6, 12, 11)$
$P_{1653} = (1, 13, 7, 6)$	$P_{1698} = (1, 9, 5, 1)$	$P_{1743} = (1, 3, 2, 7)$	$P_{1788} = (1, 8, 9, 10)$
$P_{1654} = (1, 9, 1, 15)$	$P_{1699} = (1, 8, 14, 12)$	$P_{1744} = (1, 12, 8, 5)$	$P_{1789} = (1, 5, 10, 2)$
$P_{1655} = (1, 1, 13, 4)$	$P_{1700} = (1, 7, 3, 8)$	$P_{1745} = (0, 1, 10, 2)$	$P_{1790} = (1, 3, 6, 9)$
$P_{1656} = (1, 15, 4, 14)$	$P_{1701} = (1, 4, 7, 6)$	$P_{1746} = (1, 12, 5, 1)$	$P_{1791} = (1, 1, 2, 7)$
$P_{1657} = (1, 10, 15, 3)$	$P_{1702} = (1, 10, 1, 15)$	$P_{1747} = (1, 6, 14, 12)$	$P_{1792} = (1, 4, 8, 5)$
$P_{1658} = (1, 5, 11, 13)$	$P_{1703} = (1, 15, 13, 4)$	$P_{1748} = (1, 4, 3, 8)$	$P_{1793} = (0, 1, 8, 5)$
$P_{1659} = (1, 8, 12, 11)$	$P_{1704} = (1, 3, 4, 14)$	$P_{1749} = (1, 3, 7, 6)$	$P_{1794} = (1, 15, 5, 1)$
$P_{1660} = (1, 14, 9, 10)$	$P_{1705} = (1, 2, 15, 3)$	$P_{1750} = (1, 11, 1, 15)$	$P_{1795} = (1, 11, 14, 12)$
$P_{1661} = (1, 12, 10, 2)$	$P_{1706} = (1, 1, 11, 13)$	$P_{1751} = (1, 2, 13, 4)$	$P_{1796} = (1, 5, 3, 8)$
$P_{1662} = (1, 4, 6, 9)$	$P_{1707} = (1, 5, 12, 11)$	$P_{1752} = (1, 7, 4, 14)$	$P_{1797} = (1, 9, 7, 6)$
$P_{1663} = (1, 11, 2, 7)$	$P_{1708} = (1, 12, 9, 10)$	$P_{1753} = (1, 13, 15, 3)$	$P_{1798} = (1, 3, 1, 15)$
$P_{1664} = (1, 7, 8, 5)$	$P_{1709} = (1, 11, 10, 2)$	$P_{1754} = (1, 10, 11, 13)$	$P_{1799} = (1, 14, 13, 4)$
$P_{1665} = (0, 1, 4, 14)$	$P_{1710} = (1, 14, 6, 9)$	$P_{1755} = (1, 9, 12, 11)$	$P_{1800} = (1, 12, 4, 14)$
$P_{1666} = (1, 7, 5, 1)$	$P_{1711} = (1, 13, 2, 7)$	$P_{1756} = (1, 5, 9, 10)$	$P_{1801} = (1, 8, 15, 3)$
$P_{1667} = (1, 15, 14, 12)$	$P_{1712} = (1, 6, 8, 5)$	$P_{1757} = (1, 1, 10, 2)$	$P_{1802} = (1, 4, 11, 13)$
$P_{1668} = (1, 10, 3, 8)$	$P_{1713} = (0, 1, 12, 11)$	$P_{1758} = (1, 8, 6, 9)$	$P_{1803} = (1, 13, 12, 11)$
$P_{1669} = (1, 11, 7, 6)$	$P_{1714} = (1, 10, 5, 1)$	$P_{1759} = (1, 15, 2, 7)$	$P_{1804} = (1, 2, 9, 10)$
$P_{1670} = (1, 6, 1, 15)$	$P_{1715} = (1, 5, 14, 12)$	$P_{1760} = (1, 14, 8, 5)$	$P_{1805} = (1, 7, 10, 2)$
$P_{1671} = (1, 5, 13, 4)$	$P_{1716} = (1, 6, 3, 8)$	$P_{1761} = (0, 1, 6, 9)$	$P_{1806} = (1, 10, 6, 9)$
$P_{1672} = (1, 1, 4, 14)$	$P_{1717} = (1, 14, 7, 6)$	$P_{1762} = (1, 13, 5, 1)$	$P_{1807} = (1, 6, 2, 7)$
$P_{1673} = (1, 9, 15, 3)$	$P_{1718} = (1, 2, 1, 15)$	$P_{1763} = (1, 10, 14, 12)$	$P_{1808} = (1, 1, 8, 5)$
$P_{1674} = (1, 8, 11, 13)$	$P_{1719} = (1, 3, 13, 4)$	$P_{1764} = (1, 12, 3, 8)$	$P_{1809} = (0, 0, 1, 4)$
$P_{1675} = (1, 3, 12, 11)$	$P_{1720} = (1, 8, 4, 14)$	$P_{1765} = (1, 5, 7, 6)$	$P_{1810} = (1, 0, 6, 1)$
$P_{1676} = (1, 4, 9, 10)$	$P_{1721} = (1, 7, 15, 3)$	$P_{1766} = (1, 4, 1, 15)$	$P_{1811} = (1, 0, 3, 12)$
$P_{1677} = (1, 14, 10, 2)$	$P_{1722} = (1, 15, 11, 13)$	$P_{1767} = (1, 6, 13, 4)$	$P_{1812} = (1, 0, 2, 8)$
$P_{1678} = (1, 13, 6, 9)$	$P_{1723} = (1, 1, 12, 11)$	$P_{1768} = (1, 9, 4, 14)$	$P_{1813} = (1, 0, 13, 6)$
$P_{1679} = (1, 12, 2, 7)$	$P_{1724} = (1, 11, 9, 10)$	$P_{1769} = (1, 14, 15, 3)$	$P_{1814} = (1, 0, 9, 15)$
$P_{1680} = (1, 2, 8, 5)$	$P_{1725} = (1, 13, 10, 2)$	$P_{1770} = (1, 7, 11, 13)$	$P_{1815} = (1, 0, 1, 4)$
$P_{1681} = (0, 1, 15, 3)$	$P_{1726} = (1, 12, 6, 9)$	$P_{1771} = (1, 2, 12, 11)$	$P_{1816} = (1, 0, 15, 14)$
$P_{1682} = (1, 8, 5, 1)$	$P_{1727} = (1, 4, 2, 7)$	$P_{1772} = (1, 15, 9, 10)$	$P_{1817} = (1, 0, 10, 3)$
$P_{1683} = (1, 4, 14, 12)$	$P_{1728} = (1, 9, 8, 5)$	$P_{1773} = (1, 3, 10, 2)$	$P_{1818} = (1, 0, 5, 13)$
$P_{1684} = (1, 15, 3, 8)$	$P_{1729} = (0, 1, 9, 10)$	$P_{1774} = (1, 1, 6, 9)$	$P_{1819} = (1, 0, 8, 11)$
$P_{1685} = (1, 2, 7, 6)$	$P_{1730} = (1, 11, 5, 1)$	$P_{1775} = (1, 8, 2, 7)$	$P_{1820} = (1, 0, 14, 10)$
$P_{1686} = (1, 5, 1, 15)$	$P_{1731} = (1, 9, 14, 12)$	$P_{1776} = (1, 11, 8, 5)$	$P_{1821} = (1, 0, 12, 2)$
$P_{1687} = (1, 11, 13, 4)$	$P_{1732} = (1, 14, 3, 8)$	$P_{1777} = (0, 1, 2, 7)$	$P_{1822} = (1, 0, 4, 9)$
$P_{1688} = (1, 13, 4, 14)$	$P_{1733} = (1, 8, 7, 6)$	$P_{1778} = (1, 14, 5, 1)$	$P_{1823} = (1, 0, 11, 7)$

$P_{1824} = (1, 0, 7, 5)$	$P_{1869} = (1, 6, 12, 2)$	$P_{1914} = (1, 5, 5, 13)$	$P_{1959} = (1, 15, 1, 4)$
$P_{1825} = (0, 1, 6, 1)$	$P_{1870} = (1, 2, 4, 9)$	$P_{1915} = (1, 8, 8, 11)$	$P_{1960} = (1, 3, 15, 14)$
$P_{1826} = (1, 1, 6, 1)$	$P_{1871} = (1, 9, 11, 7)$	$P_{1916} = (1, 14, 14, 10)$	$P_{1961} = (1, 2, 10, 3)$
$P_{1827} = (1, 12, 3, 12)$	$P_{1872} = (1, 15, 7, 5)$	$P_{1917} = (1, 12, 12, 2)$	$P_{1962} = (1, 1, 5, 13)$
$P_{1828} = (1, 8, 2, 8)$	$P_{1873} = (0, 1, 13, 6)$	$P_{1918} = (1, 4, 4, 9)$	$P_{1963} = (1, 5, 8, 11)$
$P_{1829} = (1, 6, 13, 6)$	$P_{1874} = (1, 4, 6, 1)$	$P_{1919} = (1, 11, 11, 7)$	$P_{1964} = (1, 12, 14, 10)$
$P_{1830} = (1, 15, 9, 15)$	$P_{1875} = (1, 2, 3, 12)$	$P_{1920} = (1, 7, 7, 5)$	$P_{1965} = (1, 11, 12, 2)$
$P_{1831} = (1, 4, 1, 4)$	$P_{1876} = (1, 11, 2, 8)$	$P_{1921} = (0, 1, 15, 14)$	$P_{1966} = (1, 14, 4, 9)$
$P_{1832} = (1, 14, 15, 14)$	$P_{1877} = (1, 1, 13, 6)$	$P_{1922} = (1, 7, 6, 1)$	$P_{1967} = (1, 13, 11, 7)$
$P_{1833} = (1, 3, 10, 3)$	$P_{1878} = (1, 14, 9, 15)$	$P_{1923} = (1, 15, 3, 12)$	$P_{1968} = (1, 6, 7, 5)$
$P_{1834} = (1, 13, 5, 13)$	$P_{1879} = (1, 9, 1, 4)$	$P_{1924} = (1, 10, 2, 8)$	$P_{1969} = (0, 1, 8, 11)$
$P_{1835} = (1, 11, 8, 11)$	$P_{1880} = (1, 10, 15, 14)$	$P_{1925} = (1, 11, 13, 6)$	$P_{1970} = (1, 10, 6, 1)$
$P_{1836} = (1, 10, 14, 10)$	$P_{1881} = (1, 12, 10, 3)$	$P_{1926} = (1, 6, 9, 15)$	$P_{1971} = (1, 5, 3, 12)$
$P_{1837} = (1, 2, 12, 2)$	$P_{1882} = (1, 6, 5, 13)$	$P_{1927} = (1, 5, 1, 4)$	$P_{1972} = (1, 6, 2, 8)$
$P_{1838} = (1, 9, 4, 9)$	$P_{1883} = (1, 7, 8, 11)$	$P_{1928} = (1, 1, 15, 14)$	$P_{1973} = (1, 14, 13, 6)$
$P_{1839} = (1, 7, 11, 7)$	$P_{1884} = (1, 3, 14, 10)$	$P_{1929} = (1, 9, 10, 3)$	$P_{1974} = (1, 2, 9, 15)$
$P_{1840} = (1, 5, 7, 5)$	$P_{1885} = (1, 8, 12, 2)$	$P_{1930} = (1, 8, 5, 13)$	$P_{1975} = (1, 3, 1, 4)$
$P_{1841} = (0, 1, 3, 12)$	$P_{1886} = (1, 15, 4, 9)$	$P_{1931} = (1, 3, 8, 11)$	$P_{1976} = (1, 8, 15, 14)$
$P_{1842} = (1, 2, 6, 1)$	$P_{1887} = (1, 5, 11, 7)$	$P_{1932} = (1, 4, 14, 10)$	$P_{1977} = (1, 7, 10, 3)$
$P_{1843} = (1, 1, 3, 12)$	$P_{1888} = (1, 13, 7, 5)$	$P_{1933} = (1, 14, 12, 2)$	$P_{1978} = (1, 15, 5, 13)$
$P_{1844} = (1, 9, 2, 8)$	$P_{1889} = (0, 1, 9, 15)$	$P_{1934} = (1, 13, 4, 9)$	$P_{1979} = (1, 1, 8, 11)$
$P_{1845} = (1, 12, 13, 6)$	$P_{1890} = (1, 5, 6, 1)$	$P_{1935} = (1, 12, 11, 7)$	$P_{1980} = (1, 11, 14, 10)$
$P_{1846} = (1, 7, 9, 15)$	$P_{1891} = (1, 14, 3, 12)$	$P_{1936} = (1, 2, 7, 5)$	$P_{1981} = (1, 13, 12, 2)$
$P_{1847} = (1, 8, 1, 4)$	$P_{1892} = (1, 3, 2, 8)$	$P_{1937} = (0, 1, 10, 3)$	$P_{1982} = (1, 12, 4, 9)$
$P_{1848} = (1, 5, 15, 14)$	$P_{1893} = (1, 7, 13, 6)$	$P_{1938} = (1, 8, 6, 1)$	$P_{1983} = (1, 4, 11, 7)$
$P_{1849} = (1, 6, 10, 3)$	$P_{1894} = (1, 1, 9, 15)$	$P_{1939} = (1, 4, 3, 12)$	$P_{1984} = (1, 9, 7, 5)$
$P_{1850} = (1, 3, 5, 13)$	$P_{1895} = (1, 13, 1, 4)$	$P_{1940} = (1, 15, 2, 8)$	$P_{1985} = (0, 1, 14, 10)$
$P_{1851} = (1, 15, 8, 11)$	$P_{1896} = (1, 4, 15, 14)$	$P_{1941} = (1, 2, 13, 6)$	$P_{1986} = (1, 11, 6, 1)$
$P_{1852} = (1, 13, 14, 10)$	$P_{1897} = (1, 15, 10, 3)$	$P_{1942} = (1, 5, 9, 15)$	$P_{1987} = (1, 9, 3, 12)$
$P_{1853} = (1, 4, 12, 2)$	$P_{1898} = (1, 11, 5, 13)$	$P_{1943} = (1, 11, 1, 4)$	$P_{1988} = (1, 14, 2, 8)$
$P_{1854} = (1, 11, 4, 9)$	$P_{1899} = (1, 12, 8, 11)$	$P_{1944} = (1, 13, 15, 14)$	$P_{1989} = (1, 8, 13, 6)$
$P_{1855} = (1, 14, 11, 7)$	$P_{1900} = (1, 9, 14, 10)$	$P_{1945} = (1, 1, 10, 3)$	$P_{1990} = (1, 13, 9, 15)$
$P_{1856} = (1, 10, 7, 5)$	$P_{1901} = (1, 10, 12, 2)$	$P_{1946} = (1, 12, 5, 13)$	$P_{1991} = (1, 7, 1, 4)$
$P_{1857} = (0, 1, 2, 8)$	$P_{1902} = (1, 6, 4, 9)$	$P_{1947} = (1, 14, 8, 11)$	$P_{1992} = (1, 6, 15, 14)$
$P_{1858} = (1, 3, 6, 1)$	$P_{1903} = (1, 2, 11, 7)$	$P_{1948} = (1, 6, 14, 10)$	$P_{1993} = (1, 4, 10, 3)$
$P_{1859} = (1, 13, 3, 12)$	$P_{1904} = (1, 8, 7, 5)$	$P_{1949} = (1, 9, 12, 2)$	$P_{1994} = (1, 2, 5, 13)$
$P_{1860} = (1, 1, 2, 8)$	$P_{1905} = (0, 1, 1, 4)$	$P_{1950} = (1, 7, 4, 9)$	$P_{1995} = (1, 10, 8, 11)$
$P_{1861} = (1, 10, 13, 6)$	$P_{1906} = (1, 6, 6, 1)$	$P_{1951} = (1, 10, 11, 7)$	$P_{1996} = (1, 1, 14, 10)$
$P_{1862} = (1, 8, 9, 15)$	$P_{1907} = (1, 3, 3, 12)$	$P_{1952} = (1, 3, 7, 5)$	$P_{1997} = (1, 15, 12, 2)$
$P_{1863} = (1, 12, 1, 4)$	$P_{1908} = (1, 2, 2, 8)$	$P_{1953} = (0, 1, 5, 13)$	$P_{1998} = (1, 5, 4, 9)$
$P_{1864} = (1, 11, 15, 14)$	$P_{1909} = (1, 13, 13, 6)$	$P_{1954} = (1, 9, 6, 1)$	$P_{1999} = (1, 3, 11, 7)$
$P_{1865} = (1, 5, 10, 3)$	$P_{1910} = (1, 9, 9, 15)$	$P_{1955} = (1, 8, 3, 12)$	$P_{2000} = (1, 12, 7, 5)$
$P_{1866} = (1, 14, 5, 13)$	$P_{1911} = (1, 1, 1, 4)$	$P_{1956} = (1, 7, 2, 8)$	$P_{2001} = (0, 1, 12, 2)$
$P_{1867} = (1, 4, 8, 11)$	$P_{1912} = (1, 15, 15, 14)$	$P_{1957} = (1, 4, 13, 6)$	$P_{2002} = (1, 12, 6, 1)$
$P_{1868} = (1, 7, 14, 10)$	$P_{1913} = (1, 10, 10, 3)$	$P_{1958} = (1, 10, 9, 15)$	$P_{2003} = (1, 6, 3, 12)$

$P_{2004} = (1, 4, 2, 8)$	$P_{2049} = (0, 1, 7, 5)$	$P_{2094} = (1, 9, 13, 9)$	$P_{2139} = (1, 7, 3, 11)$
$P_{2005} = (1, 3, 13, 6)$	$P_{2050} = (1, 15, 6, 1)$	$P_{2095} = (1, 7, 12, 7)$	$P_{2140} = (1, 3, 4, 10)$
$P_{2006} = (1, 11, 9, 15)$	$P_{2051} = (1, 11, 3, 12)$	$P_{2096} = (1, 5, 2, 5)$	$P_{2141} = (1, 8, 14, 2)$
$P_{2007} = (1, 2, 1, 4)$	$P_{2052} = (1, 5, 2, 8)$	$P_{2097} = (0, 1, 15, 12)$	$P_{2142} = (1, 15, 13, 9)$
$P_{2008} = (1, 7, 15, 14)$	$P_{2053} = (1, 9, 13, 6)$	$P_{2098} = (1, 2, 7, 1)$	$P_{2143} = (1, 5, 12, 7)$
$P_{2009} = (1, 13, 10, 3)$	$P_{2054} = (1, 3, 9, 15)$	$P_{2099} = (1, 1, 15, 12)$	$P_{2144} = (1, 13, 2, 5)$
$P_{2010} = (1, 10, 5, 13)$	$P_{2055} = (1, 14, 1, 4)$	$P_{2100} = (1, 9, 10, 8)$	$P_{2145} = (0, 1, 6, 15)$
$P_{2011} = (1, 9, 8, 11)$	$P_{2056} = (1, 12, 15, 14)$	$P_{2101} = (1, 12, 11, 6)$	$P_{2146} = (1, 5, 7, 1)$
$P_{2012} = (1, 5, 14, 10)$	$P_{2057} = (1, 8, 10, 3)$	$P_{2102} = (1, 7, 6, 15)$	$P_{2147} = (1, 14, 15, 12)$
$P_{2013} = (1, 1, 12, 2)$	$P_{2058} = (1, 4, 5, 13)$	$P_{2103} = (1, 8, 5, 4)$	$P_{2148} = (1, 3, 10, 8)$
$P_{2014} = (1, 8, 4, 9)$	$P_{2059} = (1, 13, 8, 11)$	$P_{2104} = (1, 5, 1, 14)$	$P_{2149} = (1, 7, 11, 6)$
$P_{2015} = (1, 15, 11, 7)$	$P_{2060} = (1, 2, 14, 10)$	$P_{2105} = (1, 6, 9, 3)$	$P_{2150} = (1, 1, 6, 15)$
$P_{2016} = (1, 14, 7, 5)$	$P_{2061} = (1, 7, 12, 2)$	$P_{2106} = (1, 3, 8, 13)$	$P_{2151} = (1, 13, 5, 4)$
$P_{2017} = (0, 1, 4, 9)$	$P_{2062} = (1, 10, 4, 9)$	$P_{2107} = (1, 15, 3, 11)$	$P_{2152} = (1, 4, 1, 14)$
$P_{2018} = (1, 13, 6, 1)$	$P_{2063} = (1, 6, 11, 7)$	$P_{2108} = (1, 13, 4, 10)$	$P_{2153} = (1, 15, 9, 3)$
$P_{2019} = (1, 10, 3, 12)$	$P_{2064} = (1, 1, 7, 5)$	$P_{2109} = (1, 4, 14, 2)$	$P_{2154} = (1, 11, 8, 13)$
$P_{2020} = (1, 12, 2, 8)$	$P_{2065} = (0, 0, 1, 14)$	$P_{2110} = (1, 11, 13, 9)$	$P_{2155} = (1, 12, 3, 11)$
$P_{2021} = (1, 5, 13, 6)$	$P_{2066} = (1, 0, 7, 1)$	$P_{2111} = (1, 14, 12, 7)$	$P_{2156} = (1, 9, 4, 10)$
$P_{2022} = (1, 4, 9, 15)$	$P_{2067} = (1, 0, 15, 12)$	$P_{2112} = (1, 10, 2, 5)$	$P_{2157} = (1, 10, 14, 2)$
$P_{2023} = (1, 6, 1, 4)$	$P_{2068} = (1, 0, 10, 8)$	$P_{2113} = (0, 1, 10, 8)$	$P_{2158} = (1, 6, 13, 9)$
$P_{2024} = (1, 9, 15, 14)$	$P_{2069} = (1, 0, 11, 6)$	$P_{2114} = (1, 3, 7, 1)$	$P_{2159} = (1, 2, 12, 7)$
$P_{2025} = (1, 14, 10, 3)$	$P_{2070} = (1, 0, 6, 15)$	$P_{2115} = (1, 13, 15, 12)$	$P_{2160} = (1, 8, 2, 5)$
$P_{2026} = (1, 7, 5, 13)$	$P_{2071} = (1, 0, 5, 4)$	$P_{2116} = (1, 1, 10, 8)$	$P_{2161} = (0, 1, 5, 4)$
$P_{2027} = (1, 2, 8, 11)$	$P_{2072} = (1, 0, 1, 14)$	$P_{2117} = (1, 10, 11, 6)$	$P_{2162} = (1, 6, 7, 1)$
$P_{2028} = (1, 15, 14, 10)$	$P_{2073} = (1, 0, 9, 3)$	$P_{2118} = (1, 8, 6, 15)$	$P_{2163} = (1, 3, 15, 12)$
$P_{2029} = (1, 3, 12, 2)$	$P_{2074} = (1, 0, 8, 13)$	$P_{2119} = (1, 12, 5, 4)$	$P_{2164} = (1, 2, 10, 8)$
$P_{2030} = (1, 1, 4, 9)$	$P_{2075} = (1, 0, 3, 11)$	$P_{2120} = (1, 11, 1, 14)$	$P_{2165} = (1, 13, 11, 6)$
$P_{2031} = (1, 8, 11, 7)$	$P_{2076} = (1, 0, 4, 10)$	$P_{2121} = (1, 5, 9, 3)$	$P_{2166} = (1, 9, 6, 15)$
$P_{2032} = (1, 11, 7, 5)$	$P_{2077} = (1, 0, 14, 2)$	$P_{2122} = (1, 14, 8, 13)$	$P_{2167} = (1, 1, 5, 4)$
$P_{2033} = (0, 1, 11, 7)$	$P_{2078} = (1, 0, 13, 9)$	$P_{2123} = (1, 4, 3, 11)$	$P_{2168} = (1, 15, 1, 14)$
$P_{2034} = (1, 14, 6, 1)$	$P_{2079} = (1, 0, 12, 7)$	$P_{2124} = (1, 7, 4, 10)$	$P_{2169} = (1, 10, 9, 3)$
$P_{2035} = (1, 7, 3, 12)$	$P_{2080} = (1, 0, 2, 5)$	$P_{2125} = (1, 6, 14, 2)$	$P_{2170} = (1, 5, 8, 13)$
$P_{2036} = (1, 13, 2, 8)$	$P_{2081} = (0, 1, 7, 1)$	$P_{2126} = (1, 2, 13, 9)$	$P_{2171} = (1, 8, 3, 11)$
$P_{2037} = (1, 15, 13, 6)$	$P_{2082} = (1, 1, 7, 1)$	$P_{2127} = (1, 9, 12, 7)$	$P_{2172} = (1, 14, 4, 10)$
$P_{2038} = (1, 12, 9, 15)$	$P_{2083} = (1, 12, 15, 12)$	$P_{2128} = (1, 15, 2, 5)$	$P_{2173} = (1, 12, 14, 2)$
$P_{2039} = (1, 10, 1, 4)$	$P_{2084} = (1, 8, 10, 8)$	$P_{2129} = (0, 1, 11, 6)$	$P_{2174} = (1, 4, 13, 9)$
$P_{2040} = (1, 2, 15, 14)$	$P_{2085} = (1, 6, 11, 6)$	$P_{2130} = (1, 4, 7, 1)$	$P_{2175} = (1, 11, 12, 7)$
$P_{2041} = (1, 11, 10, 3)$	$P_{2086} = (1, 15, 6, 15)$	$P_{2131} = (1, 2, 15, 12)$	$P_{2176} = (1, 7, 2, 5)$
$P_{2042} = (1, 9, 5, 13)$	$P_{2087} = (1, 4, 5, 4)$	$P_{2132} = (1, 11, 10, 8)$	$P_{2177} = (0, 1, 1, 14)$
$P_{2043} = (1, 6, 8, 11)$	$P_{2088} = (1, 14, 1, 14)$	$P_{2133} = (1, 1, 11, 6)$	$P_{2178} = (1, 7, 7, 1)$
$P_{2044} = (1, 8, 14, 10)$	$P_{2089} = (1, 3, 9, 3)$	$P_{2134} = (1, 14, 6, 15)$	$P_{2179} = (1, 15, 15, 12)$
$P_{2045} = (1, 5, 12, 2)$	$P_{2090} = (1, 13, 8, 13)$	$P_{2135} = (1, 9, 5, 4)$	$P_{2180} = (1, 10, 10, 8)$
$P_{2046} = (1, 3, 4, 9)$	$P_{2091} = (1, 11, 3, 11)$	$P_{2136} = (1, 10, 1, 14)$	$P_{2181} = (1, 11, 11, 6)$
$P_{2047} = (1, 1, 11, 7)$	$P_{2092} = (1, 10, 4, 10)$	$P_{2137} = (1, 12, 9, 3)$	$P_{2182} = (1, 6, 6, 15)$
$P_{2048} = (1, 4, 7, 5)$	$P_{2093} = (1, 2, 14, 2)$	$P_{2138} = (1, 6, 8, 13)$	$P_{2183} = (1, 5, 5, 4)$

