Rank-65603 over GF(8)

January 15, 2021

The equation

The equation of the surface is :

$$X_0^2X_3 + X_0X_1X_2 = 0$$

(0, 0, 0, 0, 0, 0, 1, 0, 0, 0, 0, 0, 0, 0, 0, 0, 1, 0, 0, 0)
The point rank of the equation over GF(8) is 1227395661

General information

Number of lines	89
Number of points	137
Number of singular points	17
Number of Eckardt points	0
Number of double points	64
Number of single points	0
Number of points off lines	0
Number of Hesse planes	0
Number of axes	0
Type of points on lines	9^{89}
Type of lines on points	10^{16}, 9^{57}, 2^{64}

Singular Points

The surface has 17 singular points:

0 : $P_1 = \mathbf{P}(0,1,0,0) = \mathbf{P}(0,1,0,0)$
1 : $P_2 = \mathbf{P}(0,0,1,0) = \mathbf{P}(0,0,1,0)$
2 : $P_3 = \mathbf{P}(0,0,0,1) = \mathbf{P}(0,0,0,1)$
3 : $P_{82} = \mathbf{P}(0,1,0,1) = \mathbf{P}(0,1,0,1)$
4 : $P_{90} = \mathbf{P}(0,\gamma,0,1) = \mathbf{P}(0,2,0,1)$
5 : $P_{98} = \mathbf{P}(0,\gamma^5,0,1) = \mathbf{P}(0,3,0,1)$
6 : $P_{106} = \mathbf{P}(0,\gamma^2,0,1) = \mathbf{P}(0,4,0,1)$
7 : $P_{114} = \mathbf{P}(0,\gamma^3,0,1) = \mathbf{P}(0,5,0,1)$
8 : $P_{122} = \mathbf{P}(0,\gamma^6,0,1) = \mathbf{P}(0,6,0,1)$
9 : $P_{130} = \mathbf{P}(0,\gamma^4,0,1) = \mathbf{P}(0,7,0,1)$
10 : $P_{138} = \mathbf{P}(0,0,1,1) = \mathbf{P}(0,0,1,1)$
11 : $P_{201} = \mathbf{P}(0,0,\gamma,1) = \mathbf{P}(0,0,2,1)$
12 : $P_{265} = \mathbf{P}(0,0,\gamma^5,1) = \mathbf{P}(0,0,3,1)$
13 : $P_{329} = \mathbf{P}(0,0,\gamma^2,1) = \mathbf{P}(0,0,4,1)$
14 : $P_{393} = \mathbf{P}(0,0,\gamma^3,1) = \mathbf{P}(0,0,5,1)$
15 : $P_{457} = \mathbf{P}(0,0,\gamma^6,1) = \mathbf{P}(0,0,6,1)$
16 : $P_{521} = \mathbf{P}(0,0,\gamma^4,1) = \mathbf{P}(0,0,7,1)$

The 89 Lines

The lines and their Pluecker coordinates are:

$$\ell_0 = \begin{bmatrix} 1 & 0 & 0 & 0 \\ 0 & 1 & 0 & 0 \end{bmatrix}_0 = \begin{bmatrix} 1 & 0 & 0 & 0 \\ 0 & 1 & 0 & 0 \end{bmatrix}_0 = \mathbf{Pl}(1,0,0,0,0,0)_0$$

$$\ell_1 = \begin{bmatrix} 1 & 0 & 0 & 0 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{64} = \begin{bmatrix} 1 & 0 & 0 & 0 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{64} = \mathbf{Pl}(0,0,1,0,0,0)_2$$

$$\ell_2 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4672} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4672} = \mathbf{Pl}(0,0,0,0,0,1)_{649}$$

$$\ell_3 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4680} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4680} = \mathbf{Pl}(0,0,0,1,0,0)_{17}$$

$$\ell_4 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4673} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4673} = \mathbf{Pl}(0,0,0,1,0,1)_{769}$$

$$\ell_5 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4678} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4678} = \mathbf{Pl}(0,0,0,6,0,1)_{844}$$

$$\ell_6 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4676} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4676} = \mathbf{Pl}(0,0,0,4,0,1)_{814}$$

$$\ell_7 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4675} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4675} = \mathbf{Pl}(0,0,0,3,0,1)_{799}$$

$$\ell_8 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4679} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4679} = \mathbf{Pl}(0,0,0,7,0,1)_{859}$$

$$\ell_9 = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4674} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4674} = \mathbf{Pl}(0,0,0,2,0,1)_{784}$$

$$\ell_{10} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4677} = \begin{bmatrix} 0 & 1 & 0 & 0 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4677} = \mathbf{Pl}(0,0,0,5,0,1)_{829}$$

$$\ell_{11} = \begin{bmatrix} 0 & 0 & 1 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4744} = \begin{bmatrix} 0 & 0 & 1 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4744} = \mathbf{Pl}(0,1,0,0,0,0)_1$$

$$\ell_{12} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4681} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4681} = \mathbf{Pl}(0,1,0,0,0,1)_{657}$$