$P_{2184} = (1, 1, 1, 14)$	$P_{2229} = (1, 14, 11, 6)$	$P_{2274} = (1, 13, 7, 1)$	$P_{2319} = (1, 6, 12, 7)$
$P_{2185} = (1, 9, 9, 3)$	$P_{2230} = (1, 2, 6, 15)$	$P_{2275} = (1, 10, 15, 12)$	$P_{2320} = (1, 1, 2, 5)$
$P_{2186} = (1, 8, 8, 13)$	$P_{2231} = (1, 3, 5, 4)$	$P_{2276} = (1, 12, 10, 8)$	$P_{2321} = (0, 0, 1, 3)$
$P_{2187} = (1, 3, 3, 11)$	$P_{2232} = (1, 8, 1, 14)$	$P_{2277} = (1, 5, 11, 6)$	$P_{2322} = (1, 0, 8, 1)$
$P_{2188} = (1, 4, 4, 10)$	$P_{2233} = (1, 7, 9, 3)$	$P_{2278} = (1, 4, 6, 15)$	$P_{2323} = (1, 0, 4, 12)$
$P_{2189} = (1, 14, 14, 2)$	$P_{2234} = (1, 15, 8, 13)$	$P_{2279} = (1, 6, 5, 4)$	$P_{2324} = (1, 0, 15, 8)$
$P_{2190} = (1, 13, 13, 9)$	$P_{2235} = (1, 1, 3, 11)$	$P_{2280} = (1, 9, 1, 14)$	$P_{2325} = (1, 0, 2, 6)$
$P_{2191} = (1, 12, 12, 7)$	$P_{2236} = (1, 11, 4, 10)$	$P_{2281} = (1, 14, 9, 3)$	$P_{2326} = (1, 0, 5, 15)$
$P_{2192} = (1, 2, 2, 5)$	$P_{2237} = (1, 13, 14, 2)$	$P_{2282} = (1, 7, 8, 13)$	$P_{2327} = (1, 0, 11, 4)$
$P_{2193} = (0, 1, 9, 3)$	$P_{2238} = (1, 12, 13, 9)$	$P_{2283} = (1, 2, 3, 11)$	$P_{2328} = (1, 0, 13, 14)$
$P_{2194} = (1, 8, 7, 1)$	$P_{2239} = (1, 4, 12, 7)$	$P_{2284} = (1, 15, 4, 10)$	$P_{2329} = (1, 0, 1, 3)$
$P_{2195} = (1, 4, 15, 12)$	$P_{2240} = (1, 9, 2, 5)$	$P_{2285} = (1, 3, 14, 2)$	$P_{2330} = (1, 0, 12, 13)$
$P_{2196} = (1, 15, 10, 8)$	$P_{2241} = (0, 1, 4, 10)$	$P_{2286} = (1, 1, 13, 9)$	$P_{2331} = (1, 0, 14, 11)$
$P_{2197} = (1, 2, 11, 6)$	$P_{2242} = (1, 11, 7, 1)$	$P_{2287} = (1, 8, 12, 7)$	$P_{2332} = (1, 0, 6, 10)$
$P_{2198} = (1, 5, 6, 15)$	$P_{2243} = (1, 9, 15, 12)$	$P_{2288} = (1, 11, 2, 5)$	$P_{2333} = (1, 0, 9, 2)$
$P_{2199} = (1, 11, 5, 4)$	$P_{2244} = (1, 14, 10, 8)$	$P_{2289} = (0, 1, 12, 7)$	$P_{2334} = (1, 0, 7, 9)$
$P_{2200} = (1, 13, 1, 14)$	$P_{2245} = (1, 8, 11, 6)$	$P_{2290} = (1, 14, 7, 1)$	$P_{2335} = (1, 0, 10, 7)$
$P_{2201} = (1, 1, 9, 3)$	$P_{2246} = (1, 13, 6, 15)$	$P_{2291} = (1, 7, 15, 12)$	$P_{2336} = (1, 0, 3, 5)$
$P_{2202} = (1, 12, 8, 13)$	$P_{2247} = (1, 7, 5, 4)$	$P_{2292} = (1, 13, 10, 8)$	$P_{2337} = (0, 1, 8, 1)$
$P_{2203} = (1, 14, 3, 11)$	$P_{2248} = (1, 6, 1, 14)$	$P_{2293} = (1, 15, 11, 6)$	$P_{2338} = (1, 1, 8, 1)$
$P_{2204} = (1, 6, 4, 10)$	$P_{2249} = (1, 4, 9, 3)$	$P_{2294} = (1, 12, 6, 15)$	$P_{2339} = (1, 12, 4, 12)$
$P_{2205} = (1, 9, 14, 2)$	$P_{2250} = (1, 2, 8, 13)$	$P_{2295} = (1, 10, 5, 4)$	$P_{2340} = (1, 8, 15, 8)$
$P_{2206} = (1, 7, 13, 9)$	$P_{2251} = (1, 10, 3, 11)$	$P_{2296} = (1, 2, 1, 14)$	$P_{2341} = (1, 6, 2, 6)$
$P_{2207} = (1, 10, 12, 7)$	$P_{2252} = (1, 1, 4, 10)$	$P_{2297} = (1, 11, 9, 3)$	$P_{2342} = (1, 15, 5, 15)$
$P_{2208} = (1, 3, 2, 5)$	$P_{2253} = (1, 15, 14, 2)$	$P_{2298} = (1, 9, 8, 13)$	$P_{2343} = (1, 4, 11, 4)$
$P_{2209} = (0, 1, 8, 13)$	$P_{2254} = (1, 5, 13, 9)$	$P_{2299} = (1, 6, 3, 11)$	$P_{2344} = (1, 14, 13, 14)$
$P_{2210} = (1, 9, 7, 1)$	$P_{2255} = (1, 3, 12, 7)$	$P_{2300} = (1, 8, 4, 10)$	$P_{2345} = (1, 3, 1, 3)$
$P_{2211} = (1, 8, 15, 12)$	$P_{2256} = (1, 12, 2, 5)$	$P_{2301} = (1, 5, 14, 2)$	$P_{2346} = (1, 13, 12, 13)$
$P_{2212} = (1, 7, 10, 8)$	$P_{2257} = (0, 1, 14, 2)$	$P_{2302} = (1, 3, 13, 9)$	$P_{2347} = (1, 11, 14, 11)$
$P_{2213} = (1, 4, 11, 6)$	$P_{2258} = (1, 12, 7, 1)$	$P_{2303} = (1, 1, 12, 7)$	$P_{2348} = (1, 10, 6, 10)$
$P_{2214} = (1, 10, 6, 15)$	$P_{2259} = (1, 6, 15, 12)$	$P_{2304} = (1, 4, 2, 5)$	$P_{2349} = (1, 2, 9, 2)$
$P_{2215} = (1, 15, 5, 4)$	$P_{2260} = (1, 4, 10, 8)$	$P_{2305} = (0, 1, 2, 5)$	$P_{2350} = (1, 9, 7, 9)$
$P_{2216} = (1, 3, 1, 14)$	$P_{2261} = (1, 3, 11, 6)$	$P_{2306} = (1, 15, 7, 1)$	$P_{2351} = (1, 7, 10, 7)$
$P_{2217} = (1, 2, 9, 3)$	$P_{2262} = (1, 11, 6, 15)$	$P_{2307} = (1, 11, 15, 12)$	$P_{2352} = (1, 5, 3, 5)$
$P_{2218} = (1, 1, 8, 13)$	$P_{2263} = (1, 2, 5, 4)$	$P_{2308} = (1, 5, 10, 8)$	$P_{2353} = (0, 1, 4, 12)$
$P_{2219} = (1, 5, 3, 11)$	$P_{2264} = (1, 7, 1, 14)$	$P_{2309} = (1, 9, 11, 6)$	$P_{2354} = (1, 2, 8, 1)$
$P_{2220} = (1, 12, 4, 10)$	$P_{2265} = (1, 13, 9, 3)$	$P_{2310} = (1, 3, 6, 15)$	$P_{2355} = (1, 1, 4, 12)$
$P_{2221} = (1, 11, 14, 2)$	$P_{2266} = (1, 10, 8, 13)$	$P_{2311} = (1, 14, 5, 4)$	$P_{2356} = (1, 9, 15, 8)$
$P_{2222} = (1, 14, 13, 9)$	$P_{2267} = (1, 9, 3, 11)$	$P_{2312} = (1, 12, 1, 14)$	$P_{2357} = (1, 12, 2, 6)$
$P_{2223} = (1, 13, 12, 7)$	$P_{2268} = (1, 5, 4, 10)$	$P_{2313} = (1, 8, 9, 3)$	$P_{2358} = (1, 7, 5, 15)$
$P_{2224} = (1, 6, 2, 5)$	$P_{2269} = (1, 1, 14, 2)$	$P_{2314} = (1, 4, 8, 13)$	$P_{2359} = (1, 8, 11, 4)$
$P_{2225} = (0, 1, 3, 11)$	$P_{2270} = (1, 8, 13, 9)$	$P_{2315} = (1, 13, 3, 11)$	$P_{2360} = (1, 5, 13, 14)$
$P_{2226} = (1, 10, 7, 1)$	$P_{2271} = (1, 15, 12, 7)$	$P_{2316} = (1, 2, 4, 10)$	$P_{2361} = (1, 6, 1, 3)$
$P_{2227} = (1, 5, 15, 12)$	$P_{2272} = (1, 14, 2, 5)$	$P_{2317} = (1, 7, 14, 2)$	$P_{2362} = (1, 3, 12, 13)$
$P_{2228} = (1, 6, 10, 8)$	$P_{2273} = (0, 1, 13, 9)$	$P_{2318} = (1, 10, 13, 9)$	$P_{2363} = (1, 15, 14, 11)$

$P_{2364} = (1, 13, 6, 10)$	$P_{2409} = (1, 15, 1, 3)$	$P_{2454} = (1, 5, 5, 15)$	$P_{2499} = (1, 9, 4, 12)$
$P_{2365} = (1, 4, 9, 2)$	$P_{2410} = (1, 11, 12, 13)$	$P_{2455} = (1, 11, 11, 4)$	$P_{2500} = (1, 14, 15, 8)$
$P_{2366} = (1, 11, 7, 9)$	$P_{2411} = (1, 12, 14, 11)$	$P_{2456} = (1, 13, 13, 14)$	$P_{2501} = (1, 8, 2, 6)$
$P_{2367} = (1, 14, 10, 7)$	$P_{2412} = (1, 9, 6, 10)$	$P_{2457} = (1, 1, 1, 3)$	$P_{2502} = (1, 13, 5, 15)$
$P_{2368} = (1, 10, 3, 5)$	$P_{2413} = (1, 10, 9, 2)$	$P_{2458} = (1, 12, 12, 13)$	$P_{2503} = (1, 7, 11, 4)$
$P_{2369} = (0, 1, 15, 8)$	$P_{2414} = (1, 6, 7, 9)$	$P_{2459} = (1, 14, 14, 11)$	$P_{2504} = (1, 6, 13, 14)$
$P_{2370} = (1, 3, 8, 1)$	$P_{2415} = (1, 2, 10, 7)$	$P_{2460} = (1, 6, 6, 10)$	$P_{2505} = (1, 4, 1, 3)$
$P_{2371} = (1, 13, 4, 12)$	$P_{2416} = (1, 8, 3, 5)$	$P_{2461} = (1, 9, 9, 2)$	$P_{2506} = (1, 2, 12, 13)$
$P_{2372} = (1, 1, 15, 8)$	$P_{2417} = (0, 1, 11, 4)$	$P_{2462} = (1, 7, 7, 9)$	$P_{2507} = (1, 10, 14, 11)$
$P_{2373} = (1, 10, 2, 6)$	$P_{2418} = (1, 6, 8, 1)$	$P_{2463} = (1, 10, 10, 7)$	$P_{2508} = (1, 1, 6, 10)$
$P_{2374} = (1, 8, 5, 15)$	$P_{2419} = (1, 3, 4, 12)$	$P_{2464} = (1, 3, 3, 5)$	$P_{2509} = (1, 15, 9, 2)$
$P_{2375} = (1, 12, 11, 4)$	$P_{2420} = (1, 2, 15, 8)$	$P_{2465} = (0, 1, 12, 13)$	$P_{2510} = (1, 5, 7, 9)$
$P_{2376} = (1, 11, 13, 14)$	$P_{2421} = (1, 13, 2, 6)$	$P_{2466} = (1, 9, 8, 1)$	$P_{2511} = (1, 3, 10, 7)$
$P_{2377} = (1, 5, 1, 3)$	$P_{2422} = (1, 9, 5, 15)$	$P_{2467} = (1, 8, 4, 12)$	$P_{2512} = (1, 12, 3, 5)$
$P_{2378} = (1, 14, 12, 13)$	$P_{2423} = (1, 1, 11, 4)$	$P_{2468} = (1, 7, 15, 8)$	$P_{2513} = (0, 1, 9, 2)$
$P_{2379} = (1, 4, 14, 11)$	$P_{2424} = (1, 15, 13, 14)$	$P_{2469} = (1, 4, 2, 6)$	$P_{2514} = (1, 12, 8, 1)$
$P_{2380} = (1, 7, 6, 10)$	$P_{2425} = (1, 10, 1, 3)$	$P_{2470} = (1, 10, 5, 15)$	$P_{2515} = (1, 6, 4, 12)$
$P_{2381} = (1, 6, 9, 2)$	$P_{2426} = (1, 5, 12, 13)$	$P_{2471} = (1, 15, 11, 4)$	$P_{2516} = (1, 4, 15, 8)$
$P_{2382} = (1, 2, 7, 9)$	$P_{2427} = (1, 8, 14, 11)$	$P_{2472} = (1, 3, 13, 14)$	$P_{2517} = (1, 3, 2, 6)$
$P_{2383} = (1, 9, 10, 7)$	$P_{2428} = (1, 14, 6, 10)$	$P_{2473} = (1, 2, 1, 3)$	$P_{2518} = (1, 11, 5, 15)$
$P_{2384} = (1, 15, 3, 5)$	$P_{2429} = (1, 12, 9, 2)$	$P_{2474} = (1, 1, 12, 13)$	$P_{2519} = (1, 2, 11, 4)$
$P_{2385} = (0, 1, 2, 6)$	$P_{2430} = (1, 4, 7, 9)$	$P_{2475} = (1, 5, 14, 11)$	$P_{2520} = (1, 7, 13, 14)$
$P_{2386} = (1, 4, 8, 1)$	$P_{2431} = (1, 11, 10, 7)$	$P_{2476} = (1, 12, 6, 10)$	$P_{2521} = (1, 13, 1, 3)$
$P_{2387} = (1, 2, 4, 12)$	$P_{2432} = (1, 7, 3, 5)$	$P_{2477} = (1, 11, 9, 2)$	$P_{2522} = (1, 10, 12, 13)$
$P_{2388} = (1, 11, 15, 8)$	$P_{2433} = (0, 1, 13, 14)$	$P_{2478} = (1, 14, 7, 9)$	$P_{2523} = (1, 9, 14, 11)$
$P_{2389} = (1, 1, 2, 6)$	$P_{2434} = (1, 7, 8, 1)$	$P_{2479} = (1, 13, 10, 7)$	$P_{2524} = (1, 5, 6, 10)$
$P_{2390} = (1, 14, 5, 15)$	$P_{2435} = (1, 15, 4, 12)$	$P_{2480} = (1, 6, 3, 5)$	$P_{2525} = (1, 1, 9, 2)$
$P_{2391} = (1, 9, 11, 4)$	$P_{2436} = (1, 10, 15, 8)$	$P_{2481} = (0, 1, 14, 11)$	$P_{2526} = (1, 8, 7, 9)$
$P_{2392} = (1, 10, 13, 14)$	$P_{2437} = (1, 11, 2, 6)$	$P_{2482} = (1, 10, 8, 1)$	$P_{2527} = (1, 15, 10, 7)$
$P_{2393} = (1, 12, 1, 3)$	$P_{2438} = (1, 6, 5, 15)$	$P_{2483} = (1, 5, 4, 12)$	$P_{2528} = (1, 14, 3, 5)$
$P_{2394} = (1, 6, 12, 13)$	$P_{2439} = (1, 5, 11, 4)$	$P_{2484} = (1, 6, 15, 8)$	$P_{2529} = (0, 1, 7, 9)$
$P_{2395} = (1, 7, 14, 11)$	$P_{2440} = (1, 1, 13, 14)$	$P_{2485} = (1, 14, 2, 6)$	$P_{2530} = (1, 13, 8, 1)$
$P_{2396} = (1, 3, 6, 10)$	$P_{2441} = (1, 9, 1, 3)$	$P_{2486} = (1, 2, 5, 15)$	$P_{2531} = (1, 10, 4, 12)$
$P_{2397} = (1, 8, 9, 2)$	$P_{2442} = (1, 8, 12, 13)$	$P_{2487} = (1, 3, 11, 4)$	$P_{2532} = (1, 12, 15, 8)$
$P_{2398} = (1, 15, 7, 9)$	$P_{2443} = (1, 3, 14, 11)$	$P_{2488} = (1, 8, 13, 14)$	$P_{2533} = (1, 5, 2, 6)$
$P_{2399} = (1, 5, 10, 7)$	$P_{2444} = (1, 4, 6, 10)$	$P_{2489} = (1, 7, 1, 3)$	$P_{2534} = (1, 4, 5, 15)$
$P_{2400} = (1, 13, 3, 5)$	$P_{2445} = (1, 14, 9, 2)$	$P_{2490} = (1, 15, 12, 13)$	$P_{2535} = (1, 6, 11, 4)$
$P_{2401} = (0, 1, 5, 15)$	$P_{2446} = (1, 13, 7, 9)$	$P_{2491} = (1, 1, 14, 11)$	$P_{2536} = (1, 9, 13, 14)$
$P_{2402} = (1, 5, 8, 1)$	$P_{2447} = (1, 12, 10, 7)$	$P_{2492} = (1, 11, 6, 10)$	$P_{2537} = (1, 14, 1, 3)$
$P_{2403} = (1, 14, 4, 12)$	$P_{2448} = (1, 2, 3, 5)$	$P_{2493} = (1, 13, 9, 2)$	$P_{2538} = (1, 7, 12, 13)$
$P_{2404} = (1, 3, 15, 8)$	$P_{2449} = (0, 1, 1, 3)$	$P_{2494} = (1, 12, 7, 9)$	$P_{2539} = (1, 2, 14, 11)$
$P_{2405} = (1, 7, 2, 6)$	$P_{2450} = (1, 8, 8, 1)$	$P_{2495} = (1, 4, 10, 7)$	$P_{2540} = (1, 15, 6, 10)$
$P_{2406} = (1, 1, 5, 15)$	$P_{2451} = (1, 4, 4, 12)$	$P_{2496} = (1, 9, 3, 5)$	$P_{2541} = (1, 3, 9, 2)$
$P_{2407} = (1, 13, 11, 4)$	$P_{2452} = (1, 15, 15, 8)$	$P_{2497} = (0, 1, 6, 10)$	$P_{2542} = (1, 1, 7, 9)$
$P_{2408} = (1, 4, 13, 14)$	$P_{2453} = (1, 2, 2, 6)$	$P_{2498} = (1, 11, 8, 1)$	$P_{2543} = (1, 8, 10, 7)$

$P_{2544} = (1, 11, 3, 5)$	$P_{2589} = (1, 0, 11, 2)$	$P_{2634} = (1, 14, 1, 13)$	$P_{2679} = (1, 1, 15, 4)$
$P_{2545} = (0, 1, 10, 7)$	$P_{2590} = (1, 0, 14, 9)$	$P_{2635} = (1, 4, 5, 11)$	$P_{2680} = (1, 15, 3, 14)$
$P_{2546} = (1, 14, 8, 1)$	$P_{2591} = (1, 0, 13, 7)$	$P_{2636} = (1, 7, 12, 10)$	$P_{2681} = (1, 10, 2, 3)$
$P_{2547} = (1, 7, 4, 12)$	$P_{2592} = (1, 0, 6, 5)$	$P_{2637} = (1, 6, 11, 2)$	$P_{2682} = (1, 5, 1, 13)$
$P_{2548} = (1, 13, 15, 8)$	$P_{2593} = (0, 1, 9, 1)$	$P_{2638} = (1, 2, 14, 9)$	$P_{2683} = (1, 8, 5, 11)$
$P_{2549} = (1, 15, 2, 6)$	$P_{2594} = (1, 1, 9, 1)$	$P_{2639} = (1, 9, 13, 7)$	$P_{2684} = (1, 14, 12, 10)$
$P_{2550} = (1, 12, 5, 15)$	$P_{2595} = (1, 12, 8, 12)$	$P_{2640} = (1, 15, 6, 5)$	$P_{2685} = (1, 12, 11, 2)$
$P_{2551} = (1, 10, 11, 4)$	$P_{2596} = (1, 8, 7, 8)$	$P_{2641} = (0, 1, 4, 6)$	$P_{2686} = (1, 4, 14, 9)$
$P_{2552} = (1, 2, 13, 14)$	$P_{2597} = (1, 6, 4, 6)$	$P_{2642} = (1, 4, 9, 1)$	$P_{2687} = (1, 11, 13, 7)$
$P_{2553} = (1, 11, 1, 3)$	$P_{2598} = (1, 15, 10, 15)$	$P_{2643} = (1, 2, 8, 12)$	$P_{2688} = (1, 7, 6, 5)$
$P_{2554} = (1, 9, 12, 13)$	$P_{2599} = (1, 4, 15, 4)$	$P_{2644} = (1, 11, 7, 8)$	$P_{2689} = (0, 1, 3, 14)$
$P_{2555} = (1, 6, 14, 11)$	$P_{2600} = (1, 14, 3, 14)$	$P_{2645} = (1, 1, 4, 6)$	$P_{2690} = (1, 7, 9, 1)$
$P_{2556} = (1, 8, 6, 10)$	$P_{2601} = (1, 3, 2, 3)$	$P_{2646} = (1, 14, 10, 15)$	$P_{2691} = (1, 15, 8, 12)$
$P_{2557} = (1, 5, 9, 2)$	$P_{2602} = (1, 13, 1, 13)$	$P_{2647} = (1, 9, 15, 4)$	$P_{2692} = (1, 10, 7, 8)$
$P_{2558} = (1, 3, 7, 9)$	$P_{2603} = (1, 11, 5, 11)$	$P_{2648} = (1, 10, 3, 14)$	$P_{2693} = (1, 11, 4, 6)$
$P_{2559} = (1, 1, 10, 7)$	$P_{2604} = (1, 10, 12, 10)$	$P_{2649} = (1, 12, 2, 3)$	$P_{2694} = (1, 6, 10, 15)$
$P_{2560} = (1, 4, 3, 5)$	$P_{2605} = (1, 2, 11, 2)$	$P_{2650} = (1, 6, 1, 13)$	$P_{2695} = (1, 5, 15, 4)$
$P_{2561} = (0, 1, 3, 5)$	$P_{2606} = (1, 9, 14, 9)$	$P_{2651} = (1, 7, 5, 11)$	$P_{2696} = (1, 1, 3, 14)$
$P_{2562} = (1, 15, 8, 1)$	$P_{2607} = (1, 7, 13, 7)$	$P_{2652} = (1, 3, 12, 10)$	$P_{2697} = (1, 9, 2, 3)$
$P_{2563} = (1, 11, 4, 12)$	$P_{2608} = (1, 5, 6, 5)$	$P_{2653} = (1, 8, 11, 2)$	$P_{2698} = (1, 8, 1, 13)$
$P_{2564} = (1, 5, 15, 8)$	$P_{2609} = (0, 1, 8, 12)$	$P_{2654} = (1, 15, 14, 9)$	$P_{2699} = (1, 3, 5, 11)$
$P_{2565} = (1, 9, 2, 6)$	$P_{2610} = (1, 2, 9, 1)$	$P_{2655} = (1, 5, 13, 7)$	$P_{2700} = (1, 4, 12, 10)$
$P_{2566} = (1, 3, 5, 15)$	$P_{2611} = (1, 1, 8, 12)$	$P_{2656} = (1, 13, 6, 5)$	$P_{2701} = (1, 14, 11, 2)$
$P_{2567} = (1, 14, 11, 4)$	$P_{2612} = (1, 9, 7, 8)$	$P_{2657} = (0, 1, 10, 15)$	$P_{2702} = (1, 13, 14, 9)$
$P_{2568} = (1, 12, 13, 14)$	$P_{2613} = (1, 12, 4, 6)$	$P_{2658} = (1, 5, 9, 1)$	$P_{2703} = (1, 12, 13, 7)$
$P_{2569} = (1, 8, 1, 3)$	$P_{2614} = (1, 7, 10, 15)$	$P_{2659} = (1, 14, 8, 12)$	$P_{2704} = (1, 2, 6, 5)$
$P_{2570} = (1, 4, 12, 13)$	$P_{2615} = (1, 8, 15, 4)$	$P_{2660} = (1, 3, 7, 8)$	$P_{2705} = (0, 1, 2, 3)$
$P_{2571} = (1, 13, 14, 11)$	$P_{2616} = (1, 5, 3, 14)$	$P_{2661} = (1, 7, 4, 6)$	$P_{2706} = (1, 8, 9, 1)$
$P_{2572} = (1, 2, 6, 10)$	$P_{2617} = (1, 6, 2, 3)$	$P_{2662} = (1, 1, 10, 15)$	$P_{2707} = (1, 4, 8, 12)$
$P_{2573} = (1, 7, 9, 2)$	$P_{2618} = (1, 3, 1, 13)$	$P_{2663} = (1, 13, 15, 4)$	$P_{2708} = (1, 15, 7, 8)$
$P_{2574} = (1, 10, 7, 9)$	$P_{2619} = (1, 15, 5, 11)$	$P_{2664} = (1, 4, 3, 14)$	$P_{2709} = (1, 2, 4, 6)$
$P_{2575} = (1, 6, 10, 7)$	$P_{2620} = (1, 13, 12, 10)$	$P_{2665} = (1, 15, 2, 3)$	$P_{2710} = (1, 5, 10, 15)$
$P_{2576} = (1, 1, 3, 5)$	$P_{2621} = (1, 4, 11, 2)$	$P_{2666} = (1, 11, 1, 13)$	$P_{2711} = (1, 11, 15, 4)$
$P_{2577} = (0, 0, 1, 13)$	$P_{2622} = (1, 11, 14, 9)$	$P_{2667} = (1, 12, 5, 11)$	$P_{2712} = (1, 13, 3, 14)$
$P_{2578} = (1, 0, 9, 1)$	$P_{2623} = (1, 14, 13, 7)$	$P_{2668} = (1, 9, 12, 10)$	$P_{2713} = (1, 1, 2, 3)$
$P_{2579} = (1, 0, 8, 12)$	$P_{2624} = (1, 10, 6, 5)$	$P_{2669} = (1, 10, 11, 2)$	$P_{2714} = (1, 12, 1, 13)$
$P_{2580} = (1, 0, 7, 8)$	$P_{2625} = (0, 1, 7, 8)$	$P_{2670} = (1, 6, 14, 9)$	$P_{2715} = (1, 14, 5, 11)$
$P_{2581} = (1, 0, 4, 6)$	$P_{2626} = (1, 3, 9, 1)$	$P_{2671} = (1, 2, 13, 7)$	$P_{2716} = (1, 6, 12, 10)$
$P_{2582} = (1, 0, 10, 15)$	$P_{2627} = (1, 13, 8, 12)$	$P_{2672} = (1, 8, 6, 5)$	$P_{2717} = (1, 9, 11, 2)$
$P_{2583} = (1, 0, 15, 4)$	$P_{2628} = (1, 1, 7, 8)$	$P_{2673} = (0, 1, 15, 4)$	$P_{2718} = (1, 7, 14, 9)$
$P_{2584} = (1, 0, 3, 14)$	$P_{2629} = (1, 10, 4, 6)$	$P_{2674} = (1, 6, 9, 1)$	$P_{2719} = (1, 10, 13, 7)$
$P_{2585} = (1, 0, 2, 3)$	$P_{2630} = (1, 8, 10, 15)$	$P_{2675} = (1, 3, 8, 12)$	$P_{2720} = (1, 3, 6, 5)$
$P_{2586} = (1, 0, 1, 13)$	$P_{2631} = (1, 12, 15, 4)$	$P_{2676} = (1, 2, 7, 8)$	$P_{2721} = (0, 1, 1, 13)$
$P_{2587} = (1, 0, 5, 11)$	$P_{2632} = (1, 11, 3, 14)$	$P_{2677} = (1, 13, 4, 6)$	$P_{2722} = (1, 9, 9, 1)$
$P_{2588} = (1, 0, 12, 10)$	$P_{2633} = (1, 5, 2, 3)$	$P_{2678} = (1, 9, 10, 15)$	$P_{2723} = (1, 8, 8, 12)$

$P_{2724} = (1, 7, 7, 8)$	$P_{2769} = (0, 1, 11, 2)$	$P_{2814} = (1, 3, 14, 9)$	$P_{2859} = (1, 11, 1, 11)$
$P_{2725} = (1, 4, 4, 6)$	$P_{2770} = (1, 12, 9, 1)$	$P_{2815} = (1, 1, 13, 7)$	$P_{2860} = (1, 10, 11, 10)$
$P_{2726} = (1, 10, 10, 15)$	$P_{2771} = (1, 6, 8, 12)$	$P_{2816} = (1, 4, 6, 5)$	$P_{2861} = (1, 2, 13, 2)$
$P_{2727} = (1, 15, 15, 4)$	$P_{2772} = (1, 4, 7, 8)$	$P_{2817} = (0, 1, 6, 5)$	$P_{2862} = (1, 9, 12, 9)$
$P_{2728} = (1, 3, 3, 14)$	$P_{2773} = (1, 3, 4, 6)$	$P_{2818} = (1, 15, 9, 1)$	$P_{2863} = (1, 7, 4, 7)$
$P_{2729} = (1, 2, 2, 3)$	$P_{2774} = (1, 11, 10, 15)$	$P_{2819} = (1, 11, 8, 12)$	$P_{2864} = (1, 5, 9, 5)$
$P_{2730} = (1, 1, 1, 13)$	$P_{2775} = (1, 2, 15, 4)$	$P_{2820} = (1, 5, 7, 8)$	$P_{2865} = (0, 1, 5, 12)$
$P_{2731} = (1, 5, 5, 11)$	$P_{2776} = (1, 7, 3, 14)$	$P_{2821} = (1, 9, 4, 6)$	$P_{2866} = (1, 2, 10, 1)$
$P_{2732} = (1, 12, 12, 10)$	$P_{2777} = (1, 13, 2, 3)$	$P_{2822} = (1, 3, 10, 15)$	$P_{2867} = (1, 1, 5, 12)$
$P_{2733} = (1, 11, 11, 2)$	$P_{2778} = (1, 10, 1, 13)$	$P_{2823} = (1, 14, 15, 4)$	$P_{2868} = (1, 9, 6, 8)$
$P_{2734} = (1, 14, 14, 9)$	$P_{2779} = (1, 9, 5, 11)$	$P_{2824} = (1, 12, 3, 14)$	$P_{2869} = (1, 12, 14, 6)$
$P_{2735} = (1, 13, 13, 7)$	$P_{2780} = (1, 5, 12, 10)$	$P_{2825} = (1, 8, 2, 3)$	$P_{2870} = (1, 7, 2, 15)$
$P_{2736} = (1, 6, 6, 5)$	$P_{2781} = (1, 1, 11, 2)$	$P_{2826} = (1, 4, 1, 13)$	$P_{2871} = (1, 8, 3, 4)$
$P_{2737} = (0, 1, 5, 11)$	$P_{2782} = (1, 8, 14, 9)$	$P_{2827} = (1, 13, 5, 11)$	$P_{2872} = (1, 5, 8, 14)$
$P_{2738} = (1, 10, 9, 1)$	$P_{2783} = (1, 15, 13, 7)$	$P_{2828} = (1, 2, 12, 10)$	$P_{2873} = (1, 6, 7, 3)$
$P_{2739} = (1, 5, 8, 12)$	$P_{2784} = (1, 14, 6, 5)$	$P_{2829} = (1, 7, 11, 2)$	$P_{2874} = (1, 3, 15, 13)$
$P_{2740} = (1, 6, 7, 8)$	$P_{2785} = (0, 1, 14, 9)$	$P_{2830} = (1, 10, 14, 9)$	$P_{2875} = (1, 15, 1, 11)$
$P_{2741} = (1, 14, 4, 6)$	$P_{2786} = (1, 13, 9, 1)$	$P_{2831} = (1, 6, 13, 7)$	$P_{2876} = (1, 13, 11, 10)$
$P_{2742} = (1, 2, 10, 15)$	$P_{2787} = (1, 10, 8, 12)$	$P_{2832} = (1, 1, 6, 5)$	$P_{2877} = (1, 4, 13, 2)$
$P_{2743} = (1, 3, 15, 4)$	$P_{2788} = (1, 12, 7, 8)$	$P_{2833} = (0, 0, 1, 11)$	$P_{2878} = (1, 11, 12, 9)$
$P_{2744} = (1, 8, 3, 14)$	$P_{2789} = (1, 5, 4, 6)$	$P_{2834} = (1, 0, 10, 1)$	$P_{2879} = (1, 14, 4, 7)$
$P_{2745} = (1, 7, 2, 3)$	$P_{2790} = (1, 4, 10, 15)$	$P_{2835} = (1, 0, 5, 12)$	$P_{2880} = (1, 10, 9, 5)$
$P_{2746} = (1, 15, 1, 13)$	$P_{2791} = (1, 6, 15, 4)$	$P_{2836} = (1, 0, 6, 8)$	$P_{2881} = (0, 1, 6, 8)$
$P_{2747} = (1, 1, 5, 11)$	$P_{2792} = (1, 9, 3, 14)$	$P_{2837} = (1, 0, 14, 6)$	$P_{2882} = (1, 3, 10, 1)$
$P_{2748} = (1, 11, 12, 10)$	$P_{2793} = (1, 14, 2, 3)$	$P_{2838} = (1, 0, 2, 15)$	$P_{2883} = (1, 13, 5, 12)$
$P_{2749} = (1, 13, 11, 2)$	$P_{2794} = (1, 7, 1, 13)$	$P_{2839} = (1, 0, 3, 4)$	$P_{2884} = (1, 1, 6, 8)$
$P_{2750} = (1, 12, 14, 9)$	$P_{2795} = (1, 2, 5, 11)$	$P_{2840} = (1, 0, 8, 14)$	$P_{2885} = (1, 10, 14, 6)$
$P_{2751} = (1, 4, 13, 7)$	$P_{2796} = (1, 15, 12, 10)$	$P_{2841} = (1, 0, 7, 3)$	$P_{2886} = (1, 8, 2, 15)$
$P_{2752} = (1, 9, 6, 5)$	$P_{2797} = (1, 3, 11, 2)$	$P_{2842} = (1, 0, 15, 13)$	$P_{2887} = (1, 12, 3, 4)$
$P_{2753} = (0, 1, 12, 10)$	$P_{2798} = (1, 1, 14, 9)$	$P_{2843} = (1, 0, 1, 11)$	$P_{2888} = (1, 11, 8, 14)$
$P_{2754} = (1, 11, 9, 1)$	$P_{2799} = (1, 8, 13, 7)$	$P_{2844} = (1, 0, 11, 10)$	$P_{2889} = (1, 5, 7, 3)$
$P_{2755} = (1, 9, 8, 12)$	$P_{2800} = (1, 11, 6, 5)$	$P_{2845} = (1, 0, 13, 2)$	$P_{2890} = (1, 14, 15, 13)$
$P_{2756} = (1, 14, 7, 8)$	$P_{2801} = (0, 1, 13, 7)$	$P_{2846} = (1, 0, 12, 9)$	$P_{2891} = (1, 4, 1, 11)$
$P_{2757} = (1, 8, 4, 6)$	$P_{2802} = (1, 14, 9, 1)$	$P_{2847} = (1, 0, 4, 7)$	$P_{2892} = (1, 7, 11, 10)$
$P_{2758} = (1, 13, 10, 15)$	$P_{2803} = (1, 7, 8, 12)$	$P_{2848} = (1, 0, 9, 5)$	$P_{2893} = (1, 6, 13, 2)$
$P_{2759} = (1, 7, 15, 4)$	$P_{2804} = (1, 13, 7, 8)$	$P_{2849} = (0, 1, 10, 1)$	$P_{2894} = (1, 2, 12, 9)$
$P_{2760} = (1, 6, 3, 14)$	$P_{2805} = (1, 15, 4, 6)$	$P_{2850} = (1, 1, 10, 1)$	$P_{2895} = (1, 9, 4, 7)$
$P_{2761} = (1, 4, 2, 3)$	$P_{2806} = (1, 12, 10, 15)$	$P_{2851} = (1, 12, 5, 12)$	$P_{2896} = (1, 15, 9, 5)$
$P_{2762} = (1, 2, 1, 13)$	$P_{2807} = (1, 10, 15, 4)$	$P_{2852} = (1, 8, 6, 8)$	$P_{2897} = (0, 1, 14, 6)$
$P_{2763} = (1, 10, 5, 11)$	$P_{2808} = (1, 2, 3, 14)$	$P_{2853} = (1, 6, 14, 6)$	$P_{2898} = (1, 4, 10, 1)$
$P_{2764} = (1, 1, 12, 10)$	$P_{2809} = (1, 11, 2, 3)$	$P_{2854} = (1, 15, 2, 15)$	$P_{2899} = (1, 2, 5, 12)$
$P_{2765} = (1, 15, 11, 2)$	$P_{2810} = (1, 9, 1, 13)$	$P_{2855} = (1, 4, 3, 4)$	$P_{2900} = (1, 11, 6, 8)$
$P_{2766} = (1, 5, 14, 9)$	$P_{2811} = (1, 6, 5, 11)$	$P_{2856} = (1, 14, 8, 14)$	$P_{2901} = (1, 1, 14, 6)$
$P_{2767} = (1, 3, 13, 7)$	$P_{2812} = (1, 8, 12, 10)$	$P_{2857} = (1, 3, 7, 3)$	$P_{2902} = (1, 14, 2, 15)$
$P_{2768} = (1, 12, 6, 5)$	$P_{2813} = (1, 5, 11, 2)$	$P_{2858} = (1, 13, 15, 13)$	$P_{2903} = (1, 9, 3, 4)$

$P_{2904} = (1, 10, 8, 14)$	$P_{2949} = (1, 11, 14, 6)$	$P_{2994} = (1, 10, 10, 1)$	$P_{3039} = (1, 15, 4, 7)$
$P_{2905} = (1, 12, 7, 3)$	$P_{2950} = (1, 6, 2, 15)$	$P_{2995} = (1, 5, 5, 12)$	$P_{3040} = (1, 14, 9, 5)$
$P_{2906} = (1, 6, 15, 13)$	$P_{2951} = (1, 5, 3, 4)$	$P_{2996} = (1, 6, 6, 8)$	$P_{3041} = (0, 1, 12, 9)$
$P_{2907} = (1, 7, 1, 11)$	$P_{2952} = (1, 1, 8, 14)$	$P_{2997} = (1, 14, 14, 6)$	$P_{3042} = (1, 13, 10, 1)$
$P_{2908} = (1, 3, 11, 10)$	$P_{2953} = (1, 9, 7, 3)$	$P_{2998} = (1, 2, 2, 15)$	$P_{3043} = (1, 10, 5, 12)$
$P_{2909} = (1, 8, 13, 2)$	$P_{2954} = (1, 8, 15, 13)$	$P_{2999} = (1, 3, 3, 4)$	$P_{3044} = (1, 12, 6, 8)$
$P_{2910} = (1, 15, 12, 9)$	$P_{2955} = (1, 3, 1, 11)$	$P_{3000} = (1, 8, 8, 14)$	$P_{3045} = (1, 5, 14, 6)$
$P_{2911} = (1, 5, 4, 7)$	$P_{2956} = (1, 4, 11, 10)$	$P_{3001} = (1, 7, 7, 3)$	$P_{3046} = (1, 4, 2, 15)$
$P_{2912} = (1, 13, 9, 5)$	$P_{2957} = (1, 14, 13, 2)$	$P_{3002} = (1, 15, 15, 13)$	$P_{3047} = (1, 6, 3, 4)$
$P_{2913} = (0, 1, 2, 15)$	$P_{2958} = (1, 13, 12, 9)$	$P_{3003} = (1, 1, 1, 11)$	$P_{3048} = (1, 9, 8, 14)$
$P_{2914} = (1, 5, 10, 1)$	$P_{2959} = (1, 12, 4, 7)$	$P_{3004} = (1, 11, 11, 10)$	$P_{3049} = (1, 14, 7, 3)$
$P_{2915} = (1, 14, 5, 12)$	$P_{2960} = (1, 2, 9, 5)$	$P_{3005} = (1, 13, 13, 2)$	$P_{3050} = (1, 7, 15, 13)$
$P_{2916} = (1, 3, 6, 8)$	$P_{2961} = (0, 1, 7, 3)$	$P_{3006} = (1, 12, 12, 9)$	$P_{3051} = (1, 2, 1, 11)$
$P_{2917} = (1, 7, 14, 6)$	$P_{2962} = (1, 8, 10, 1)$	$P_{3007} = (1, 4, 4, 7)$	$P_{3052} = (1, 15, 11, 10)$
$P_{2918} = (1, 1, 2, 15)$	$P_{2963} = (1, 4, 5, 12)$	$P_{3008} = (1, 9, 9, 5)$	$P_{3053} = (1, 3, 13, 2)$
$P_{2919} = (1, 13, 3, 4)$	$P_{2964} = (1, 15, 6, 8)$	$P_{3009} = (0, 1, 11, 10)$	$P_{3054} = (1, 1, 12, 9)$
$P_{2920} = (1, 4, 8, 14)$	$P_{2965} = (1, 2, 14, 6)$	$P_{3010} = (1, 11, 10, 1)$	$P_{3055} = (1, 8, 4, 7)$
$P_{2921} = (1, 15, 7, 3)$	$P_{2966} = (1, 5, 2, 15)$	$P_{3011} = (1, 9, 5, 12)$	$P_{3056} = (1, 11, 9, 5)$
$P_{2922} = (1, 11, 15, 13)$	$P_{2967} = (1, 11, 3, 4)$	$P_{3012} = (1, 14, 6, 8)$	$P_{3057} = (0, 1, 4, 7)$
$P_{2923} = (1, 12, 1, 11)$	$P_{2968} = (1, 13, 8, 14)$	$P_{3013} = (1, 8, 14, 6)$	$P_{3058} = (1, 14, 10, 1)$
$P_{2924} = (1, 9, 11, 10)$	$P_{2969} = (1, 1, 7, 3)$	$P_{3014} = (1, 13, 2, 15)$	$P_{3059} = (1, 7, 5, 12)$
$P_{2925} = (1, 10, 13, 2)$	$P_{2970} = (1, 12, 15, 13)$	$P_{3015} = (1, 7, 3, 4)$	$P_{3060} = (1, 13, 6, 8)$
$P_{2926} = (1, 6, 12, 9)$	$P_{2971} = (1, 14, 1, 11)$	$P_{3016} = (1, 6, 8, 14)$	$P_{3061} = (1, 15, 14, 6)$
$P_{2927} = (1, 2, 4, 7)$	$P_{2972} = (1, 6, 11, 10)$	$P_{3017} = (1, 4, 7, 3)$	$P_{3062} = (1, 12, 2, 15)$
$P_{2928} = (1, 8, 9, 5)$	$P_{2973} = (1, 9, 13, 2)$	$P_{3018} = (1, 2, 15, 13)$	$P_{3063} = (1, 10, 3, 4)$
$P_{2929} = (0, 1, 3, 4)$	$P_{2974} = (1, 7, 12, 9)$	$P_{3019} = (1, 10, 1, 11)$	$P_{3064} = (1, 2, 8, 14)$
$P_{2930} = (1, 6, 10, 1)$	$P_{2975} = (1, 10, 4, 7)$	$P_{3020} = (1, 1, 11, 10)$	$P_{3065} = (1, 11, 7, 3)$
$P_{2931} = (1, 3, 5, 12)$	$P_{2976} = (1, 3, 9, 5)$	$P_{3021} = (1, 15, 13, 2)$	$P_{3066} = (1, 9, 15, 13)$
$P_{2932} = (1, 2, 6, 8)$	$P_{2977} = (0, 1, 15, 13)$	$P_{3022} = (1, 5, 12, 9)$	$P_{3067} = (1, 6, 1, 11)$
$P_{2933} = (1, 13, 14, 6)$	$P_{2978} = (1, 9, 10, 1)$	$P_{3023} = (1, 3, 4, 7)$	$P_{3068} = (1, 8, 11, 10)$
$P_{2934} = (1, 9, 2, 15)$	$P_{2979} = (1, 8, 5, 12)$	$P_{3024} = (1, 12, 9, 5)$	$P_{3069} = (1, 5, 13, 2)$
$P_{2935} = (1, 1, 3, 4)$	$P_{2980} = (1, 7, 6, 8)$	$P_{3025} = (0, 1, 13, 2)$	$P_{3070} = (1, 3, 12, 9)$
$P_{2936} = (1, 15, 8, 14)$	$P_{2981} = (1, 4, 14, 6)$	$P_{3026} = (1, 12, 10, 1)$	$P_{3071} = (1, 1, 4, 7)$
$P_{2937} = (1, 10, 7, 3)$	$P_{2982} = (1, 10, 2, 15)$	$P_{3027} = (1, 6, 5, 12)$	$P_{3072} = (1, 4, 9, 5)$
$P_{2938} = (1, 5, 15, 13)$	$P_{2983} = (1, 15, 3, 4)$	$P_{3028} = (1, 4, 6, 8)$	$P_{3073} = (0, 1, 9, 5)$
$P_{2939} = (1, 8, 1, 11)$	$P_{2984} = (1, 3, 8, 14)$	$P_{3029} = (1, 3, 14, 6)$	$P_{3074} = (1, 15, 10, 1)$
$P_{2940} = (1, 14, 11, 10)$	$P_{2985} = (1, 2, 7, 3)$	$P_{3030} = (1, 11, 2, 15)$	$P_{3075} = (1, 11, 5, 12)$
$P_{2941} = (1, 12, 13, 2)$	$P_{2986} = (1, 1, 15, 13)$	$P_{3031} = (1, 2, 3, 4)$	$P_{3076} = (1, 5, 6, 8)$
$P_{2942} = (1, 4, 12, 9)$	$P_{2987} = (1, 5, 1, 11)$	$P_{3032} = (1, 7, 8, 14)$	$P_{3077} = (1, 9, 14, 6)$
$P_{2943} = (1, 11, 4, 7)$	$P_{2988} = (1, 12, 11, 10)$	$P_{3033} = (1, 13, 7, 3)$	$P_{3078} = (1, 3, 2, 15)$
$P_{2944} = (1, 7, 9, 5)$	$P_{2989} = (1, 11, 13, 2)$	$P_{3034} = (1, 10, 15, 13)$	$P_{3079} = (1, 14, 3, 4)$
$P_{2945} = (0, 1, 8, 14)$	$P_{2990} = (1, 14, 12, 9)$	$P_{3035} = (1, 9, 1, 11)$	$P_{3080} = (1, 12, 8, 14)$
$P_{2946} = (1, 7, 10, 1)$	$P_{2991} = (1, 13, 4, 7)$	$P_{3036} = (1, 5, 11, 10)$	$P_{3081} = (1, 8, 7, 3)$
$P_{2947} = (1, 15, 5, 12)$	$P_{2992} = (1, 6, 9, 5)$	$P_{3037} = (1, 1, 13, 2)$	$P_{3082} = (1, 4, 15, 13)$
$P_{2948} = (1, 10, 6, 8)$	$P_{2993} = (0, 1, 1, 11)$	$P_{3038} = (1, 8, 12, 9)$	$P_{3083} = (1, 13, 1, 11)$