$$\ell_{13} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4726} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4726} = \mathbf{Pl}(0,6,0,0,0,1)_{662}$$

$$\ell_{14} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4708} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4708} = \mathbf{Pl}(0,4,0,0,0,1)_{660}$$

$$\ell_{15} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4699} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4699} = \mathbf{Pl}(0,3,0,0,0,1)_{659}$$

$$\ell_{16} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4735} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4735} = \mathbf{Pl}(0,7,0,0,0,1)_{663}$$

$$\ell_{17} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4690} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4690} = \mathbf{Pl}(0,2,0,0,0,1)_{658}$$

$$\ell_{18} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4717} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 0 \end{bmatrix}_{4717} = \mathbf{Pl}(0,5,0,0,0,1)_{661}$$

$$\ell_{19} = \begin{bmatrix} 1 & 1 & 0 & 0 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{138} = \begin{bmatrix} 1 & 1 & 0 & 0 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{138} = \mathbf{Pl}(0,0,1,1,1,1)_{1322}$$

$$\ell_{20} = \left[\begin{array}{cccc} 1 & \gamma^6 & 0 & 0 \\ 0 & 0 & 1 & \gamma^6 \end{array}\right]_{508} = \left[\begin{array}{cccc} 1 & 6 & 0 & 0 \\ 0 & 0 & 1 & 6 \end{array}\right]_{508} = \mathbf{Pl}(0,0,2,6,1,1)_{1337}$$

$$\ell_{21} = \left[\begin{array}{cccc} 1 & \gamma^2 & 0 & 0 \\ 0 & 0 & 1 & \gamma^2 \end{array}\right]_{360} = \left[\begin{array}{cccc} 1 & 4 & 0 & 0 \\ 0 & 0 & 1 & 4 \end{array}\right]_{360} = \mathbf{Pl}(0,0,3,4,1,1)_{1352}$$

$$\ell_{22} = \left[\begin{array}{cccc} 1 & \gamma^5 & 0 & 0 \\ 0 & 0 & 1 & \gamma^5 \end{array}\right]_{286} = \left[\begin{array}{cccc} 1 & 3 & 0 & 0 \\ 0 & 0 & 1 & 3 \end{array}\right]_{286} = \mathbf{Pl}(0,0,4,3,1,1)_{1367}$$

$$\ell_{23} = \left[\begin{array}{cccc} 1 & \gamma^4 & 0 & 0 \\ 0 & 0 & 1 & \gamma^4 \end{array}\right]_{582} = \left[\begin{array}{cccc} 1 & 7 & 0 & 0 \\ 0 & 0 & 1 & 7 \end{array}\right]_{582} = \mathbf{Pl}(0,0,5,7,1,1)_{1382}$$

$$\ell_{24} = \left[\begin{array}{cccc} 1 & \gamma & 0 & 0 \\ 0 & 0 & 1 & \gamma \end{array}\right]_{212} = \left[\begin{array}{cccc} 1 & 2 & 0 & 0 \\ 0 & 0 & 1 & 2 \end{array}\right]_{212} = \mathbf{Pl}(0,0,6,2,1,1)_{1397}$$

$$\ell_{25} = \left[\begin{array}{cccc} 1 & \gamma^3 & 0 & 0 \\ 0 & 0 & 1 & \gamma^3 \end{array}\right]_{434} = \left[\begin{array}{cccc} 1 & 5 & 0 & 0 \\ 0 & 0 & 1 & 5 \end{array}\right]_{434} = \mathbf{Pl}(0,0,7,5,1,1)_{1412}$$

$$\ell_{26} = \left[\begin{array}{cccc} 1 & 0 & 1 & 0 \\ 0 & 1 & 0 & 1 \end{array}\right]_{81} = \left[\begin{array}{cccc} 1 & 0 & 1 & 0 \\ 0 & 1 & 0 & 1 \end{array}\right]_{81} = \mathbf{Pl}(1,1,0,0,1,1)_{1217}$$

$$\ell_{27} = \left[\begin{array}{cccc} 1 & 0 & \gamma^6 & 0 \\ 0 & 1 & 0 & \gamma^6 \end{array}\right]_{486} = \left[\begin{array}{cccc} 1 & 0 & 6 & 0 \\ 0 & 1 & 0 & 6 \end{array}\right]_{486} = \mathbf{Pl}(2,6,0,0,1,1)_{1218}$$

$$\ell_{28} = \left[\begin{array}{cccc} 1 & 0 & \gamma^2 & 0 \\ 0 & 1 & 0 & \gamma^2 \end{array}\right]_{324} = \left[\begin{array}{cccc} 1 & 0 & 4 & 0 \\ 0 & 1 & 0 & 4 \end{array}\right]_{324} = \mathbf{Pl}(3,4,0,0,1,1)_{1219}$$

$$\ell_{29} = \left[\begin{array}{cccc} 1 & 0 & \gamma^5 & 0 \\ 0 & 1 & 0 & \gamma^5 \end{array}\right]_{243} = \left[\begin{array}{cccc} 1 & 0 & 3 & 0 \\ 0 & 1 & 0 & 3 \end{array}\right]_{243} = \mathbf{Pl}(4,3,0,0,1,1)_{1220}$$