$P_{3084} = (1, 2, 11, 10)$	$P_{3129} = (1, 6, 4, 3)$	$P_{3174} = (1, 1, 13, 15)$	$P_{3219} = (1, 4, 9, 12)$
$P_{3085} = (1, 7, 13, 2)$	$P_{3130} = (1, 3, 2, 13)$	$P_{3175} = (1, 13, 7, 4)$	$P_{3220} = (1, 15, 14, 8)$
$P_{3086} = (1, 10, 12, 9)$	$P_{3131} = (1, 15, 10, 11)$	$P_{3176} = (1, 4, 6, 14)$	$P_{3221} = (1, 2, 8, 6)$
$P_{3087} = (1, 6, 4, 7)$	$P_{3132} = (1, 13, 1, 10)$	$P_{3177} = (1, 15, 4, 3)$	$P_{3222} = (1, 5, 13, 15)$
$P_{3088} = (1, 1, 9, 5)$	$P_{3133} = (1, 4, 15, 2)$	$P_{3178} = (1, 11, 2, 13)$	$P_{3223} = (1, 11, 7, 4)$
$P_{3089} = (0, 0, 1, 10)$	$P_{3134} = (1, 11, 5, 9)$	$P_{3179} = (1, 12, 10, 11)$	$P_{3224} = (1, 13, 6, 14)$
$P_{3090} = (1, 0, 11, 1)$	$P_{3135} = (1, 14, 3, 7)$	$P_{3180} = (1, 9, 1, 10)$	$P_{3225} = (1, 1, 4, 3)$
$P_{3091} = (1, 0, 9, 12)$	$P_{3136} = (1, 10, 12, 5)$	$P_{3181} = (1, 10, 15, 2)$	$P_{3226} = (1, 12, 2, 13)$
$P_{3092} = (1, 0, 14, 8)$	$P_{3137} = (0, 1, 14, 8)$	$P_{3182} = (1, 6, 5, 9)$	$P_{3227} = (1, 14, 10, 11)$
$P_{3093} = (1, 0, 8, 6)$	$P_{3138} = (1, 3, 11, 1)$	$P_{3183} = (1, 2, 3, 7)$	$P_{3228} = (1, 6, 1, 10)$
$P_{3094} = (1, 0, 13, 15)$	$P_{3139} = (1, 13, 9, 12)$	$P_{3184} = (1, 8, 12, 5)$	$P_{3229} = (1, 9, 15, 2)$
$P_{3095} = (1, 0, 7, 4)$	$P_{3140} = (1, 1, 14, 8)$	$P_{3185} = (0, 1, 7, 4)$	$P_{3230} = (1, 7, 5, 9)$
$P_{3096} = (1, 0, 6, 14)$	$P_{3141} = (1, 10, 8, 6)$	$P_{3186} = (1, 6, 11, 1)$	$P_{3231} = (1, 10, 3, 7)$
$P_{3097} = (1, 0, 4, 3)$	$P_{3142} = (1, 8, 13, 15)$	$P_{3187} = (1, 3, 9, 12)$	$P_{3232} = (1, 3, 12, 5)$
$P_{3098} = (1, 0, 2, 13)$	$P_{3143} = (1, 12, 7, 4)$	$P_{3188} = (1, 2, 14, 8)$	$P_{3233} = (0, 1, 2, 13)$
$P_{3099} = (1, 0, 10, 11)$	$P_{3144} = (1, 11, 6, 14)$	$P_{3189} = (1, 13, 8, 6)$	$P_{3234} = (1, 9, 11, 1)$
$P_{3100} = (1, 0, 1, 10)$	$P_{3145} = (1, 5, 4, 3)$	$P_{3190} = (1, 9, 13, 15)$	$P_{3235} = (1, 8, 9, 12)$
$P_{3101} = (1, 0, 15, 2)$	$P_{3146} = (1, 14, 2, 13)$	$P_{3191} = (1, 1, 7, 4)$	$P_{3236} = (1, 7, 14, 8)$
$P_{3102} = (1, 0, 5, 9)$	$P_{3147} = (1, 4, 10, 11)$	$P_{3192} = (1, 15, 6, 14)$	$P_{3237} = (1, 4, 8, 6)$
$P_{3103} = (1, 0, 3, 7)$	$P_{3148} = (1, 7, 1, 10)$	$P_{3193} = (1, 10, 4, 3)$	$P_{3238} = (1, 10, 13, 15)$
$P_{3104} = (1, 0, 12, 5)$	$P_{3149} = (1, 6, 15, 2)$	$P_{3194} = (1, 5, 2, 13)$	$P_{3239} = (1, 15, 7, 4)$
$P_{3105} = (0, 1, 11, 1)$	$P_{3150} = (1, 2, 5, 9)$	$P_{3195} = (1, 8, 10, 11)$	$P_{3240} = (1, 3, 6, 14)$
$P_{3106} = (1, 1, 11, 1)$	$P_{3151} = (1, 9, 3, 7)$	$P_{3196} = (1, 14, 1, 10)$	$P_{3241} = (1, 2, 4, 3)$
$P_{3107} = (1, 12, 9, 12)$	$P_{3152} = (1, 15, 12, 5)$	$P_{3197} = (1, 12, 15, 2)$	$P_{3242} = (1, 1, 2, 13)$
$P_{3108} = (1, 8, 14, 8)$	$P_{3153} = (0, 1, 8, 6)$	$P_{3198} = (1, 4, 5, 9)$	$P_{3243} = (1, 5, 10, 11)$
$P_{3109} = (1, 6, 8, 6)$	$P_{3154} = (1, 4, 11, 1)$	$P_{3199} = (1, 11, 3, 7)$	$P_{3244} = (1, 12, 1, 10)$
$P_{3110} = (1, 15, 13, 15)$	$P_{3155} = (1, 2, 9, 12)$	$P_{3200} = (1, 7, 12, 5)$	$P_{3245} = (1, 11, 15, 2)$
$P_{3111} = (1, 4, 7, 4)$	$P_{3156} = (1, 11, 14, 8)$	$P_{3201} = (0, 1, 6, 14)$	$P_{3246} = (1, 14, 5, 9)$
$P_{3112} = (1, 14, 6, 14)$	$P_{3157} = (1, 1, 8, 6)$	$P_{3202} = (1, 7, 11, 1)$	$P_{3247} = (1, 13, 3, 7)$
$P_{3113} = (1, 3, 4, 3)$	$P_{3158} = (1, 14, 13, 15)$	$P_{3203} = (1, 15, 9, 12)$	$P_{3248} = (1, 6, 12, 5)$
$P_{3114} = (1, 13, 2, 13)$	$P_{3159} = (1, 9, 7, 4)$	$P_{3204} = (1, 10, 14, 8)$	$P_{3249} = (0, 1, 10, 11)$
$P_{3115} = (1, 11, 10, 11)$	$P_{3160} = (1, 10, 6, 14)$	$P_{3205} = (1, 11, 8, 6)$	$P_{3250} = (1, 10, 11, 1)$
$P_{3116} = (1, 10, 1, 10)$	$P_{3161} = (1, 12, 4, 3)$	$P_{3206} = (1, 6, 13, 15)$	$P_{3251} = (1, 5, 9, 12)$
$P_{3117} = (1, 2, 15, 2)$	$P_{3162} = (1, 6, 2, 13)$	$P_{3207} = (1, 5, 7, 4)$	$P_{3252} = (1, 6, 14, 8)$
$P_{3118} = (1, 9, 5, 9)$	$P_{3163} = (1, 7, 10, 11)$	$P_{3208} = (1, 1, 6, 14)$	$P_{3253} = (1, 14, 8, 6)$
$P_{3119} = (1, 7, 3, 7)$	$P_{3164} = (1, 3, 1, 10)$	$P_{3209} = (1, 9, 4, 3)$	$P_{3254} = (1, 2, 13, 15)$
$P_{3120} = (1, 5, 12, 5)$	$P_{3165} = (1, 8, 15, 2)$	$P_{3210} = (1, 8, 2, 13)$	$P_{3255} = (1, 3, 7, 4)$
$P_{3121} = (0, 1, 9, 12)$	$P_{3166} = (1, 15, 5, 9)$	$P_{3211} = (1, 3, 10, 11)$	$P_{3256} = (1, 8, 6, 14)$
$P_{3122} = (1, 2, 11, 1)$	$P_{3167} = (1, 5, 3, 7)$	$P_{3212} = (1, 4, 1, 10)$	$P_{3257} = (1, 7, 4, 3)$
$P_{3123} = (1, 1, 9, 12)$	$P_{3168} = (1, 13, 12, 5)$	$P_{3213} = (1, 14, 15, 2)$	$P_{3258} = (1, 15, 2, 13)$
$P_{3124} = (1, 9, 14, 8)$	$P_{3169} = (0, 1, 13, 15)$	$P_{3214} = (1, 13, 5, 9)$	$P_{3259} = (1, 1, 10, 11)$
$P_{3125} = (1, 12, 8, 6)$	$P_{3170} = (1, 5, 11, 1)$	$P_{3215} = (1, 12, 3, 7)$	$P_{3260} = (1, 11, 1, 10)$
$P_{3126} = (1, 7, 13, 15)$	$P_{3171} = (1, 14, 9, 12)$	$P_{3216} = (1, 2, 12, 5)$	$P_{3261} = (1, 13, 15, 2)$
$P_{3127} = (1, 8, 7, 4)$	$P_{3172} = (1, 3, 14, 8)$	$P_{3217} = (0, 1, 4, 3)$	$P_{3262} = (1, 12, 5, 9)$
$P_{3128} = (1, 5, 6, 14)$	$P_{3173} = (1, 7, 8, 6)$	$P_{3218} = (1, 8, 11, 1)$	$P_{3263} = (1, 4, 3, 7)$

$P_{3264} = (1, 9, 12, 5)$	$P_{3309} = (1, 3, 15, 2)$	$P_{3354} = (1, 0, 10, 13)$	$P_{3399} = (1, 12, 2, 4)$
$P_{3265} = (0, 1, 1, 10)$	$P_{3310} = (1, 1, 5, 9)$	$P_{3355} = (1, 0, 9, 11)$	$P_{3400} = (1, 11, 7, 14)$
$P_{3266} = (1, 11, 11, 1)$	$P_{3311} = (1, 8, 3, 7)$	$P_{3356} = (1, 0, 5, 10)$	$P_{3401} = (1, 5, 13, 3)$
$P_{3267} = (1, 9, 9, 12)$	$P_{3312} = (1, 11, 12, 5)$	$P_{3357} = (1, 0, 1, 2)$	$P_{3402} = (1, 14, 10, 13)$
$P_{3268} = (1, 14, 14, 8)$	$P_{3313} = (0, 1, 3, 7)$	$P_{3358} = (1, 0, 8, 9)$	$P_{3403} = (1, 4, 9, 11)$
$P_{3269} = (1, 8, 8, 6)$	$P_{3314} = (1, 14, 11, 1)$	$P_{3359} = (1, 0, 15, 7)$	$P_{3404} = (1, 7, 5, 10)$
$P_{3270} = (1, 13, 13, 15)$	$P_{3315} = (1, 7, 9, 12)$	$P_{3360} = (1, 0, 14, 5)$	$P_{3405} = (1, 6, 1, 2)$
$P_{3271} = (1, 7, 7, 4)$	$P_{3316} = (1, 13, 14, 8)$	$P_{3361} = (0, 1, 12, 1)$	$P_{3406} = (1, 2, 8, 9)$
$P_{3272} = (1, 6, 6, 14)$	$P_{3317} = (1, 15, 8, 6)$	$P_{3362} = (1, 1, 12, 1)$	$P_{3407} = (1, 9, 15, 7)$
$P_{3273} = (1, 4, 4, 3)$	$P_{3318} = (1, 12, 13, 15)$	$P_{3363} = (1, 12, 6, 12)$	$P_{3408} = (1, 15, 14, 5)$
$P_{3274} = (1, 2, 2, 13)$	$P_{3319} = (1, 10, 7, 4)$	$P_{3364} = (1, 8, 4, 8)$	$P_{3409} = (0, 1, 3, 6)$
$P_{3275} = (1, 10, 10, 11)$	$P_{3320} = (1, 2, 6, 14)$	$P_{3365} = (1, 6, 3, 6)$	$P_{3410} = (1, 4, 12, 1)$
$P_{3276} = (1, 1, 1, 10)$	$P_{3321} = (1, 11, 4, 3)$	$P_{3366} = (1, 15, 11, 15)$	$P_{3411} = (1, 2, 6, 12)$
$P_{3277} = (1, 15, 15, 2)$	$P_{3322} = (1, 9, 2, 13)$	$P_{3367} = (1, 4, 2, 4)$	$P_{3412} = (1, 11, 4, 8)$
$P_{3278} = (1, 5, 5, 9)$	$P_{3323} = (1, 6, 10, 11)$	$P_{3368} = (1, 14, 7, 14)$	$P_{3413} = (1, 1, 3, 6)$
$P_{3279} = (1, 3, 3, 7)$	$P_{3324} = (1, 8, 1, 10)$	$P_{3369} = (1, 3, 13, 3)$	$P_{3414} = (1, 14, 11, 15)$
$P_{3280} = (1, 12, 12, 5)$	$P_{3325} = (1, 5, 15, 2)$	$P_{3370} = (1, 13, 10, 13)$	$P_{3415} = (1, 9, 2, 4)$
$P_{3281} = (0, 1, 15, 2)$	$P_{3326} = (1, 3, 5, 9)$	$P_{3371} = (1, 11, 9, 11)$	$P_{3416} = (1, 10, 7, 14)$
$P_{3282} = (1, 12, 11, 1)$	$P_{3327} = (1, 1, 3, 7)$	$P_{3372} = (1, 10, 5, 10)$	$P_{3417} = (1, 12, 13, 3)$
$P_{3283} = (1, 6, 9, 12)$	$P_{3328} = (1, 4, 12, 5)$	$P_{3373} = (1, 2, 1, 2)$	$P_{3418} = (1, 6, 10, 13)$
$P_{3284} = (1, 4, 14, 8)$	$P_{3329} = (0, 1, 12, 5)$	$P_{3374} = (1, 9, 8, 9)$	$P_{3419} = (1, 7, 9, 11)$
$P_{3285} = (1, 3, 8, 6)$	$P_{3330} = (1, 15, 11, 1)$	$P_{3375} = (1, 7, 15, 7)$	$P_{3420} = (1, 3, 5, 10)$
$P_{3286} = (1, 11, 13, 15)$	$P_{3331} = (1, 11, 9, 12)$	$P_{3376} = (1, 5, 14, 5)$	$P_{3421} = (1, 8, 1, 2)$
$P_{3287} = (1, 2, 7, 4)$	$P_{3332} = (1, 5, 14, 8)$	$P_{3377} = (0, 1, 6, 12)$	$P_{3422} = (1, 15, 8, 9)$
$P_{3288} = (1, 7, 6, 14)$	$P_{3333} = (1, 9, 8, 6)$	$P_{3378} = (1, 2, 12, 1)$	$P_{3423} = (1, 5, 15, 7)$
$P_{3289} = (1, 13, 4, 3)$	$P_{3334} = (1, 3, 13, 15)$	$P_{3379} = (1, 1, 6, 12)$	$P_{3424} = (1, 13, 14, 5)$
$P_{3290} = (1, 10, 2, 13)$	$P_{3335} = (1, 14, 7, 4)$	$P_{3380} = (1, 9, 4, 8)$	$P_{3425} = (0, 1, 11, 15)$
$P_{3291} = (1, 9, 10, 11)$	$P_{3336} = (1, 12, 6, 14)$	$P_{3381} = (1, 12, 3, 6)$	$P_{3426} = (1, 5, 12, 1)$
$P_{3292} = (1, 5, 1, 10)$	$P_{3337} = (1, 8, 4, 3)$	$P_{3382} = (1, 7, 11, 15)$	$P_{3427} = (1, 14, 6, 12)$
$P_{3293} = (1, 1, 15, 2)$	$P_{3338} = (1, 4, 2, 13)$	$P_{3383} = (1, 8, 2, 4)$	$P_{3428} = (1, 3, 4, 8)$
$P_{3294} = (1, 8, 5, 9)$	$P_{3339} = (1, 13, 10, 11)$	$P_{3384} = (1, 5, 7, 14)$	$P_{3429} = (1, 7, 3, 6)$
$P_{3295} = (1, 15, 3, 7)$	$P_{3340} = (1, 2, 1, 10)$	$P_{3385} = (1, 6, 13, 3)$	$P_{3430} = (1, 1, 11, 15)$
$P_{3296} = (1, 14, 12, 5)$	$P_{3341} = (1, 7, 15, 2)$	$P_{3386} = (1, 3, 10, 13)$	$P_{3431} = (1, 13, 2, 4)$
$P_{3297} = (0, 1, 5, 9)$	$P_{3342} = (1, 10, 5, 9)$	$P_{3387} = (1, 15, 9, 11)$	$P_{3432} = (1, 4, 7, 14)$
$P_{3298} = (1, 13, 11, 1)$	$P_{3343} = (1, 6, 3, 7)$	$P_{3388} = (1, 13, 5, 10)$	$P_{3433} = (1, 15, 13, 3)$
$P_{3299} = (1, 10, 9, 12)$	$P_{3344} = (1, 1, 12, 5)$	$P_{3389} = (1, 4, 1, 2)$	$P_{3434} = (1, 11, 10, 13)$
$P_{3300} = (1, 12, 14, 8)$	$P_{3345} = (0, 0, 1, 2)$	$P_{3390} = (1, 11, 8, 9)$	$P_{3435} = (1, 12, 9, 11)$
$P_{3301} = (1, 5, 8, 6)$	$P_{3346} = (1, 0, 12, 1)$	$P_{3391} = (1, 14, 15, 7)$	$P_{3436} = (1, 9, 5, 10)$
$P_{3302} = (1, 4, 13, 15)$	$P_{3347} = (1, 0, 6, 12)$	$P_{3392} = (1, 10, 14, 5)$	$P_{3437} = (1, 10, 1, 2)$
$P_{3303} = (1, 6, 7, 4)$	$P_{3348} = (1, 0, 4, 8)$	$P_{3393} = (0, 1, 4, 8)$	$P_{3438} = (1, 6, 8, 9)$
$P_{3304} = (1, 9, 6, 14)$	$P_{3349} = (1, 0, 3, 6)$	$P_{3394} = (1, 3, 12, 1)$	$P_{3439} = (1, 2, 15, 7)$
$P_{3305} = (1, 14, 4, 3)$	$P_{3350} = (1, 0, 11, 15)$	$P_{3395} = (1, 13, 6, 12)$	$P_{3440} = (1, 8, 14, 5)$
$P_{3306} = (1, 7, 2, 13)$	$P_{3351} = (1, 0, 2, 4)$	$P_{3396} = (1, 1, 4, 8)$	$P_{3441} = (0, 1, 2, 4)$
$P_{3307} = (1, 2, 10, 11)$	$P_{3352} = (1, 0, 7, 14)$	$P_{3397} = (1, 10, 3, 6)$	$P_{3442} = (1, 6, 12, 1)$
$P_{3308} = (1, 15, 1, 10)$	$P_{3353} = (1, 0, 13, 3)$	$P_{3398} = (1, 8, 11, 15)$	$P_{3443} = (1, 3, 6, 12)$

$P_{3444} = (1, 2, 4, 8)$	$P_{3489} = (0, 1, 10, 13)$	$P_{3534} = (1, 5, 8, 9)$	$P_{3579} = (1, 6, 9, 11)$
$P_{3445} = (1, 13, 3, 6)$	$P_{3490} = (1, 9, 12, 1)$	$P_{3535} = (1, 3, 15, 7)$	$P_{3580} = (1, 8, 5, 10)$
$P_{3446} = (1, 9, 11, 15)$	$P_{3491} = (1, 8, 6, 12)$	$P_{3536} = (1, 12, 14, 5)$	$P_{3581} = (1, 5, 1, 2)$
$P_{3447} = (1, 1, 2, 4)$	$P_{3492} = (1, 7, 4, 8)$	$P_{3537} = (0, 1, 1, 2)$	$P_{3582} = (1, 3, 8, 9)$
$P_{3448} = (1, 15, 7, 14)$	$P_{3493} = (1, 4, 3, 6)$	$P_{3538} = (1, 12, 12, 1)$	$P_{3583} = (1, 1, 15, 7)$
$P_{3449} = (1, 10, 13, 3)$	$P_{3494} = (1, 10, 11, 15)$	$P_{3539} = (1, 6, 6, 12)$	$P_{3584} = (1, 4, 14, 5)$
$P_{3450} = (1, 5, 10, 13)$	$P_{3495} = (1, 15, 2, 4)$	$P_{3540} = (1, 4, 4, 8)$	$P_{3585} = (0, 1, 14, 5)$
$P_{3451} = (1, 8, 9, 11)$	$P_{3496} = (1, 3, 7, 14)$	$P_{3541} = (1, 3, 3, 6)$	$P_{3586} = (1, 15, 12, 1)$
$P_{3452} = (1, 14, 5, 10)$	$P_{3497} = (1, 2, 13, 3)$	$P_{3542} = (1, 11, 11, 15)$	$P_{3587} = (1, 11, 6, 12)$
$P_{3453} = (1, 12, 1, 2)$	$P_{3498} = (1, 1, 10, 13)$	$P_{3543} = (1, 2, 2, 4)$	$P_{3588} = (1, 5, 4, 8)$
$P_{3454} = (1, 4, 8, 9)$	$P_{3499} = (1, 5, 9, 11)$	$P_{3544} = (1, 7, 7, 14)$	$P_{3589} = (1, 9, 3, 6)$
$P_{3455} = (1, 11, 15, 7)$	$P_{3500} = (1, 12, 5, 10)$	$P_{3545} = (1, 13, 13, 3)$	$P_{3590} = (1, 3, 11, 15)$
$P_{3456} = (1, 7, 14, 5)$	$P_{3501} = (1, 11, 1, 2)$	$P_{3546} = (1, 10, 10, 13)$	$P_{3591} = (1, 14, 2, 4)$
$P_{3457} = (0, 1, 7, 14)$	$P_{3502} = (1, 14, 8, 9)$	$P_{3547} = (1, 9, 9, 11)$	$P_{3592} = (1, 12, 7, 14)$
$P_{3458} = (1, 7, 12, 1)$	$P_{3503} = (1, 13, 15, 7)$	$P_{3548} = (1, 5, 5, 10)$	$P_{3593} = (1, 8, 13, 3)$
$P_{3459} = (1, 15, 6, 12)$	$P_{3504} = (1, 6, 14, 5)$	$P_{3549} = (1, 1, 1, 2)$	$P_{3594} = (1, 4, 10, 13)$
$P_{3460} = (1, 10, 4, 8)$	$P_{3505} = (0, 1, 9, 11)$	$P_{3550} = (1, 8, 8, 9)$	$P_{3595} = (1, 13, 9, 11)$
$P_{3461} = (1, 11, 3, 6)$	$P_{3506} = (1, 10, 12, 1)$	$P_{3551} = (1, 15, 15, 7)$	$P_{3596} = (1, 2, 5, 10)$
$P_{3462} = (1, 6, 11, 15)$	$P_{3507} = (1, 5, 6, 12)$	$P_{3552} = (1, 14, 14, 5)$	$P_{3597} = (1, 7, 1, 2)$
$P_{3463} = (1, 5, 2, 4)$	$P_{3508} = (1, 6, 4, 8)$	$P_{3553} = (0, 1, 8, 9)$	$P_{3598} = (1, 10, 8, 9)$
$P_{3464} = (1, 1, 7, 14)$	$P_{3509} = (1, 14, 3, 6)$	$P_{3554} = (1, 13, 12, 1)$	$P_{3599} = (1, 6, 15, 7)$
$P_{3465} = (1, 9, 13, 3)$	$P_{3510} = (1, 2, 11, 15)$	$P_{3555} = (1, 10, 6, 12)$	$P_{3600} = (1, 1, 14, 5)$
$P_{3466} = (1, 8, 10, 13)$	$P_{3511} = (1, 3, 2, 4)$	$P_{3556} = (1, 12, 4, 8)$	$P_{3601} = (0, 0, 1, 9)$
$P_{3467} = (1, 3, 9, 11)$	$P_{3512} = (1, 8, 7, 14)$	$P_{3557} = (1, 5, 3, 6)$	$P_{3602} = (1, 0, 13, 1)$
$P_{3468} = (1, 4, 5, 10)$	$P_{3513} = (1, 7, 13, 3)$	$P_{3558} = (1, 4, 11, 15)$	$P_{3603} = (1, 0, 10, 12)$
$P_{3469} = (1, 14, 1, 2)$	$P_{3514} = (1, 15, 10, 13)$	$P_{3559} = (1, 6, 2, 4)$	$P_{3604} = (1, 0, 12, 8)$
$P_{3470} = (1, 13, 8, 9)$	$P_{3515} = (1, 1, 9, 11)$	$P_{3560} = (1, 9, 7, 14)$	$P_{3605} = (1, 0, 5, 6)$
$P_{3471} = (1, 12, 15, 7)$	$P_{3516} = (1, 11, 5, 10)$	$P_{3561} = (1, 14, 13, 3)$	$P_{3606} = (1, 0, 4, 15)$
$P_{3472} = (1, 2, 14, 5)$	$P_{3517} = (1, 13, 1, 2)$	$P_{3562} = (1, 7, 10, 13)$	$P_{3607} = (1, 0, 6, 4)$
$P_{3473} = (0, 1, 13, 3)$	$P_{3518} = (1, 12, 8, 9)$	$P_{3563} = (1, 2, 9, 11)$	$P_{3608} = (1, 0, 9, 14)$
$P_{3474} = (1, 8, 12, 1)$	$P_{3519} = (1, 4, 15, 7)$	$P_{3564} = (1, 15, 5, 10)$	$P_{3609} = (1, 0, 14, 3)$
$P_{3475} = (1, 4, 6, 12)$	$P_{3520} = (1, 9, 14, 5)$	$P_{3565} = (1, 3, 1, 2)$	$P_{3610} = (1, 0, 7, 13)$
$P_{3476} = (1, 15, 4, 8)$	$P_{3521} = (0, 1, 5, 10)$	$P_{3566} = (1, 1, 8, 9)$	$P_{3611} = (1, 0, 2, 11)$
$P_{3477} = (1, 2, 3, 6)$	$P_{3522} = (1, 11, 12, 1)$	$P_{3567} = (1, 8, 15, 7)$	$P_{3612} = (1, 0, 15, 10)$
$P_{3478} = (1, 5, 11, 15)$	$P_{3523} = (1, 9, 6, 12)$	$P_{3568} = (1, 11, 14, 5)$	$P_{3613} = (1, 0, 3, 2)$
$P_{3479} = (1, 11, 2, 4)$	$P_{3524} = (1, 14, 4, 8)$	$P_{3569} = (0, 1, 15, 7)$	$P_{3614} = (1, 0, 1, 9)$
$P_{3480} = (1, 13, 7, 14)$	$P_{3525} = (1, 8, 3, 6)$	$P_{3570} = (1, 14, 12, 1)$	$P_{3615} = (1, 0, 8, 7)$
$P_{3481} = (1, 1, 13, 3)$	$P_{3526} = (1, 13, 11, 15)$	$P_{3571} = (1, 7, 6, 12)$	$P_{3616} = (1, 0, 11, 5)$
$P_{3482} = (1, 12, 10, 13)$	$P_{3527} = (1, 7, 2, 4)$	$P_{3572} = (1, 13, 4, 8)$	$P_{3617} = (0, 1, 13, 1)$
$P_{3483} = (1, 14, 9, 11)$	$P_{3528} = (1, 6, 7, 14)$	$P_{3573} = (1, 15, 3, 6)$	$P_{3618} = (1, 1, 13, 1)$
$P_{3484} = (1, 6, 5, 10)$	$P_{3529} = (1, 4, 13, 3)$	$P_{3574} = (1, 12, 11, 15)$	$P_{3619} = (1, 12, 10, 12)$
$P_{3485} = (1, 9, 1, 2)$	$P_{3530} = (1, 2, 10, 13)$	$P_{3575} = (1, 10, 2, 4)$	$P_{3620} = (1, 8, 12, 8)$
$P_{3486} = (1, 7, 8, 9)$	$P_{3531} = (1, 10, 9, 11)$	$P_{3576} = (1, 2, 7, 14)$	$P_{3621} = (1, 6, 5, 6)$
$P_{3487} = (1, 10, 15, 7)$	$P_{3532} = (1, 1, 5, 10)$	$P_{3577} = (1, 11, 13, 3)$	$P_{3622} = (1, 15, 4, 15)$
$P_{3488} = (1, 3, 14, 5)$	$P_{3533} = (1, 15, 1, 2)$	$P_{3578} = (1, 9, 10, 13)$	$P_{3623} = (1, 4, 6, 4)$

$P_{3624} = (1, 14, 9, 14)$	$P_{3669} = (1, 1, 5, 6)$	$P_{3714} = (1, 7, 13, 1)$	$P_{3759} = (1, 13, 8, 7)$
$P_{3625} = (1, 3, 14, 3)$	$P_{3670} = (1, 14, 4, 15)$	$P_{3715} = (1, 15, 10, 12)$	$P_{3760} = (1, 6, 11, 5)$
$P_{3626} = (1, 13, 7, 13)$	$P_{3671} = (1, 9, 6, 4)$	$P_{3716} = (1, 10, 12, 8)$	$P_{3761} = (0, 1, 2, 11)$
$P_{3627} = (1, 11, 2, 11)$	$P_{3672} = (1, 10, 9, 14)$	$P_{3717} = (1, 11, 5, 6)$	$P_{3762} = (1, 10, 13, 1)$
$P_{3628} = (1, 10, 15, 10)$	$P_{3673} = (1, 12, 14, 3)$	$P_{3718} = (1, 6, 4, 15)$	$P_{3763} = (1, 5, 10, 12)$
$P_{3629} = (1, 2, 3, 2)$	$P_{3674} = (1, 6, 7, 13)$	$P_{3719} = (1, 5, 6, 4)$	$P_{3764} = (1, 6, 12, 8)$
$P_{3630} = (1, 9, 1, 9)$	$P_{3675} = (1, 7, 2, 11)$	$P_{3720} = (1, 1, 9, 14)$	$P_{3765} = (1, 14, 5, 6)$
$P_{3631} = (1, 7, 8, 7)$	$P_{3676} = (1, 3, 15, 10)$	$P_{3721} = (1, 9, 14, 3)$	$P_{3766} = (1, 2, 4, 15)$
$P_{3632} = (1, 5, 11, 5)$	$P_{3677} = (1, 8, 3, 2)$	$P_{3722} = (1, 8, 7, 13)$	$P_{3767} = (1, 3, 6, 4)$
$P_{3633} = (0, 1, 10, 12)$	$P_{3678} = (1, 15, 1, 9)$	$P_{3723} = (1, 3, 2, 11)$	$P_{3768} = (1, 8, 9, 14)$
$P_{3634} = (1, 2, 13, 1)$	$P_{3679} = (1, 5, 8, 7)$	$P_{3724} = (1, 4, 15, 10)$	$P_{3769} = (1, 7, 14, 3)$
$P_{3635} = (1, 1, 10, 12)$	$P_{3680} = (1, 13, 11, 5)$	$P_{3725} = (1, 14, 3, 2)$	$P_{3770} = (1, 15, 7, 13)$
$P_{3636} = (1, 9, 12, 8)$	$P_{3681} = (0, 1, 4, 15)$	$P_{3726} = (1, 13, 1, 9)$	$P_{3771} = (1, 1, 2, 11)$
$P_{3637} = (1, 12, 5, 6)$	$P_{3682} = (1, 5, 13, 1)$	$P_{3727} = (1, 12, 8, 7)$	$P_{3772} = (1, 11, 15, 10)$
$P_{3638} = (1, 7, 4, 15)$	$P_{3683} = (1, 14, 10, 12)$	$P_{3728} = (1, 2, 11, 5)$	$P_{3773} = (1, 13, 3, 2)$
$P_{3639} = (1, 8, 6, 4)$	$P_{3684} = (1, 3, 12, 8)$	$P_{3729} = (0, 1, 14, 3)$	$P_{3774} = (1, 12, 1, 9)$
$P_{3640} = (1, 5, 9, 14)$	$P_{3685} = (1, 7, 5, 6)$	$P_{3730} = (1, 8, 13, 1)$	$P_{3775} = (1, 4, 8, 7)$
$P_{3641} = (1, 6, 14, 3)$	$P_{3686} = (1, 1, 4, 15)$	$P_{3731} = (1, 4, 10, 12)$	$P_{3776} = (1, 9, 11, 5)$
$P_{3642} = (1, 3, 7, 13)$	$P_{3687} = (1, 13, 6, 4)$	$P_{3732} = (1, 15, 12, 8)$	$P_{3777} = (0, 1, 15, 10)$
$P_{3643} = (1, 15, 2, 11)$	$P_{3688} = (1, 4, 9, 14)$	$P_{3733} = (1, 2, 5, 6)$	$P_{3778} = (1, 11, 13, 1)$
$P_{3644} = (1, 13, 15, 10)$	$P_{3689} = (1, 15, 14, 3)$	$P_{3734} = (1, 5, 4, 15)$	$P_{3779} = (1, 9, 10, 12)$
$P_{3645} = (1, 4, 3, 2)$	$P_{3690} = (1, 11, 7, 13)$	$P_{3735} = (1, 11, 6, 4)$	$P_{3780} = (1, 14, 12, 8)$
$P_{3646} = (1, 11, 1, 9)$	$P_{3691} = (1, 12, 2, 11)$	$P_{3736} = (1, 13, 9, 14)$	$P_{3781} = (1, 8, 5, 6)$
$P_{3647} = (1, 14, 8, 7)$	$P_{3692} = (1, 9, 15, 10)$	$P_{3737} = (1, 1, 14, 3)$	$P_{3782} = (1, 13, 4, 15)$
$P_{3648} = (1, 10, 11, 5)$	$P_{3693} = (1, 10, 3, 2)$	$P_{3738} = (1, 12, 7, 13)$	$P_{3783} = (1, 7, 6, 4)$
$P_{3649} = (0, 1, 12, 8)$	$P_{3694} = (1, 6, 1, 9)$	$P_{3739} = (1, 14, 2, 11)$	$P_{3784} = (1, 6, 9, 14)$
$P_{3650} = (1, 3, 13, 1)$	$P_{3695} = (1, 2, 8, 7)$	$P_{3740} = (1, 6, 15, 10)$	$P_{3785} = (1, 4, 14, 3)$
$P_{3651} = (1, 13, 10, 12)$	$P_{3696} = (1, 8, 11, 5)$	$P_{3741} = (1, 9, 3, 2)$	$P_{3786} = (1, 2, 7, 13)$
$P_{3652} = (1, 1, 12, 8)$	$P_{3697} = (0, 1, 6, 4)$	$P_{3742} = (1, 7, 1, 9)$	$P_{3787} = (1, 10, 2, 11)$
$P_{3653} = (1, 10, 5, 6)$	$P_{3698} = (1, 6, 13, 1)$	$P_{3743} = (1, 10, 8, 7)$	$P_{3788} = (1, 1, 15, 10)$
$P_{3654} = (1, 8, 4, 15)$	$P_{3699} = (1, 3, 10, 12)$	$P_{3744} = (1, 3, 11, 5)$	$P_{3789} = (1, 15, 3, 2)$
$P_{3655} = (1, 12, 6, 4)$	$P_{3700} = (1, 2, 12, 8)$	$P_{3745} = (0, 1, 7, 13)$	$P_{3790} = (1, 5, 1, 9)$
$P_{3656} = (1, 11, 9, 14)$	$P_{3701} = (1, 13, 5, 6)$	$P_{3746} = (1, 9, 13, 1)$	$P_{3791} = (1, 3, 8, 7)$
$P_{3657} = (1, 5, 14, 3)$	$P_{3702} = (1, 9, 4, 15)$	$P_{3747} = (1, 8, 10, 12)$	$P_{3792} = (1, 12, 11, 5)$
$P_{3658} = (1, 14, 7, 13)$	$P_{3703} = (1, 1, 6, 4)$	$P_{3748} = (1, 7, 12, 8)$	$P_{3793} = (0, 1, 3, 2)$
$P_{3659} = (1, 4, 2, 11)$	$P_{3704} = (1, 15, 9, 14)$	$P_{3749} = (1, 4, 5, 6)$	$P_{3794} = (1, 12, 13, 1)$
$P_{3660} = (1, 7, 15, 10)$	$P_{3705} = (1, 10, 14, 3)$	$P_{3750} = (1, 10, 4, 15)$	$P_{3795} = (1, 6, 10, 12)$
$P_{3661} = (1, 6, 3, 2)$	$P_{3706} = (1, 5, 7, 13)$	$P_{3751} = (1, 15, 6, 4)$	$P_{3796} = (1, 4, 12, 8)$
$P_{3662} = (1, 2, 1, 9)$	$P_{3707} = (1, 8, 2, 11)$	$P_{3752} = (1, 3, 9, 14)$	$P_{3797} = (1, 3, 5, 6)$
$P_{3663} = (1, 9, 8, 7)$	$P_{3708} = (1, 14, 15, 10)$	$P_{3753} = (1, 2, 14, 3)$	$P_{3798} = (1, 11, 4, 15)$
$P_{3664} = (1, 15, 11, 5)$	$P_{3709} = (1, 12, 3, 2)$	$P_{3754} = (1, 1, 7, 13)$	$P_{3799} = (1, 2, 6, 4)$
$P_{3665} = (0, 1, 5, 6)$	$P_{3710} = (1, 4, 1, 9)$	$P_{3755} = (1, 5, 2, 11)$	$P_{3800} = (1, 7, 9, 14)$
$P_{3666} = (1, 4, 13, 1)$	$P_{3711} = (1, 11, 8, 7)$	$P_{3756} = (1, 12, 15, 10)$	$P_{3801} = (1, 13, 14, 3)$
$P_{3667} = (1, 2, 10, 12)$	$P_{3712} = (1, 7, 11, 5)$	$P_{3757} = (1, 11, 3, 2)$	$P_{3802} = (1, 10, 7, 13)$
$P_{3668} = (1, 11, 12, 8)$	$P_{3713} = (0, 1, 9, 14)$	$P_{3758} = (1, 14, 1, 9)$	$P_{3803} = (1, 9, 2, 11)$

$P_{3804} = (1, 5, 15, 10)$	$P_{3849} = (1, 8, 14, 3)$	$P_{3894} = (1, 7, 12, 15)$	$P_{3939} = (1, 14, 7, 12)$
$P_{3805} = (1, 1, 3, 2)$	$P_{3850} = (1, 4, 7, 13)$	$P_{3895} = (1, 8, 10, 4)$	$P_{3940} = (1, 3, 13, 8)$
$P_{3806} = (1, 8, 1, 9)$	$P_{3851} = (1, 13, 2, 11)$	$P_{3896} = (1, 5, 2, 14)$	$P_{3941} = (1, 7, 15, 6)$
$P_{3807} = (1, 15, 8, 7)$	$P_{3852} = (1, 2, 15, 10)$	$P_{3897} = (1, 6, 11, 3)$	$P_{3942} = (1, 1, 12, 15)$
$P_{3808} = (1, 14, 11, 5)$	$P_{3853} = (1, 7, 3, 2)$	$P_{3898} = (1, 3, 9, 13)$	$P_{3943} = (1, 13, 10, 4)$
$P_{3809} = (0, 1, 1, 9)$	$P_{3854} = (1, 10, 1, 9)$	$P_{3899} = (1, 15, 6, 11)$	$P_{3944} = (1, 4, 2, 14)$
$P_{3810} = (1, 13, 13, 1)$	$P_{3855} = (1, 6, 8, 7)$	$P_{3900} = (1, 13, 8, 10)$	$P_{3945} = (1, 15, 11, 3)$
$P_{3811} = (1, 10, 10, 12)$	$P_{3856} = (1, 1, 11, 5)$	$P_{3901} = (1, 4, 5, 2)$	$P_{3946} = (1, 11, 9, 13)$
$P_{3812} = (1, 12, 12, 8)$	$P_{3857} = (0, 0, 1, 7)$	$P_{3902} = (1, 11, 3, 9)$	$P_{3947} = (1, 12, 6, 11)$
$P_{3813} = (1, 5, 5, 6)$	$P_{3858} = (1, 0, 14, 1)$	$P_{3903} = (1, 14, 1, 7)$	$P_{3948} = (1, 9, 8, 10)$
$P_{3814} = (1, 4, 4, 15)$	$P_{3859} = (1, 0, 7, 12)$	$P_{3904} = (1, 10, 4, 5)$	$P_{3949} = (1, 10, 5, 2)$
$P_{3815} = (1, 6, 6, 4)$	$P_{3860} = (1, 0, 13, 8)$	$P_{3905} = (0, 1, 13, 8)$	$P_{3950} = (1, 6, 3, 9)$
$P_{3816} = (1, 9, 9, 14)$	$P_{3861} = (1, 0, 15, 6)$	$P_{3906} = (1, 3, 14, 1)$	$P_{3951} = (1, 2, 1, 7)$
$P_{3817} = (1, 14, 14, 3)$	$P_{3862} = (1, 0, 12, 15)$	$P_{3907} = (1, 13, 7, 12)$	$P_{3952} = (1, 8, 4, 5)$
$P_{3818} = (1, 7, 7, 13)$	$P_{3863} = (1, 0, 10, 4)$	$P_{3908} = (1, 1, 13, 8)$	$P_{3953} = (0, 1, 10, 4)$
$P_{3819} = (1, 2, 2, 11)$	$P_{3864} = (1, 0, 2, 14)$	$P_{3909} = (1, 10, 15, 6)$	$P_{3954} = (1, 6, 14, 1)$
$P_{3820} = (1, 15, 15, 10)$	$P_{3865} = (1, 0, 11, 3)$	$P_{3910} = (1, 8, 12, 15)$	$P_{3955} = (1, 3, 7, 12)$
$P_{3821} = (1, 3, 3, 2)$	$P_{3866} = (1, 0, 9, 13)$	$P_{3911} = (1, 12, 10, 4)$	$P_{3956} = (1, 2, 13, 8)$
$P_{3822} = (1, 1, 1, 9)$	$P_{3867} = (1, 0, 6, 11)$	$P_{3912} = (1, 11, 2, 14)$	$P_{3957} = (1, 13, 15, 6)$
$P_{3823} = (1, 8, 8, 7)$	$P_{3868} = (1, 0, 8, 10)$	$P_{3913} = (1, 5, 11, 3)$	$P_{3958} = (1, 9, 12, 15)$
$P_{3824} = (1, 11, 11, 5)$	$P_{3869} = (1, 0, 5, 2)$	$P_{3914} = (1, 14, 9, 13)$	$P_{3959} = (1, 1, 10, 4)$
$P_{3825} = (0, 1, 8, 7)$	$P_{3870} = (1, 0, 3, 9)$	$P_{3915} = (1, 4, 6, 11)$	$P_{3960} = (1, 15, 2, 14)$
$P_{3826} = (1, 14, 13, 1)$	$P_{3871} = (1, 0, 1, 7)$	$P_{3916} = (1, 7, 8, 10)$	$P_{3961} = (1, 10, 11, 3)$
$P_{3827} = (1, 7, 10, 12)$	$P_{3872} = (1, 0, 4, 5)$	$P_{3917} = (1, 6, 5, 2)$	$P_{3962} = (1, 5, 9, 13)$
$P_{3828} = (1, 13, 12, 8)$	$P_{3873} = (0, 1, 14, 1)$	$P_{3918} = (1, 2, 3, 9)$	$P_{3963} = (1, 8, 6, 11)$
$P_{3829} = (1, 15, 5, 6)$	$P_{3874} = (1, 1, 14, 1)$	$P_{3919} = (1, 9, 1, 7)$	$P_{3964} = (1, 14, 8, 10)$
$P_{3830} = (1, 12, 4, 15)$	$P_{3875} = (1, 12, 7, 12)$	$P_{3920} = (1, 15, 4, 5)$	$P_{3965} = (1, 12, 5, 2)$
$P_{3831} = (1, 10, 6, 4)$	$P_{3876} = (1, 8, 13, 8)$	$P_{3921} = (0, 1, 15, 6)$	$P_{3966} = (1, 4, 3, 9)$
$P_{3832} = (1, 2, 9, 14)$	$P_{3877} = (1, 6, 15, 6)$	$P_{3922} = (1, 4, 14, 1)$	$P_{3967} = (1, 11, 1, 7)$
$P_{3833} = (1, 11, 14, 3)$	$P_{3878} = (1, 15, 12, 15)$	$P_{3923} = (1, 2, 7, 12)$	$P_{3968} = (1, 7, 4, 5)$
$P_{3834} = (1, 9, 7, 13)$	$P_{3879} = (1, 4, 10, 4)$	$P_{3924} = (1, 11, 13, 8)$	$P_{3969} = (0, 1, 2, 14)$
$P_{3835} = (1, 6, 2, 11)$	$P_{3880} = (1, 14, 2, 14)$	$P_{3925} = (1, 1, 15, 6)$	$P_{3970} = (1, 7, 14, 1)$
$P_{3836} = (1, 8, 15, 10)$	$P_{3881} = (1, 3, 11, 3)$	$P_{3926} = (1, 14, 12, 15)$	$P_{3971} = (1, 15, 7, 12)$
$P_{3837} = (1, 5, 3, 2)$	$P_{3882} = (1, 13, 9, 13)$	$P_{3927} = (1, 9, 10, 4)$	$P_{3972} = (1, 10, 13, 8)$
$P_{3838} = (1, 3, 1, 9)$	$P_{3883} = (1, 11, 6, 11)$	$P_{3928} = (1, 10, 2, 14)$	$P_{3973} = (1, 11, 15, 6)$
$P_{3839} = (1, 1, 8, 7)$	$P_{3884} = (1, 10, 8, 10)$	$P_{3929} = (1, 12, 11, 3)$	$P_{3974} = (1, 6, 12, 15)$
$P_{3840} = (1, 4, 11, 5)$	$P_{3885} = (1, 2, 5, 2)$	$P_{3930} = (1, 6, 9, 13)$	$P_{3975} = (1, 5, 10, 4)$
$P_{3841} = (0, 1, 11, 5)$	$P_{3886} = (1, 9, 3, 9)$	$P_{3931} = (1, 7, 6, 11)$	$P_{3976} = (1, 1, 2, 14)$
$P_{3842} = (1, 15, 13, 1)$	$P_{3887} = (1, 7, 1, 7)$	$P_{3932} = (1, 3, 8, 10)$	$P_{3977} = (1, 9, 11, 3)$
$P_{3843} = (1, 11, 10, 12)$	$P_{3888} = (1, 5, 4, 5)$	$P_{3933} = (1, 8, 5, 2)$	$P_{3978} = (1, 8, 9, 13)$
$P_{3844} = (1, 5, 12, 8)$	$P_{3889} = (0, 1, 7, 12)$	$P_{3934} = (1, 15, 3, 9)$	$P_{3979} = (1, 3, 6, 11)$
$P_{3845} = (1, 9, 5, 6)$	$P_{3890} = (1, 2, 14, 1)$	$P_{3935} = (1, 5, 1, 7)$	$P_{3980} = (1, 4, 8, 10)$
$P_{3846} = (1, 3, 4, 15)$	$P_{3891} = (1, 1, 7, 12)$	$P_{3936} = (1, 13, 4, 5)$	$P_{3981} = (1, 14, 5, 2)$
$P_{3847} = (1, 14, 6, 4)$	$P_{3892} = (1, 9, 13, 8)$	$P_{3937} = (0, 1, 12, 15)$	$P_{3982} = (1, 13, 3, 9)$
$P_{3848} = (1, 12, 9, 14)$	$P_{3893} = (1, 12, 15, 6)$	$P_{3938} = (1, 5, 14, 1)$	$P_{3983} = (1, 12, 1, 7)$

$P_{3984} = (1, 2, 4, 5)$	$P_{4029} = (1, 13, 5, 2)$	$P_{4074} = (1, 7, 9, 13)$	$P_{4119} = (1, 0, 14, 4)$
$P_{3985} = (0, 1, 11, 3)$	$P_{4030} = (1, 12, 3, 9)$	$P_{4075} = (1, 2, 6, 11)$	$P_{4120} = (1, 0, 12, 14)$
$P_{3986} = (1, 8, 14, 1)$	$P_{4031} = (1, 4, 1, 7)$	$P_{4076} = (1, 15, 8, 10)$	$P_{4121} = (1, 0, 8, 3)$
$P_{3987} = (1, 4, 7, 12)$	$P_{4032} = (1, 9, 4, 5)$	$P_{4077} = (1, 3, 5, 2)$	$P_{4122} = (1, 0, 4, 13)$
$P_{3988} = (1, 15, 13, 8)$	$P_{4033} = (0, 1, 8, 10)$	$P_{4078} = (1, 1, 3, 9)$	$P_{4123} = (1, 0, 13, 11)$
$P_{3989} = (1, 2, 15, 6)$	$P_{4034} = (1, 11, 14, 1)$	$P_{4079} = (1, 8, 1, 7)$	$P_{4124} = (1, 0, 2, 10)$
$P_{3990} = (1, 5, 12, 15)$	$P_{4035} = (1, 9, 7, 12)$	$P_{4080} = (1, 11, 4, 5)$	$P_{4125} = (1, 0, 7, 2)$
$P_{3991} = (1, 11, 10, 4)$	$P_{4036} = (1, 14, 13, 8)$	$P_{4081} = (0, 1, 1, 7)$	$P_{4126} = (1, 0, 10, 9)$
$P_{3992} = (1, 13, 2, 14)$	$P_{4037} = (1, 8, 15, 6)$	$P_{4082} = (1, 14, 14, 1)$	$P_{4127} = (1, 0, 6, 7)$
$P_{3993} = (1, 1, 11, 3)$	$P_{4038} = (1, 13, 12, 15)$	$P_{4083} = (1, 7, 7, 12)$	$P_{4128} = (1, 0, 1, 5)$
$P_{3994} = (1, 12, 9, 13)$	$P_{4039} = (1, 7, 10, 4)$	$P_{4084} = (1, 13, 13, 8)$	$P_{4129} = (0, 1, 15, 1)$
$P_{3995} = (1, 14, 6, 11)$	$P_{4040} = (1, 6, 2, 14)$	$P_{4085} = (1, 15, 15, 6)$	$P_{4130} = (1, 1, 15, 1)$
$P_{3996} = (1, 6, 8, 10)$	$P_{4041} = (1, 4, 11, 3)$	$P_{4086} = (1, 12, 12, 15)$	$P_{4131} = (1, 12, 11, 12)$
$P_{3997} = (1, 9, 5, 2)$	$P_{4042} = (1, 2, 9, 13)$	$P_{4087} = (1, 10, 10, 4)$	$P_{4132} = (1, 8, 5, 8)$
$P_{3998} = (1, 7, 3, 9)$	$P_{4043} = (1, 10, 6, 11)$	$P_{4088} = (1, 2, 2, 14)$	$P_{4133} = (1, 6, 9, 6)$
$P_{3999} = (1, 10, 1, 7)$	$P_{4044} = (1, 1, 8, 10)$	$P_{4089} = (1, 11, 11, 3)$	$P_{4134} = (1, 15, 3, 15)$
$P_{4000} = (1, 3, 4, 5)$	$P_{4045} = (1, 15, 5, 2)$	$P_{4090} = (1, 9, 9, 13)$	$P_{4135} = (1, 4, 14, 4)$
$P_{4001} = (0, 1, 9, 13)$	$P_{4046} = (1, 5, 3, 9)$	$P_{4091} = (1, 6, 6, 11)$	$P_{4136} = (1, 14, 12, 14)$
$P_{4002} = (1, 9, 14, 1)$	$P_{4047} = (1, 3, 1, 7)$	$P_{4092} = (1, 8, 8, 10)$	$P_{4137} = (1, 3, 8, 3)$
$P_{4003} = (1, 8, 7, 12)$	$P_{4048} = (1, 12, 4, 5)$	$P_{4093} = (1, 5, 5, 2)$	$P_{4138} = (1, 13, 4, 13)$
$P_{4004} = (1, 7, 13, 8)$	$P_{4049} = (0, 1, 5, 2)$	$P_{4094} = (1, 3, 3, 9)$	$P_{4139} = (1, 11, 13, 11)$
$P_{4005} = (1, 4, 15, 6)$	$P_{4050} = (1, 12, 14, 1)$	$P_{4095} = (1, 1, 1, 7)$	$P_{4140} = (1, 10, 2, 10)$
$P_{4006} = (1, 10, 12, 15)$	$P_{4051} = (1, 6, 7, 12)$	$P_{4096} = (1, 4, 4, 5)$	$P_{4141} = (1, 2, 7, 2)$
$P_{4007} = (1, 15, 10, 4)$	$P_{4052} = (1, 4, 13, 8)$	$P_{4097} = (0, 1, 4, 5)$	$P_{4142} = (1, 9, 10, 9)$
$P_{4008} = (1, 3, 2, 14)$	$P_{4053} = (1, 3, 15, 6)$	$P_{4098} = (1, 15, 14, 1)$	$P_{4143} = (1, 7, 6, 7)$
$P_{4009} = (1, 2, 11, 3)$	$P_{4054} = (1, 11, 12, 15)$	$P_{4099} = (1, 11, 7, 12)$	$P_{4144} = (1, 5, 1, 5)$
$P_{4010} = (1, 1, 9, 13)$	$P_{4055} = (1, 2, 10, 4)$	$P_{4100} = (1, 5, 13, 8)$	$P_{4145} = (0, 1, 11, 12)$
$P_{4011} = (1, 5, 6, 11)$	$P_{4056} = (1, 7, 2, 14)$	$P_{4101} = (1, 9, 15, 6)$	$P_{4146} = (1, 2, 15, 1)$
$P_{4012} = (1, 12, 8, 10)$	$P_{4057} = (1, 13, 11, 3)$	$P_{4102} = (1, 3, 12, 15)$	$P_{4147} = (1, 1, 11, 12)$
$P_{4013} = (1, 11, 5, 2)$	$P_{4058} = (1, 10, 9, 13)$	$P_{4103} = (1, 14, 10, 4)$	$P_{4148} = (1, 9, 5, 8)$
$P_{4014} = (1, 14, 3, 9)$	$P_{4059} = (1, 9, 6, 11)$	$P_{4104} = (1, 12, 2, 14)$	$P_{4149} = (1, 12, 9, 6)$
$P_{4015} = (1, 13, 1, 7)$	$P_{4060} = (1, 5, 8, 10)$	$P_{4105} = (1, 8, 11, 3)$	$P_{4150} = (1, 7, 3, 15)$
$P_{4016} = (1, 6, 4, 5)$	$P_{4061} = (1, 1, 5, 2)$	$P_{4106} = (1, 4, 9, 13)$	$P_{4151} = (1, 8, 14, 4)$
$P_{4017} = (0, 1, 6, 11)$	$P_{4062} = (1, 8, 3, 9)$	$P_{4107} = (1, 13, 6, 11)$	$P_{4152} = (1, 5, 12, 14)$
$P_{4018} = (1, 10, 14, 1)$	$P_{4063} = (1, 15, 1, 7)$	$P_{4108} = (1, 2, 8, 10)$	$P_{4153} = (1, 6, 8, 3)$
$P_{4019} = (1, 5, 7, 12)$	$P_{4064} = (1, 14, 4, 5)$	$P_{4109} = (1, 7, 5, 2)$	$P_{4154} = (1, 3, 4, 13)$
$P_{4020} = (1, 6, 13, 8)$	$P_{4065} = (0, 1, 3, 9)$	$P_{4110} = (1, 10, 3, 9)$	$P_{4155} = (1, 15, 13, 11)$
$P_{4021} = (1, 14, 15, 6)$	$P_{4066} = (1, 13, 14, 1)$	$P_{4111} = (1, 6, 1, 7)$	$P_{4156} = (1, 13, 2, 10)$
$P_{4022} = (1, 2, 12, 15)$	$P_{4067} = (1, 10, 7, 12)$	$P_{4112} = (1, 1, 4, 5)$	$P_{4157} = (1, 4, 7, 2)$
$P_{4023} = (1, 3, 10, 4)$	$P_{4068} = (1, 12, 13, 8)$	$P_{4113} = (0, 0, 1, 5)$	$P_{4158} = (1, 11, 10, 9)$
$P_{4024} = (1, 8, 2, 14)$	$P_{4069} = (1, 5, 15, 6)$	$P_{4114} = (1, 0, 15, 1)$	$P_{4159} = (1, 14, 6, 7)$
$P_{4025} = (1, 7, 11, 3)$	$P_{4070} = (1, 4, 12, 15)$	$P_{4115} = (1, 0, 11, 12)$	$P_{4160} = (1, 10, 1, 5)$
$P_{4026} = (1, 15, 9, 13)$	$P_{4071} = (1, 6, 10, 4)$	$P_{4116} = (1, 0, 5, 8)$	$P_{4161} = (0, 1, 5, 8)$
$P_{4027} = (1, 1, 6, 11)$	$P_{4072} = (1, 9, 2, 14)$	$P_{4117} = (1, 0, 9, 6)$	$P_{4162} = (1, 3, 15, 1)$
$P_{4028} = (1, 11, 8, 10)$	$P_{4073} = (1, 14, 11, 3)$	$P_{4118} = (1, 0, 3, 15)$	$P_{4163} = (1, 13, 11, 12)$

$P_{4164} = (1, 1, 5, 8)$	$P_{4209} = (0, 1, 14, 4)$	$P_{4254} = (1, 7, 10, 9)$	$P_{4299} = (1, 10, 13, 11)$
$P_{4165} = (1, 10, 9, 6)$	$P_{4210} = (1, 6, 15, 1)$	$P_{4255} = (1, 10, 6, 7)$	$P_{4300} = (1, 1, 2, 10)$
$P_{4166} = (1, 8, 3, 15)$	$P_{4211} = (1, 3, 11, 12)$	$P_{4256} = (1, 3, 1, 5)$	$P_{4301} = (1, 15, 7, 2)$
$P_{4167} = (1, 12, 14, 4)$	$P_{4212} = (1, 2, 5, 8)$	$P_{4257} = (0, 1, 4, 13)$	$P_{4302} = (1, 5, 10, 9)$
$P_{4168} = (1, 11, 12, 14)$	$P_{4213} = (1, 13, 9, 6)$	$P_{4258} = (1, 9, 15, 1)$	$P_{4303} = (1, 3, 6, 7)$
$P_{4169} = (1, 5, 8, 3)$	$P_{4214} = (1, 9, 3, 15)$	$P_{4259} = (1, 8, 11, 12)$	$P_{4304} = (1, 12, 1, 5)$
$P_{4170} = (1, 14, 4, 13)$	$P_{4215} = (1, 1, 14, 4)$	$P_{4260} = (1, 7, 5, 8)$	$P_{4305} = (0, 1, 7, 2)$
$P_{4171} = (1, 4, 13, 11)$	$P_{4216} = (1, 15, 12, 14)$	$P_{4261} = (1, 4, 9, 6)$	$P_{4306} = (1, 12, 15, 1)$
$P_{4172} = (1, 7, 2, 10)$	$P_{4217} = (1, 10, 8, 3)$	$P_{4262} = (1, 10, 3, 15)$	$P_{4307} = (1, 6, 11, 12)$
$P_{4173} = (1, 6, 7, 2)$	$P_{4218} = (1, 5, 4, 13)$	$P_{4263} = (1, 15, 14, 4)$	$P_{4308} = (1, 4, 5, 8)$
$P_{4174} = (1, 2, 10, 9)$	$P_{4219} = (1, 8, 13, 11)$	$P_{4264} = (1, 3, 12, 14)$	$P_{4309} = (1, 3, 9, 6)$
$P_{4175} = (1, 9, 6, 7)$	$P_{4220} = (1, 14, 2, 10)$	$P_{4265} = (1, 2, 8, 3)$	$P_{4310} = (1, 11, 3, 15)$
$P_{4176} = (1, 15, 1, 5)$	$P_{4221} = (1, 12, 7, 2)$	$P_{4266} = (1, 1, 4, 13)$	$P_{4311} = (1, 2, 14, 4)$
$P_{4177} = (0, 1, 9, 6)$	$P_{4222} = (1, 4, 10, 9)$	$P_{4267} = (1, 5, 13, 11)$	$P_{4312} = (1, 7, 12, 14)$
$P_{4178} = (1, 4, 15, 1)$	$P_{4223} = (1, 11, 6, 7)$	$P_{4268} = (1, 12, 2, 10)$	$P_{4313} = (1, 13, 8, 3)$
$P_{4179} = (1, 2, 11, 12)$	$P_{4224} = (1, 7, 1, 5)$	$P_{4269} = (1, 11, 7, 2)$	$P_{4314} = (1, 10, 4, 13)$
$P_{4180} = (1, 11, 5, 8)$	$P_{4225} = (0, 1, 12, 14)$	$P_{4270} = (1, 14, 10, 9)$	$P_{4315} = (1, 9, 13, 11)$
$P_{4181} = (1, 1, 9, 6)$	$P_{4226} = (1, 7, 15, 1)$	$P_{4271} = (1, 13, 6, 7)$	$P_{4316} = (1, 5, 2, 10)$
$P_{4182} = (1, 14, 3, 15)$	$P_{4227} = (1, 15, 11, 12)$	$P_{4272} = (1, 6, 1, 5)$	$P_{4317} = (1, 1, 7, 2)$
$P_{4183} = (1, 9, 14, 4)$	$P_{4228} = (1, 10, 5, 8)$	$P_{4273} = (0, 1, 13, 11)$	$P_{4318} = (1, 8, 10, 9)$
$P_{4184} = (1, 10, 12, 14)$	$P_{4229} = (1, 11, 9, 6)$	$P_{4274} = (1, 10, 15, 1)$	$P_{4319} = (1, 15, 6, 7)$
$P_{4185} = (1, 12, 8, 3)$	$P_{4230} = (1, 6, 3, 15)$	$P_{4275} = (1, 5, 11, 12)$	$P_{4320} = (1, 14, 1, 5)$
$P_{4186} = (1, 6, 4, 13)$	$P_{4231} = (1, 5, 14, 4)$	$P_{4276} = (1, 6, 5, 8)$	$P_{4321} = (0, 1, 10, 9)$
$P_{4187} = (1, 7, 13, 11)$	$P_{4232} = (1, 1, 12, 14)$	$P_{4277} = (1, 14, 9, 6)$	$P_{4322} = (1, 13, 15, 1)$
$P_{4188} = (1, 3, 2, 10)$	$P_{4233} = (1, 9, 8, 3)$	$P_{4278} = (1, 2, 3, 15)$	$P_{4323} = (1, 10, 11, 12)$
$P_{4189} = (1, 8, 7, 2)$	$P_{4234} = (1, 8, 4, 13)$	$P_{4279} = (1, 3, 14, 4)$	$P_{4324} = (1, 12, 5, 8)$
$P_{4190} = (1, 15, 10, 9)$	$P_{4235} = (1, 3, 13, 11)$	$P_{4280} = (1, 8, 12, 14)$	$P_{4325} = (1, 5, 9, 6)$
$P_{4191} = (1, 5, 6, 7)$	$P_{4236} = (1, 4, 2, 10)$	$P_{4281} = (1, 7, 8, 3)$	$P_{4326} = (1, 4, 3, 15)$
$P_{4192} = (1, 13, 1, 5)$	$P_{4237} = (1, 14, 7, 2)$	$P_{4282} = (1, 15, 4, 13)$	$P_{4327} = (1, 6, 14, 4)$
$P_{4193} = (0, 1, 3, 15)$	$P_{4238} = (1, 13, 10, 9)$	$P_{4283} = (1, 1, 13, 11)$	$P_{4328} = (1, 9, 12, 14)$
$P_{4194} = (1, 5, 15, 1)$	$P_{4239} = (1, 12, 6, 7)$	$P_{4284} = (1, 11, 2, 10)$	$P_{4329} = (1, 14, 8, 3)$
$P_{4195} = (1, 14, 11, 12)$	$P_{4240} = (1, 2, 1, 5)$	$P_{4285} = (1, 13, 7, 2)$	$P_{4330} = (1, 7, 4, 13)$
$P_{4196} = (1, 3, 5, 8)$	$P_{4241} = (0, 1, 8, 3)$	$P_{4286} = (1, 12, 10, 9)$	$P_{4331} = (1, 2, 13, 11)$
$P_{4197} = (1, 7, 9, 6)$	$P_{4242} = (1, 8, 15, 1)$	$P_{4287} = (1, 4, 6, 7)$	$P_{4332} = (1, 15, 2, 10)$
$P_{4198} = (1, 1, 3, 15)$	$P_{4243} = (1, 4, 11, 12)$	$P_{4288} = (1, 9, 1, 5)$	$P_{4333} = (1, 3, 7, 2)$
$P_{4199} = (1, 13, 14, 4)$	$P_{4244} = (1, 15, 5, 8)$	$P_{4289} = (0, 1, 2, 10)$	$P_{4334} = (1, 1, 10, 9)$
$P_{4200} = (1, 4, 12, 14)$	$P_{4245} = (1, 2, 9, 6)$	$P_{4290} = (1, 11, 15, 1)$	$P_{4335} = (1, 8, 6, 7)$
$P_{4201} = (1, 15, 8, 3)$	$P_{4246} = (1, 5, 3, 15)$	$P_{4291} = (1, 9, 11, 12)$	$P_{4336} = (1, 11, 1, 5)$
$P_{4202} = (1, 11, 4, 13)$	$P_{4247} = (1, 11, 14, 4)$	$P_{4292} = (1, 14, 5, 8)$	$P_{4337} = (0, 1, 6, 7)$
$P_{4203} = (1, 12, 13, 11)$	$P_{4248} = (1, 13, 12, 14)$	$P_{4293} = (1, 8, 9, 6)$	$P_{4338} = (1, 14, 15, 1)$
$P_{4204} = (1, 9, 2, 10)$	$P_{4249} = (1, 1, 8, 3)$	$P_{4294} = (1, 13, 3, 15)$	$P_{4339} = (1, 7, 11, 12)$
$P_{4205} = (1, 10, 7, 2)$	$P_{4250} = (1, 12, 4, 13)$	$P_{4295} = (1, 7, 14, 4)$	$P_{4340} = (1, 13, 5, 8)$
$P_{4206} = (1, 6, 10, 9)$	$P_{4251} = (1, 14, 13, 11)$	$P_{4296} = (1, 6, 12, 14)$	$P_{4341} = (1, 15, 9, 6)$
$P_{4207} = (1, 2, 6, 7)$	$P_{4252} = (1, 6, 2, 10)$	$P_{4297} = (1, 4, 8, 3)$	$P_{4342} = (1, 12, 3, 15)$
$P_{4208} = (1, 8, 1, 5)$	$P_{4253} = (1, 9, 7, 2)$	$P_{4298} = (1, 2, 4, 13)$	$P_{4343} = (1, 10, 14, 4)$

$P_{4344} = (1, 2, 12, 14)$	$P_{4351} = (1, 1, 6, 7)$	$P_{4358} = (1, 3, 3, 15)$	$P_{4365} = (1, 7, 7, 2)$
$P_{4345} = (1, 11, 8, 3)$	$P_{4352} = (1, 4, 1, 5)$	$P_{4359} = (1, 14, 14, 4)$	$P_{4366} = (1, 10, 10, 9)$
$P_{4346} = (1, 9, 4, 13)$	$P_{4353} = (0, 1, 1, 5)$	$P_{4360} = (1, 12, 12, 14)$	$P_{4367} = (1, 6, 6, 7)$
$P_{4347} = (1, 6, 13, 11)$	$P_{4354} = (1, 15, 15, 1)$	$P_{4361} = (1, 8, 8, 3)$	$P_{4368} = (1, 1, 1, 5)$
$P_{4348} = (1, 8, 2, 10)$	$P_{4355} = (1, 11, 11, 12)$	$P_{4362} = (1, 4, 4, 13)$	
$P_{4349} = (1, 5, 7, 2)$	$P_{4356} = (1, 5, 5, 8)$	$P_{4363} = (1, 13, 13, 11)$	
$P_{4350} = (1, 3, 10, 9)$	$P_{4357} = (1, 9, 9, 6)$	$P_{4364} = (1, 2, 2, 10)$	

The lines of $\text{PG}(3, 16)$

$\text{PG}(3, 16)$ has 70161 1-subspaces:

Too many to print

$\text{PG}(3, 16)$ has the following low weight Pluecker lines:

$$L_0 = \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \end{bmatrix} = \mathbf{Pl}(1, 0, 0, 0, 0, 0)$$

$$L_{256} = \begin{bmatrix} 1, 0, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} = \mathbf{Pl}(0, 0, 1, 0, 0, 0)$$

$$L_{272} = \begin{bmatrix} 1, 0, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} = \mathbf{Pl}(0, 0, 0, 0, 1, 0)$$

$$L_{69888} = \begin{bmatrix} 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} = \mathbf{Pl}(0, 0, 0, 0, 0, 1)$$

$$L_{69904} = \begin{bmatrix} 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} = \mathbf{Pl}(0, 0, 0, 1, 0, 0)$$

$$L_{70160} = \begin{bmatrix} 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} = \mathbf{Pl}(0, 1, 0, 0, 0, 0)$$

The planes of PG(3, 16)

PG(3, 16) has 4369 2-subspaces:

$$\begin{aligned}
 L_0 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
 L_1 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
 L_2 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
 L_3 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
 L_4 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
 L_5 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
 L_6 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
 L_7 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
 L_8 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
 L_9 &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
 L_{10} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
 L_{11} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
 L_{12} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix}
 \end{aligned}$$

$$\begin{aligned}
L_{13} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{14} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{15} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{16} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{17} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{18} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{19} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{20} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{21} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{22} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{23} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{24} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{25} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{26} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{27} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{28} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{29} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{30} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{31} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{32} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{33} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{34} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{35} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{36} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{37} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{38} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{39} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{40} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{41} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{42} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{43} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{44} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{45} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{46} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{47} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{48} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{49} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{50} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{51} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{52} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{53} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{54} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{55} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{56} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{57} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{58} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{59} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{60} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{61} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{62} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{63} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{64} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{65} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{66} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{67} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{68} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{69} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{70} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{71} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{72} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{73} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{74} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{75} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{76} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{77} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{78} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{79} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{80} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{81} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{82} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{83} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{84} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{85} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{86} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{87} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{88} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{89} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{90} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{91} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{92} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{93} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{94} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{95} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{96} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{97} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{98} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{99} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{100} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{101} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{102} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{103} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{104} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{105} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{106} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{107} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{108} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{109} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{110} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{111} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{112} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{113} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{114} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{115} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{116} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{117} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{118} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{119} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{120} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{121} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{122} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{123} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{124} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{125} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{126} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{127} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{128} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{129} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{130} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{131} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{132} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{133} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{134} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{135} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{136} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{137} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{138} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{139} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{140} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{141} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{142} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{143} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{144} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{145} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{146} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{147} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{148} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{149} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{150} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{151} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{152} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{153} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{154} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{155} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{156} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{157} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{158} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{159} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{160} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{161} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{162} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{163} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{164} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{165} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{166} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{167} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{168} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{169} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{170} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{171} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{172} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{173} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{174} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{175} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{176} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{177} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{178} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{179} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{180} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{181} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{182} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{183} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{184} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{185} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{186} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{187} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{188} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{189} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{190} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{191} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{192} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{193} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{194} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{195} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{196} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{197} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{198} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{199} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{200} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{201} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{202} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{203} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{204} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{205} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{206} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{207} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{208} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{209} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{210} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{211} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{212} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{213} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{214} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{215} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{216} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{217} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{218} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{219} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{220} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{221} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{222} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{223} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{224} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{225} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{226} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{227} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{228} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{229} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{230} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{231} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{232} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{233} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{234} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{235} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{236} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{237} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{238} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{239} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{240} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{241} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{242} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{243} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{244} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{245} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{246} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{247} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{248} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{249} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{250} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{251} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{252} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{253} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{254} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{255} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{256} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{257} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{258} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{259} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{260} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{261} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{262} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{263} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{264} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{265} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{266} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{267} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{268} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{269} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{270} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{271} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{272} &= \begin{bmatrix} 1, 0, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{273} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{274} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{275} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{276} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{277} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{278} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{279} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{280} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{281} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{282} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{283} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{284} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{285} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{286} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{287} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{288} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{289} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{290} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{291} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{292} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{293} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{294} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{295} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{296} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{297} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{298} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{299} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{300} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{301} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{302} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{303} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{304} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{305} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{306} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{307} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{308} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{309} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{310} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{311} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{312} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{313} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{314} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{315} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{316} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{317} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{318} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{319} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{320} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{321} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{322} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{323} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{324} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{325} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{326} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{327} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{328} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{329} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{330} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{331} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{332} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{333} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{334} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{335} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{336} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{337} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{338} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{339} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{340} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{341} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{342} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{343} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{344} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{345} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{346} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{347} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{348} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{349} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{350} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{351} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{352} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{353} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{354} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{355} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{356} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{357} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{358} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{359} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{360} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{361} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{362} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{363} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{364} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{365} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{366} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{367} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{368} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{369} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{370} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{371} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{372} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{373} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{374} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{375} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{376} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{377} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{378} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{379} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{380} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{381} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{382} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{383} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{384} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{385} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{386} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{387} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{388} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{389} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{390} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{391} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{392} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{393} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{394} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{395} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{396} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{397} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{398} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{399} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{400} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{401} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{402} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{403} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{404} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{405} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{406} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{407} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{408} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{409} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{410} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{411} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{412} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{413} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{414} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{415} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{416} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{417} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{418} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{419} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{420} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{421} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{422} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{423} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{424} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{425} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{426} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{427} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{428} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{429} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{430} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{431} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{432} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{433} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{434} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{435} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{436} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{437} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{438} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{439} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{440} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{441} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{442} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{443} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{444} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{445} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{446} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{447} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{448} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{449} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{450} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{451} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{452} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{453} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{454} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{455} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{456} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{457} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{458} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{459} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{460} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{461} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{462} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{463} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{464} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{465} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{466} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{467} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{468} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{469} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{470} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{471} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{472} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{473} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{474} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{475} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{476} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{477} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{478} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{479} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{480} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{481} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{482} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{483} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{484} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{485} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{486} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{487} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{488} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{489} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{490} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{491} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{492} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{493} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{494} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{495} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{496} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{497} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{498} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{499} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{500} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{501} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{502} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{503} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{504} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{505} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{506} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{507} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{508} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{509} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{510} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{511} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{512} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{513} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{514} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{515} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{516} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{517} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{518} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{519} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{520} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{521} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{522} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{523} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{524} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{525} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{526} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{527} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{528} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{529} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{530} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{531} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{532} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{533} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{534} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{535} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{536} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{537} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{538} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{539} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{540} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{541} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{542} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{543} &= \begin{bmatrix} 1, 0, 0, 1 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{544} &= \begin{bmatrix} 1, 0, 1, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{545} &= \begin{bmatrix} 1, 1, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{546} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{547} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{548} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{549} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{550} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{551} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{552} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{553} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{554} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{555} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{556} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{557} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{558} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{559} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{560} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{561} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{562} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{563} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{564} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{565} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{566} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{567} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{568} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{569} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{570} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{571} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{572} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{573} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{574} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{575} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{576} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{577} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{578} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{579} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{580} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{581} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{582} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{583} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{584} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{585} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{586} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{587} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{588} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{589} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{590} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{591} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{592} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{593} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{594} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{595} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{596} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{597} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{598} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{599} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{600} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{601} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{602} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{603} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{604} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{605} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{606} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{607} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{608} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{609} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{610} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{611} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{612} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{613} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{614} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{615} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{616} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{617} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{618} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{619} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{620} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{621} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{622} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{623} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{624} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{625} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{626} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{627} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{628} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{629} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{630} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{631} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{632} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{633} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{634} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{635} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{636} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{637} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{638} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{639} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{640} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{641} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{642} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{643} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{644} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{645} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{646} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{647} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{648} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{649} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{650} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{651} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{652} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{653} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{654} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{655} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{656} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{657} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{658} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{659} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{660} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{661} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{662} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{663} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{664} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{665} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{666} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{667} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{668} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{669} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{670} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{671} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{672} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{673} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{674} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{675} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{676} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{677} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{678} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{679} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{680} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{681} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{682} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{683} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{684} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{685} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{686} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{687} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{688} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{689} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{690} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{691} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{692} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{693} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{694} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{695} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{696} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{697} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{698} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{699} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{700} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{701} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{702} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{703} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{704} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{705} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{706} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{707} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{708} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{709} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{710} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{711} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{712} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{713} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{714} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{715} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{716} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{717} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{718} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{719} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{720} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{721} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{722} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{723} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{724} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{725} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{726} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{727} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{728} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{729} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{730} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{731} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{732} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{733} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{734} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{735} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{736} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{737} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{738} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{739} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{740} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{741} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{742} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{743} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{744} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{745} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{746} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{747} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{748} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{749} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{750} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{751} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{752} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{753} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{754} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{755} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{756} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{757} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{758} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{759} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{760} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{761} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{762} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{763} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{764} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{765} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{766} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{767} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{768} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{769} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{770} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{771} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{772} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{773} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{774} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{775} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{776} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{777} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{778} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{779} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{780} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{781} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{782} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{783} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{784} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{785} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{786} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{787} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{788} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{789} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{790} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{791} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{792} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{793} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{794} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{795} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{796} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{797} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{798} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{799} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{800} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{801} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{802} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{803} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{804} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{805} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{806} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{807} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{808} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{809} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{810} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{811} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{812} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{813} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{814} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{815} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{816} &= \begin{bmatrix} 1, 0, 0, 2 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{817} &= \begin{bmatrix} 1, 0, 2, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{818} &= \begin{bmatrix} 1, 2, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{819} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{820} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{821} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{822} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{823} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{824} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{825} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{826} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{827} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{828} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{829} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{830} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{831} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{832} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{833} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{834} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{835} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{836} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{837} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{838} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{839} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{840} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{841} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{842} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{843} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{844} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{845} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{846} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{847} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{848} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{849} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{850} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{851} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{852} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{853} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{854} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{855} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{856} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{857} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{858} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{859} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{860} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{861} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{862} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{863} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{864} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{865} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{866} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{867} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{868} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{869} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{870} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{871} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{872} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{873} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{874} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{875} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{876} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{877} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{878} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{879} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{880} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{881} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{882} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{883} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{884} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{885} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{886} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{887} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{888} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{889} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{890} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{891} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{892} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{893} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{894} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{895} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{896} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{897} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{898} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{899} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{900} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{901} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{902} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{903} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{904} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{905} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{906} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{907} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{908} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{909} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{910} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{911} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{912} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{913} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{914} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{915} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{916} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{917} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{918} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{919} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{920} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{921} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{922} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{923} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{924} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{925} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{926} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{927} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{928} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{929} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{930} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{931} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{932} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{933} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{934} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{935} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{936} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{937} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{938} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{939} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{940} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{941} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{942} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{943} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{944} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{945} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{946} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{947} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{948} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{949} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{950} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{951} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{952} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{953} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{954} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{955} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{956} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{957} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{958} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{959} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{960} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{961} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{962} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{963} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{964} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{965} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{966} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{967} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{968} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{969} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{970} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{971} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{972} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{973} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{974} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{975} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{976} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{977} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{978} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{979} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{980} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{981} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{982} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{983} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{984} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{985} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{986} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{987} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{988} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{989} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{990} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{991} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{992} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{993} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{994} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{995} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{996} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{997} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{998} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{999} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1000} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1001} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1002} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1003} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1004} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1005} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1006} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1007} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1008} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1009} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1010} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1011} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1012} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1013} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1014} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1015} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1016} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1017} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1018} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1019} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1020} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1021} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1022} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1023} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1024} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1025} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1026} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1027} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1028} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1029} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1030} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1031} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1032} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1033} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1034} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1035} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1036} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1037} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1038} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1039} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1040} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1041} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1042} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1043} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1044} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1045} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1046} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1047} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1048} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1049} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1050} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1051} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1052} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1053} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1054} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1055} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1056} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1057} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1058} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1059} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1060} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1061} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1062} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1063} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1064} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1065} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1066} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1067} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1068} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1069} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1070} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1071} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1072} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1073} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1074} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1075} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1076} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1077} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1078} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1079} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1080} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1081} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1082} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1083} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1084} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1085} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1086} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1087} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1088} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1089} &= \begin{bmatrix} 1, 0, 0, 3 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1090} &= \begin{bmatrix} 1, 0, 3, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1091} &= \begin{bmatrix} 1, 3, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1092} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1093} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1094} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1095} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1096} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1097} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1098} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1099} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1100} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1101} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1102} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1103} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1104} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1105} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1106} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1107} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1108} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1109} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1110} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1111} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1112} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1113} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1114} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1115} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1116} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1117} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1118} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1119} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1120} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1121} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1122} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1123} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1124} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1125} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1126} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1127} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1128} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1129} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1130} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1131} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1132} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1133} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1134} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1135} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1136} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1137} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1138} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1139} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1140} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1141} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1142} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1143} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1144} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1145} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1146} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1147} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1148} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1149} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1150} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1151} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1152} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1153} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1154} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1155} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1156} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1157} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1158} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1159} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1160} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1161} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1162} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1163} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1164} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1165} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1166} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1167} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1168} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1169} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1170} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1171} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1172} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1173} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1174} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1175} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1176} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1177} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1178} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1179} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1180} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1181} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1182} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1183} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1184} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1185} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1186} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1187} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1188} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1189} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1190} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1191} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1192} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1193} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1194} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1195} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1196} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1197} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1198} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1199} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1200} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1201} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1202} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1203} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1204} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1205} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1206} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1207} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1208} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1209} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1210} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1211} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1212} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1213} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1214} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1215} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1216} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1217} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1218} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1219} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1220} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1221} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1222} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1223} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1224} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1225} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1226} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1227} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1228} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1229} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1230} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1231} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1232} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1233} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1234} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1235} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1236} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1237} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1238} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1239} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1240} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1241} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1242} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1243} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1244} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1245} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1246} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1247} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1248} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1249} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1250} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1251} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1252} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1253} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1254} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1255} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1256} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1257} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1258} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1259} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1260} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1261} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1262} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1263} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1264} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1265} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1266} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1267} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1268} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1269} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1270} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1271} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1272} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1273} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1274} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1275} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1276} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1277} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1278} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1279} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1280} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1281} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1282} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1283} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1284} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1285} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1286} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1287} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1288} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1289} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1290} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1291} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1292} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1293} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1294} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1295} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1296} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1297} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1298} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1299} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1300} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1301} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1302} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1303} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1304} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1305} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1306} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1307} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1308} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1309} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1310} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1311} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1312} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1313} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1314} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1315} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1316} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1317} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1318} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1319} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1320} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1321} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1322} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1323} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1324} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1325} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1326} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1327} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1328} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1329} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1330} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1331} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1332} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1333} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1334} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1335} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1336} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1337} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1338} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1339} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1340} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1341} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1342} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1343} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1344} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1345} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1346} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1347} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1348} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1349} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1350} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1351} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1352} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1353} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1354} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1355} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1356} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1357} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1358} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1359} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1360} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1361} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1362} &= \begin{bmatrix} 1, 0, 0, 4 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1363} &= \begin{bmatrix} 1, 0, 4, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1364} &= \begin{bmatrix} 1, 4, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1365} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1366} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1367} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1368} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1369} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1370} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1371} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1372} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1373} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1374} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1375} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1376} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1377} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1378} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1379} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1380} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1381} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1382} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1383} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1384} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1385} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1386} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1387} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1388} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1389} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1390} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1391} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1392} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1393} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1394} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1395} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1396} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1397} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1398} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1399} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1400} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1401} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1402} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1403} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1404} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1405} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1406} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1407} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1408} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1409} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1410} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1411} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1412} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1413} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1414} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1415} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1416} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1417} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1418} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1419} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1420} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1421} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1422} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1423} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1424} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1425} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1426} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1427} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1428} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1429} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1430} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1431} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1432} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1433} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1434} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1435} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1436} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1437} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1438} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1439} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1440} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1441} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1442} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1443} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1444} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1445} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1446} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1447} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1448} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1449} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1450} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1451} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1452} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1453} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1454} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1455} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1456} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1457} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1458} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1459} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1460} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1461} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1462} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1463} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1464} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1465} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1466} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1467} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1468} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1469} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1470} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1471} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1472} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1473} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1474} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1475} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1476} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1477} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1478} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1479} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1480} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1481} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1482} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1483} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1484} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1485} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1486} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1487} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1488} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1489} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1490} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1491} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1492} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1493} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1494} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1495} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1496} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1497} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1498} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1499} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1500} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1501} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1502} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1503} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1504} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1505} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1506} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1507} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1508} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1509} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1510} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1511} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1512} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1513} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1514} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1515} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1516} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1517} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1518} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1519} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1520} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1521} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1522} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1523} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1524} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1525} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1526} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1527} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1528} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1529} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1530} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1531} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1532} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1533} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1534} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1535} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1536} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1537} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1538} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1539} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1540} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1541} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1542} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1543} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1544} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1545} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1546} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1547} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1548} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1549} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1550} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1551} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1552} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1553} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1554} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1555} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1556} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1557} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1558} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1559} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1560} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1561} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1562} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1563} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1564} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1565} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1566} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1567} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1568} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1569} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1570} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1571} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1572} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1573} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1574} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1575} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1576} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1577} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1578} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1579} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1580} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1581} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1582} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1583} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1584} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1585} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1586} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1587} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1588} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1589} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1590} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1591} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1592} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1593} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1594} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1595} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1596} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1597} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1598} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1599} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1600} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1601} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1602} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1603} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1604} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1605} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1606} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1607} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1608} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1609} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1610} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1611} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1612} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1613} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1614} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1615} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1616} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1617} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1618} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1619} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1620} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1621} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1622} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1623} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1624} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1625} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1626} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1627} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1628} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1629} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1630} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1631} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1632} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1633} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1634} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1635} &= \begin{bmatrix} 1, 0, 0, 5 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1636} &= \begin{bmatrix} 1, 0, 5, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1637} &= \begin{bmatrix} 1, 5, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1638} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1639} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1640} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1641} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1642} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1643} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1644} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1645} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1646} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1647} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1648} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1649} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1650} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1651} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1652} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1653} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1654} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1655} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1656} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1657} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1658} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1659} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1660} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1661} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1662} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1663} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1664} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1665} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1666} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1667} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1668} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1669} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1670} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1671} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1672} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1673} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1674} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1675} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1676} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1677} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1678} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1679} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1680} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1681} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1682} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1683} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1684} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1685} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1686} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1687} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1688} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1689} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1690} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1691} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1692} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1693} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1694} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1695} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1696} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1697} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1698} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1699} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1700} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1701} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1702} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1703} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1704} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1705} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1706} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1707} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1708} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1709} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1710} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1711} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1712} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1713} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1714} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1715} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1716} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1717} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1718} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1719} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1720} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1721} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1722} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1723} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1724} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1725} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1726} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1727} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1728} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1729} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1730} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1731} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1732} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1733} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1734} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1735} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1736} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1737} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1738} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1739} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1740} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1741} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1742} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1743} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1744} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1745} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1746} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1747} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1748} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1749} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1750} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1751} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1752} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1753} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1754} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1755} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1756} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1757} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1758} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1759} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1760} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1761} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1762} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1763} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1764} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1765} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1766} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1767} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1768} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1769} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1770} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1771} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1772} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1773} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1774} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1775} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1776} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1777} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1778} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1779} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1780} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1781} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1782} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1783} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1784} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1785} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1786} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1787} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1788} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1789} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1790} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1791} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1792} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1793} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1794} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1795} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1796} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1797} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1798} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1799} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1800} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1801} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1802} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1803} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1804} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1805} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1806} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1807} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1808} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1809} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1810} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1811} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1812} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1813} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1814} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1815} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1816} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1817} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1818} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1819} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1820} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1821} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1822} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1823} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1824} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1825} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1826} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1827} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1828} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1829} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1830} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1831} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1832} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1833} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1834} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1835} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1836} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1837} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1838} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1839} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1840} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1841} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1842} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1843} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1844} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1845} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1846} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1847} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1848} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1849} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1850} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1851} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1852} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1853} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1854} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1855} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1856} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1857} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1858} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1859} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1860} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1861} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1862} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1863} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1864} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1865} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1866} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1867} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1868} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1869} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1870} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1871} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1872} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1873} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1874} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1875} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1876} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1877} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1878} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1879} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1880} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1881} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1882} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1883} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1884} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1885} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1886} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1887} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1888} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1889} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1890} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1891} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1892} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1893} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1894} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1895} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1896} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1897} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1898} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1899} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1900} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1901} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1902} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1903} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1904} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1905} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1906} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1907} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1908} &= \begin{bmatrix} 1, 0, 0, 6 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1909} &= \begin{bmatrix} 1, 0, 6, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1910} &= \begin{bmatrix} 1, 6, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1911} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1912} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1913} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1914} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1915} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1916} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1917} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1918} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1919} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1920} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1921} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1922} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1923} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1924} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1925} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1926} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1927} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1928} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1929} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1930} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1931} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1932} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1933} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1934} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1935} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1936} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1937} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1938} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1939} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1940} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1941} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1942} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1943} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1944} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1945} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1946} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1947} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1948} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1949} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1950} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1951} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1952} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1953} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1954} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1955} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1956} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1957} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1958} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1959} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1960} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1961} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1962} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1963} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1964} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1965} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1966} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1967} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1968} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1969} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1970} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1971} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1972} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1973} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1974} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1975} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1976} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{1977} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1978} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1979} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1980} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1981} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1982} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{1983} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{1984} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{1985} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{1986} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{1987} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{1988} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{1989} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{1990} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{1991} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{1992} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{1993} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{1994} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{1995} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{1996} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{1997} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{1998} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{1999} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2000} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2001} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2002} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2003} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2004} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2005} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2006} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2007} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2008} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2009} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2010} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2011} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2012} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2013} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2014} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2015} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2016} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2017} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2018} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2019} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2020} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2021} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2022} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2023} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2024} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2025} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2026} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2027} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2028} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2029} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2030} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2031} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2032} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2033} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2034} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2035} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2036} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2037} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2038} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2039} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2040} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2041} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2042} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2043} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2044} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2045} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2046} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2047} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2048} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2049} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2050} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2051} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2052} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2053} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2054} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2055} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2056} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2057} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2058} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2059} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2060} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2061} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2062} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2063} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2064} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2065} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2066} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2067} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2068} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2069} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2070} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2071} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2072} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2073} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2074} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2075} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2076} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2077} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2078} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2079} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2080} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2081} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2082} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2083} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2084} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2085} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2086} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2087} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2088} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2089} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2090} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2091} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2092} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2093} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2094} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2095} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2096} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2097} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2098} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2099} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2100} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2101} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2102} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2103} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2104} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2105} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2106} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2107} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2108} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2109} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2110} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2111} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2112} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2113} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2114} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2115} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2116} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2117} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2118} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2119} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2120} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2121} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2122} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2123} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2124} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2125} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2126} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2127} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2128} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2129} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2130} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2131} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2132} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2133} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2134} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2135} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2136} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2137} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2138} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2139} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2140} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2141} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2142} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2143} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2144} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2145} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2146} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2147} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2148} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2149} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2150} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2151} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2152} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2153} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2154} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2155} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2156} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2157} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2158} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2159} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2160} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2161} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2162} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2163} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2164} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2165} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2166} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2167} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2168} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2169} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2170} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2171} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2172} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2173} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2174} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2175} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2176} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2177} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2178} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2179} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2180} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2181} &= \begin{bmatrix} 1, 0, 0, 7 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2182} &= \begin{bmatrix} 1, 0, 7, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2183} &= \begin{bmatrix} 1, 7, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2184} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2185} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2186} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2187} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2188} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2189} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2190} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2191} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2192} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2193} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2194} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2195} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2196} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2197} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2198} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2199} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2200} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2201} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2202} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2203} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2204} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2205} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2206} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2207} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2208} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2209} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2210} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2211} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2212} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2213} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2214} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2215} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2216} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2217} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2218} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2219} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2220} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2221} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2222} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2223} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2224} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2225} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2226} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2227} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2228} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2229} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2230} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2231} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2232} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2233} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2234} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2235} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2236} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2237} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2238} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2239} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2240} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2241} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2242} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2243} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2244} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2245} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2246} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2247} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2248} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2249} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2250} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2251} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2252} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2253} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2254} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2255} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2256} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2257} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2258} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2259} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2260} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2261} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2262} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2263} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2264} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2265} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2266} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2267} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2268} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2269} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2270} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2271} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2272} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2273} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2274} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2275} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2276} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2277} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2278} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2279} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2280} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2281} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2282} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2283} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2284} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2285} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2286} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2287} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2288} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2289} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2290} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2291} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2292} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2293} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2294} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2295} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2296} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2297} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2298} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2299} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2300} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2301} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2302} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2303} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2304} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2305} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2306} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2307} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2308} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2309} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2310} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2311} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2312} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2313} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2314} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2315} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2316} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2317} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2318} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2319} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2320} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2321} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2322} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2323} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2324} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2325} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2326} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2327} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2328} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2329} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2330} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2331} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2332} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2333} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2334} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2335} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2336} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2337} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2338} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2339} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2340} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2341} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2342} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2343} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2344} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2345} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2346} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2347} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2348} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2349} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2350} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2351} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2352} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2353} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2354} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2355} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2356} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2357} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2358} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2359} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2360} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2361} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2362} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2363} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2364} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2365} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2366} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2367} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2368} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2369} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2370} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2371} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2372} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2373} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2374} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2375} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2376} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2377} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2378} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2379} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2380} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2381} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2382} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2383} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2384} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2385} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2386} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2387} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2388} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2389} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2390} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2391} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2392} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2393} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2394} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2395} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2396} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2397} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2398} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2399} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2400} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2401} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2402} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2403} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2404} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2405} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2406} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2407} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2408} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2409} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2410} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2411} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2412} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2413} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2414} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2415} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2416} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2417} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2418} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2419} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2420} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2421} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2422} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2423} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2424} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2425} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2426} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2427} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2428} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2429} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2430} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2431} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2432} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2433} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2434} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2435} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2436} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2437} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2438} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2439} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2440} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2441} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2442} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2443} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2444} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2445} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2446} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2447} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2448} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2449} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2450} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2451} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2452} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2453} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2454} &= \begin{bmatrix} 1, 0, 0, 8 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2455} &= \begin{bmatrix} 1, 0, 8, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2456} &= \begin{bmatrix} 1, 8, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2457} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2458} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2459} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2460} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2461} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2462} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2463} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2464} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2465} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2466} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2467} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2468} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2469} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2470} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2471} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2472} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2473} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2474} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2475} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2476} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2477} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2478} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2479} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2480} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2481} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2482} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2483} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2484} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2485} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2486} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2487} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2488} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2489} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2490} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2491} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2492} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2493} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2494} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2495} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2496} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2497} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2498} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2499} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2500} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2501} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2502} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2503} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2504} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2505} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2506} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2507} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2508} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2509} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2510} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2511} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2512} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2513} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2514} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2515} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2516} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2517} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2518} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2519} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2520} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2521} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2522} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2523} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2524} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2525} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2526} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2527} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2528} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2529} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2530} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2531} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2532} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2533} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2534} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2535} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2536} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2537} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2538} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2539} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2540} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2541} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2542} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2543} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2544} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2545} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2546} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2547} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2548} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2549} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2550} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2551} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2552} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2553} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2554} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2555} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2556} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2557} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2558} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2559} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2560} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2561} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2562} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2563} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2564} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2565} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2566} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2567} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2568} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2569} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2570} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2571} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2572} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2573} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2574} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2575} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2576} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2577} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2578} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2579} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2580} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2581} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2582} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2583} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2584} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2585} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2586} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2587} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2588} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2589} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2590} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2591} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2592} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2593} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2594} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2595} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2596} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2597} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2598} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2599} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2600} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2601} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2602} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2603} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2604} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2605} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2606} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2607} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2608} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2609} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2610} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2611} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2612} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2613} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2614} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2615} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2616} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2617} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2618} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2619} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2620} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2621} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2622} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2623} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2624} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2625} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2626} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2627} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2628} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2629} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2630} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2631} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2632} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2633} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2634} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2635} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2636} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2637} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2638} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2639} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2640} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2641} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2642} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2643} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2644} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2645} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2646} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2647} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2648} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2649} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2650} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2651} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2652} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2653} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2654} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2655} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2656} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2657} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2658} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2659} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2660} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2661} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2662} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2663} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2664} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2665} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2666} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2667} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2668} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2669} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2670} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2671} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2672} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2673} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2674} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2675} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2676} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2677} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2678} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2679} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2680} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2681} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2682} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2683} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2684} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2685} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2686} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2687} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2688} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2689} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2690} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2691} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2692} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2693} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2694} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2695} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2696} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2697} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2698} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2699} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2700} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2701} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2702} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2703} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2704} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2705} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2706} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2707} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2708} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2709} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2710} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2711} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2712} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2713} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2714} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2715} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2716} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2717} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2718} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2719} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2720} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2721} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2722} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2723} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2724} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2725} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2726} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2727} &= \begin{bmatrix} 1, 0, 0, 9 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2728} &= \begin{bmatrix} 1, 0, 9, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2729} &= \begin{bmatrix} 1, 9, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2730} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2731} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2732} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2733} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2734} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2735} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2736} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2737} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2738} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2739} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2740} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2741} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2742} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2743} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2744} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2745} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2746} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2747} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2748} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2749} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2750} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2751} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2752} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2753} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2754} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2755} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2756} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2757} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2758} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2759} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2760} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2761} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2762} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2763} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2764} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2765} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2766} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2767} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2768} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2769} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2770} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2771} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2772} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2773} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2774} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2775} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2776} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2777} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2778} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2779} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2780} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2781} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2782} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2783} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2784} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2785} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2786} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2787} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2788} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2789} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2790} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2791} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2792} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2793} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2794} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2795} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2796} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2797} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2798} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2799} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2800} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2801} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2802} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2803} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2804} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2805} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2806} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2807} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2808} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2809} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2810} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2811} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2812} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2813} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2814} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2815} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2816} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2817} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2818} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2819} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2820} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2821} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2822} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2823} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2824} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2825} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2826} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2827} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2828} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2829} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2830} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2831} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2832} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2833} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2834} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2835} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2836} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2837} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2838} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2839} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2840} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2841} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2842} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2843} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2844} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2845} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2846} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2847} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2848} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2849} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2850} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2851} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2852} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2853} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2854} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2855} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2856} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2857} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2858} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2859} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2860} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2861} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2862} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2863} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2864} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2865} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2866} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2867} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2868} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2869} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2870} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2871} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2872} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2873} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2874} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2875} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2876} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2877} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2878} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2879} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2880} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2881} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2882} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2883} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2884} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2885} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2886} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2887} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2888} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2889} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2890} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2891} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2892} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2893} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2894} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2895} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2896} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2897} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2898} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2899} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2900} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2901} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2902} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2903} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2904} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2905} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2906} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2907} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2908} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2909} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2910} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2911} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2912} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2913} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2914} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2915} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2916} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2917} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2918} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2919} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2920} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2921} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2922} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2923} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2924} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2925} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2926} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2927} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2928} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2929} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2930} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2931} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2932} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2933} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2934} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2935} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2936} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2937} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2938} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2939} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2940} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2941} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2942} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2943} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2944} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2945} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2946} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2947} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2948} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2949} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2950} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2951} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2952} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2953} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2954} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2955} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2956} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2957} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2958} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2959} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2960} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2961} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2962} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2963} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2964} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2965} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2966} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2967} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2968} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2969} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2970} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2971} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2972} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2973} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2974} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2975} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2976} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{2977} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2978} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2979} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2980} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2981} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2982} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{2983} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{2984} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{2985} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{2986} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{2987} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{2988} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{2989} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{2990} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{2991} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{2992} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{2993} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{2994} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{2995} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{2996} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{2997} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{2998} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{2999} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3000} &= \begin{bmatrix} 1, 0, 0, 10 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3001} &= \begin{bmatrix} 1, 0, 10, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3002} &= \begin{bmatrix} 1, 10, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3003} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3004} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3005} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3006} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3007} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3008} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3009} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3010} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3011} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3012} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3013} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3014} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3015} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3016} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3017} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3018} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3019} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3020} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3021} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3022} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3023} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3024} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3025} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3026} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3027} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3028} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3029} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3030} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3031} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3032} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3033} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3034} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3035} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3036} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3037} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3038} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3039} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3040} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3041} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3042} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3043} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3044} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3045} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3046} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3047} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3048} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3049} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3050} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3051} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3052} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3053} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3054} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3055} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3056} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3057} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3058} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3059} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3060} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3061} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3062} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3063} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3064} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3065} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3066} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3067} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3068} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3069} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3070} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3071} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3072} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3073} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3074} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3075} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3076} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3077} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3078} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3079} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3080} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3081} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3082} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3083} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3084} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3085} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3086} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3087} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3088} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3089} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3090} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3091} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3092} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3093} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3094} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3095} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3096} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3097} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3098} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3099} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3100} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3101} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3102} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3103} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3104} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3105} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3106} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3107} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3108} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3109} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3110} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3111} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3112} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3113} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3114} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3115} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3116} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3117} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3118} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3119} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3120} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3121} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3122} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3123} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3124} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3125} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3126} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3127} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3128} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3129} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3130} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3131} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3132} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3133} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3134} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3135} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3136} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3137} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3138} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3139} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3140} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3141} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3142} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3143} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3144} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3145} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3146} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3147} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3148} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3149} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3150} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3151} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3152} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3153} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3154} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3155} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3156} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3157} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3158} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3159} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3160} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3161} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3162} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3163} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3164} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3165} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3166} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3167} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3168} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3169} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3170} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3171} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3172} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3173} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3174} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3175} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3176} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3177} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3178} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3179} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3180} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3181} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3182} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3183} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3184} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3185} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3186} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3187} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3188} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3189} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3190} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3191} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3192} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3193} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3194} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3195} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3196} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3197} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3198} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3199} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3200} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3201} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3202} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3203} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3204} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3205} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3206} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3207} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3208} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3209} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3210} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3211} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3212} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3213} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3214} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3215} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3216} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3217} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3218} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3219} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3220} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3221} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3222} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3223} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3224} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3225} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3226} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3227} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3228} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3229} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3230} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3231} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3232} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3233} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3234} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3235} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3236} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3237} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3238} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3239} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3240} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3241} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3242} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3243} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3244} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3245} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3246} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3247} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3248} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3249} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3250} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3251} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3252} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3253} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3254} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3255} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3256} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3257} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3258} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3259} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3260} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3261} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3262} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3263} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3264} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3265} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3266} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3267} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3268} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3269} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3270} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3271} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3272} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3273} &= \begin{bmatrix} 1, 0, 0, 11 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3274} &= \begin{bmatrix} 1, 0, 11, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3275} &= \begin{bmatrix} 1, 11, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3276} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3277} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3278} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3279} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3280} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3281} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3282} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3283} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3284} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3285} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3286} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3287} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3288} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3289} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3290} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3291} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3292} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3293} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3294} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3295} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3296} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3297} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3298} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3299} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3300} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3301} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3302} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3303} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3304} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3305} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3306} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3307} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3308} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3309} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3310} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3311} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3312} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3313} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3314} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3315} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3316} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3317} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3318} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3319} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3320} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3321} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3322} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3323} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3324} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3325} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3326} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3327} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3328} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3329} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3330} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3331} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3332} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3333} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3334} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3335} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3336} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3337} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3338} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3339} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3340} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3341} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3342} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3343} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3344} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3345} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3346} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3347} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3348} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3349} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3350} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3351} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3352} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3353} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3354} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3355} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3356} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3357} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3358} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3359} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3360} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3361} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3362} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3363} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3364} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3365} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3366} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3367} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3368} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3369} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3370} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3371} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3372} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3373} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3374} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3375} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3376} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3377} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3378} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3379} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3380} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3381} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3382} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3383} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3384} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3385} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3386} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3387} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3388} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3389} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3390} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3391} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3392} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3393} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3394} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3395} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3396} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3397} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3398} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3399} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3400} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3401} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3402} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3403} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3404} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3405} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3406} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3407} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3408} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3409} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3410} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3411} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3412} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3413} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3414} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3415} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3416} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3417} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3418} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3419} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3420} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3421} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3422} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3423} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3424} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3425} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3426} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3427} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3428} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3429} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3430} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3431} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3432} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3433} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3434} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3435} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3436} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3437} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3438} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3439} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3440} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3441} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3442} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3443} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3444} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3445} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3446} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3447} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3448} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3449} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3450} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3451} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3452} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3453} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3454} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3455} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3456} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3457} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3458} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3459} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3460} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3461} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3462} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3463} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3464} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3465} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3466} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3467} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3468} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3469} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3470} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3471} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3472} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3473} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3474} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3475} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3476} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3477} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3478} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3479} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3480} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3481} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3482} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3483} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3484} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3485} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3486} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3487} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3488} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3489} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3490} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3491} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3492} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3493} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3494} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3495} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3496} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3497} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3498} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3499} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3500} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3501} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3502} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3503} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3504} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3505} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3506} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3507} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3508} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3509} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3510} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3511} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3512} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3513} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3514} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3515} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3516} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3517} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3518} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3519} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3520} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3521} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3522} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3523} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3524} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3525} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3526} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3527} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3528} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3529} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3530} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3531} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3532} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3533} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3534} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3535} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3536} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3537} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3538} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3539} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3540} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3541} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3542} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3543} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3544} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3545} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3546} &= \begin{bmatrix} 1, 0, 0, 12 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3547} &= \begin{bmatrix} 1, 0, 12, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3548} &= \begin{bmatrix} 1, 12, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3549} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3550} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3551} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3552} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3553} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3554} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3555} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3556} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3557} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3558} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3559} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3560} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3561} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3562} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3563} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3564} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3565} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3566} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3567} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3568} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3569} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3570} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3571} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3572} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3573} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3574} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3575} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3576} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3577} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3578} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3579} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3580} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3581} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3582} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3583} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3584} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3585} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3586} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3587} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3588} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3589} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3590} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3591} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3592} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3593} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3594} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3595} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3596} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3597} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3598} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3599} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3600} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3601} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3602} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3603} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3604} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3605} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3606} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3607} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3608} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3609} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3610} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3611} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3612} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3613} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3614} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3615} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3616} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3617} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3618} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3619} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3620} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3621} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3622} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3623} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3624} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3625} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3626} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3627} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3628} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3629} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3630} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3631} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3632} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3633} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3634} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3635} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3636} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3637} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3638} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3639} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3640} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3641} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3642} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3643} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3644} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3645} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3646} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3647} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3648} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3649} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3650} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3651} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3652} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3653} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3654} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3655} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3656} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3657} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3658} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3659} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3660} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3661} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3662} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3663} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3664} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3665} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3666} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3667} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3668} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3669} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3670} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3671} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3672} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3673} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3674} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3675} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3676} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3677} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3678} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3679} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3680} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3681} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3682} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3683} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3684} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3685} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3686} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3687} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3688} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3689} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3690} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3691} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3692} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3693} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3694} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3695} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3696} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3697} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3698} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3699} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3700} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3701} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3702} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3703} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3704} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3705} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3706} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3707} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3708} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3709} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3710} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3711} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3712} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3713} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3714} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3715} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3716} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3717} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3718} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3719} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3720} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3721} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3722} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3723} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3724} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3725} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3726} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3727} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3728} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3729} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3730} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3731} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3732} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3733} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3734} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3735} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3736} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3737} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3738} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3739} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3740} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3741} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3742} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3743} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3744} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3745} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3746} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3747} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3748} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3749} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3750} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3751} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3752} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3753} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3754} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3755} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3756} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3757} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3758} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3759} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3760} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3761} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3762} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3763} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3764} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3765} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3766} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3767} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3768} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3769} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3770} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3771} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3772} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3773} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3774} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3775} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3776} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3777} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3778} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3779} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3780} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3781} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3782} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3783} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3784} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3785} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3786} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3787} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3788} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3789} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3790} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3791} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3792} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3793} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3794} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3795} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3796} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3797} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3798} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3799} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3800} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3801} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3802} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3803} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3804} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3805} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3806} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3807} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3808} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3809} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3810} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3811} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3812} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3813} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3814} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3815} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3816} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3817} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3818} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3819} &= \begin{bmatrix} 1, 0, 0, 13 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3820} &= \begin{bmatrix} 1, 0, 13, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3821} &= \begin{bmatrix} 1, 13, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3822} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3823} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3824} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3825} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3826} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3827} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3828} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3829} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3830} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3831} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3832} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3833} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3834} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3835} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3836} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3837} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3838} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3839} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3840} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3841} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3842} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3843} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3844} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3845} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3846} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3847} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3848} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3849} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3850} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3851} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3852} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3853} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3854} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3855} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3856} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3857} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3858} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3859} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3860} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3861} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3862} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3863} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3864} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3865} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3866} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3867} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3868} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3869} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3870} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3871} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3872} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3873} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3874} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3875} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3876} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3877} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3878} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3879} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3880} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3881} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3882} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3883} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3884} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3885} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3886} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3887} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3888} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3889} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3890} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3891} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3892} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3893} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3894} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3895} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3896} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3897} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3898} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3899} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3900} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3901} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3902} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3903} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3904} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3905} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3906} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3907} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3908} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3909} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3910} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3911} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3912} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3913} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3914} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3915} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3916} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3917} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3918} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3919} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3920} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3921} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3922} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3923} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3924} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3925} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3926} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3927} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3928} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3929} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3930} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3931} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3932} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3933} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3934} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3935} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3936} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3937} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3938} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3939} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3940} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3941} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3942} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3943} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3944} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3945} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3946} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3947} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3948} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3949} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3950} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3951} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3952} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3953} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3954} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3955} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3956} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3957} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3958} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3959} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3960} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3961} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3962} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3963} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3964} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3965} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3966} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3967} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3968} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3969} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3970} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3971} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3972} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3973} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3974} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3975} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3976} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{3977} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3978} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3979} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3980} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3981} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3982} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{3983} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{3984} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{3985} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{3986} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{3987} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{3988} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{3989} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{3990} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{3991} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{3992} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{3993} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{3994} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{3995} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{3996} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{3997} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{3998} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{3999} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4000} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4001} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4002} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4003} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4004} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4005} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4006} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4007} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4008} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4009} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4010} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4011} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4012} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4013} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4014} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4015} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4016} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4017} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4018} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4019} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4020} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4021} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4022} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4023} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4024} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4025} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4026} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4027} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4028} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4029} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4030} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4031} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4032} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4033} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4034} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4035} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4036} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4037} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4038} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4039} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4040} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4041} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4042} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4043} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4044} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4045} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4046} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4047} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4048} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4049} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4050} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4051} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4052} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4053} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4054} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4055} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4056} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4057} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4058} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4059} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4060} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4061} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4062} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4063} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4064} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4065} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4066} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4067} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4068} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4069} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4070} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4071} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4072} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4073} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4074} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4075} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4076} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4077} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4078} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4079} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4080} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4081} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4082} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4083} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4084} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4085} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4086} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4087} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4088} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4089} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4090} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4091} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4092} &= \begin{bmatrix} 1, 0, 0, 14 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4093} &= \begin{bmatrix} 1, 0, 14, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4094} &= \begin{bmatrix} 1, 14, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4095} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4096} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4097} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4098} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4099} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4100} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4101} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4102} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4103} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4104} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4105} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4106} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4107} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4108} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4109} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4110} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 0 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4111} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 0, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4112} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4113} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4114} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4115} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4116} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4117} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4118} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4119} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4120} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4121} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4122} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4123} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4124} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4125} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4126} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4127} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 1 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4128} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4129} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4130} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4131} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4132} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4133} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4134} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4135} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4136} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4137} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4138} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4139} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 10 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4140} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4141} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4142} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4143} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4144} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 2 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4145} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 2, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4146} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4147} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4148} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4149} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4150} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4151} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4152} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4153} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 7 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4154} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4155} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4156} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4157} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4158} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4159} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4160} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4161} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 3 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4162} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 3, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4163} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4164} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4165} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4166} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4167} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 4 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4168} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4169} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4170} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4171} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4172} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4173} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4174} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4175} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4176} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4177} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4178} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 4 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4179} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 4, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4180} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4181} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4182} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4183} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4184} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4185} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4186} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4187} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4188} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4189} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4190} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4191} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4192} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4193} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4194} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4195} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 5 \\ 0, 0, 1, 15 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4196} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 5, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4197} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4198} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4199} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4200} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4201} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4202} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4203} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4204} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4205} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4206} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4207} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4208} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4209} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 12 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4210} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4211} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4212} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 6 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4213} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 6, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4214} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4215} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4216} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4217} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4218} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4219} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4220} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4221} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4222} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4223} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 9 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4224} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4225} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4226} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4227} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4228} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4229} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 7 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4230} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 7, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4231} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4232} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4233} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4234} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4235} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4236} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4237} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 6 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4238} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4239} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4240} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4241} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4242} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4243} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4244} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4245} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4246} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 8 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4247} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 8, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4248} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4249} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4250} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4251} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 3 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4252} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4253} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4254} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4255} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4256} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4257} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4258} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4259} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4260} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4261} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4262} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4263} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 9 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4264} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 9, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4265} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 0 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4266} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4267} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4268} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4269} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4270} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4271} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4272} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4273} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4274} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4275} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4276} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4277} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4278} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4279} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 14 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4280} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 10 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4281} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 10, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4282} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4283} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4284} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4285} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4286} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4287} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4288} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4289} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4290} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4291} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4292} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4293} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 11 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4294} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4295} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4296} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4297} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 11 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4298} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 11, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4299} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4300} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4301} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4302} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4303} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4304} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4305} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4306} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4307} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 8 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4308} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4309} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4310} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4311} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4312} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4313} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4314} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 12 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4315} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 12, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4316} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4317} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4318} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4319} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4320} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4321} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 5 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4322} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4323} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4324} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4325} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4326} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4327} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4328} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4329} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4330} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4331} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 13 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4332} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 13, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4333} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4334} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4335} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 2 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4336} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4337} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4338} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4339} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4340} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4341} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4342} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4343} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4344} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4345} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4346} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 13 \end{bmatrix} \\
L_{4347} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4348} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 14 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4349} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 14, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4350} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 0 \end{bmatrix} \\
L_{4351} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 1 \end{bmatrix} \\
L_{4352} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 2 \end{bmatrix} \\
L_{4353} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 3 \end{bmatrix} \\
L_{4354} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 4 \end{bmatrix} \\
L_{4355} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 5 \end{bmatrix} \\
L_{4356} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 6 \end{bmatrix} \\
L_{4357} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 7 \end{bmatrix} \\
L_{4358} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 8 \end{bmatrix} \\
L_{4359} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 9 \end{bmatrix} \\
L_{4360} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 10 \end{bmatrix} \\
L_{4361} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 11 \end{bmatrix} \\
L_{4362} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 12 \end{bmatrix} \\
L_{4363} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 13 \end{bmatrix}
\end{aligned}$$

$$\begin{aligned}
L_{4364} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 14 \end{bmatrix} \\
L_{4365} &= \begin{bmatrix} 1, 0, 0, 15 \\ 0, 1, 0, 15 \\ 0, 0, 1, 15 \end{bmatrix} \\
L_{4366} &= \begin{bmatrix} 1, 0, 15, 0 \\ 0, 1, 15, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4367} &= \begin{bmatrix} 1, 15, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix} \\
L_{4368} &= \begin{bmatrix} 0, 1, 0, 0 \\ 0, 0, 1, 0 \\ 0, 0, 0, 1 \end{bmatrix}
\end{aligned}$$

The polynomial rings associated with $\text{PG}(3, 16)$

h	monomial	vector
0	X_0	$(1, 0, 0, 0)$
1	X_1	$(0, 1, 0, 0)$
2	X_2	$(0, 0, 1, 0)$
3	X_3	$(0, 0, 0, 1)$

h	monomial	vector
0	X_0^2	$(2, 0, 0, 0)$
1	X_1^2	$(0, 2, 0, 0)$
2	X_2^2	$(0, 0, 2, 0)$
3	X_3^2	$(0, 0, 0, 2)$
4	X_0X_1	$(1, 1, 0, 0)$
5	X_0X_2	$(1, 0, 1, 0)$
6	X_0X_3	$(1, 0, 0, 1)$
7	X_1X_2	$(0, 1, 1, 0)$
8	X_1X_3	$(0, 1, 0, 1)$
9	X_2X_3	$(0, 0, 1, 1)$

h	monomial	vector
0	X_0^3	$(3, 0, 0, 0)$
1	X_1^3	$(0, 3, 0, 0)$
2	X_2^3	$(0, 0, 3, 0)$
3	X_3^3	$(0, 0, 0, 3)$
4	$X_0^2 X_1$	$(2, 1, 0, 0)$
5	$X_0^2 X_2$	$(2, 0, 1, 0)$
6	$X_0^2 X_3$	$(2, 0, 0, 1)$
7	$X_0 X_1^2$	$(1, 2, 0, 0)$
8	$X_1^2 X_2$	$(0, 2, 1, 0)$
9	$X_1^2 X_3$	$(0, 2, 0, 1)$
10	$X_0 X_2^2$	$(1, 0, 2, 0)$
11	$X_1 X_2^2$	$(0, 1, 2, 0)$
12	$X_2^2 X_3$	$(0, 0, 2, 1)$
13	$X_0 X_3^2$	$(1, 0, 0, 2)$
14	$X_1 X_3^2$	$(0, 1, 0, 2)$
15	$X_2 X_3^2$	$(0, 0, 1, 2)$
16	$X_0 X_1 X_2$	$(1, 1, 1, 0)$
17	$X_0 X_1 X_3$	$(1, 1, 0, 1)$
18	$X_0 X_2 X_3$	$(1, 0, 1, 1)$
19	$X_1 X_2 X_3$	$(0, 1, 1, 1)$

h	monomial	vector
0	X_0^4	(4, 0, 0, 0)
1	X_1^4	(0, 4, 0, 0)
2	X_2^4	(0, 0, 4, 0)
3	X_3^4	(0, 0, 0, 4)
4	$X_0^3 X_1$	(3, 1, 0, 0)
5	$X_0^3 X_2$	(3, 0, 1, 0)
6	$X_0^3 X_3$	(3, 0, 0, 1)
7	$X_0 X_1^3$	(1, 3, 0, 0)
8	$X_1^3 X_2$	(0, 3, 1, 0)
9	$X_1^3 X_3$	(0, 3, 0, 1)
10	$X_0 X_2^3$	(1, 0, 3, 0)
11	$X_1 X_2^3$	(0, 1, 3, 0)
12	$X_2^3 X_3$	(0, 0, 3, 1)
13	$X_0 X_3^3$	(1, 0, 0, 3)
14	$X_1 X_3^3$	(0, 1, 0, 3)
15	$X_2 X_3^3$	(0, 0, 1, 3)
16	$X_0^2 X_1^2$	(2, 2, 0, 0)
17	$X_0^2 X_2^2$	(2, 0, 2, 0)
18	$X_0^2 X_3^2$	(2, 0, 0, 2)
19	$X_1^2 X_2^2$	(0, 2, 2, 0)
20	$X_1^2 X_3^2$	(0, 2, 0, 2)
21	$X_2^2 X_3^2$	(0, 0, 2, 2)
22	$X_0^2 X_1 X_2$	(2, 1, 1, 0)
23	$X_0^2 X_1 X_3$	(2, 1, 0, 1)
24	$X_0^2 X_2 X_3$	(2, 0, 1, 1)

h	monomial	vector
25	$X_0X_1^2X_2$	$(1, 2, 1, 0)$
26	$X_0X_1^2X_3$	$(1, 2, 0, 1)$
27	$X_1^2X_2X_3$	$(0, 2, 1, 1)$
28	$X_0X_1X_2^2$	$(1, 1, 2, 0)$
29	$X_0X_2^2X_3$	$(1, 0, 2, 1)$
30	$X_1X_2^2X_3$	$(0, 1, 2, 1)$
31	$X_0X_1X_3^2$	$(1, 1, 0, 2)$
32	$X_0X_2X_3^2$	$(1, 0, 1, 2)$
33	$X_1X_2X_3^2$	$(0, 1, 1, 2)$
34	$X_0X_1X_2X_3$	$(1, 1, 1, 1)$