$$\ell_{30} = \left[\begin{array}{cccc} 1 & 0 & \gamma^4 & 0 \\ 0 & 1 & 0 & \gamma^4 \end{array}\right]_{567} = \left[\begin{array}{cccc} 1 & 0 & 7 & 0 \\ 0 & 1 & 0 & 7 \end{array}\right]_{567} = \mathbf{Pl}(5,7,0,0,1,1)_{1221}$$

$$\ell_{31} = \left[\begin{array}{cccc} 1 & 0 & \gamma & 0 \\ 0 & 1 & 0 & \gamma \end{array}\right]_{162} = \left[\begin{array}{cccc} 1 & 0 & 2 & 0 \\ 0 & 1 & 0 & 2 \end{array}\right]_{162} = \mathbf{Pl}(6,2,0,0,1,1)_{1222}$$

$$\ell_{32} = \left[\begin{array}{cccc} 1 & 0 & \gamma^3 & 0 \\ 0 & 1 & 0 & \gamma^3 \end{array}\right]_{405} = \left[\begin{array}{cccc} 1 & 0 & 5 & 0 \\ 0 & 1 & 0 & 5 \end{array}\right]_{405} = \mathbf{Pl}(7,5,0,0,1,1)_{1223}$$

$$\ell_{33} = \left[\begin{array}{cccc} 0 & 1 & 1 & 0 \\ 0 & 0 & 0 & 1 \end{array}\right]_{4689} = \left[\begin{array}{cccc} 0 & 1 & 1 & 0 \\ 0 & 0 & 0 & 1 \end{array}\right]_{4689} = \mathbf{Pl}(0,1,0,1,0,0)_{25}$$

$$\ell_{34} = \left[\begin{array}{cccc} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 1 \end{array}\right]_{4682} = \left[\begin{array}{cccc} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 1 \end{array}\right]_{4682} = \mathbf{Pl}(0,1,0,1,0,1)_{777}$$

$$\ell_{35} = \left[\begin{array}{cccc} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & \gamma^6 \end{array}\right]_{4732} = \left[\begin{array}{cccc} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 6 \end{array}\right]_{4732} = \mathbf{Pl}(0,6,0,6,0,1)_{857}$$

$$\ell_{36} = \left[\begin{array}{cccc} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & \gamma^2 \end{array}\right]_{4712} = \left[\begin{array}{cccc} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 4 \end{array}\right]_{4712} = \mathbf{Pl}(0,4,0,4,0,1)_{825}$$

$$\ell_{37} = \left[\begin{array}{cccc} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & \gamma^5 \end{array}\right]_{4702} = \left[\begin{array}{cccc} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 3 \end{array}\right]_{4702} = \mathbf{Pl}(0,3,0,3,0,1)_{809}$$

$$\ell_{38} = \left[\begin{array}{cccc} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & \gamma^4 \end{array}\right]_{4742} = \left[\begin{array}{cccc} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 7 \end{array}\right]_{4742} = \mathbf{Pl}(0,7,0,7,0,1)_{873}$$

$$\ell_{39} = \left[\begin{array}{cccc} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & \gamma \end{array}\right]_{4692} = \left[\begin{array}{cccc} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 2 \end{array}\right]_{4692} = \mathbf{Pl}(0,2,0,2,0,1)_{793}$$

$$\ell_{40} = \left[\begin{array}{cccc} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & \gamma^3 \end{array}\right]_{4722} = \left[\begin{array}{cccc} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 5 \end{array}\right]_{4722} = \mathbf{Pl}(0,5,0,5,0,1)_{841}$$

$$\ell_{41} = \begin{bmatrix} 0 & 1 & \gamma^6 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4734} = \begin{bmatrix} 0 & 1 & 6 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4734} = \mathbf{Pl}(0,6,0,1,0,0)_{30}$$

$$\ell_{42} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4683} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4683} = \mathbf{Pl}(0,1,0,2,0,1)_{792}$$

$$\ell_{43} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4727} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4727} = \mathbf{Pl}(0,6,0,1,0,1)_{782}$$

$$\ell_{44} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4713} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4713} = \mathbf{Pl}(0,4,0,5,0,1)_{840}$$

$$\ell_{45} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4705} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4705} = \mathbf{Pl}(0,3,0,6,0,1)_{854}$$

$$\ell_{46} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4738} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4738} = \mathbf{Pl}(0,7,0,3,0,1)_{813}$$

$$\ell_{47} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4694} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4694} = \mathbf{Pl}(0,2,0,4,0,1)_{823}$$

$$\ell_{48} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4724} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4724} = \mathbf{Pl}(0,5,0,7,0,1)_{871}$$

$$\ell_{49} = \begin{bmatrix} 0 & 1 & \gamma^2 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4716} = \begin{bmatrix} 0 & 1 & 4 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4716} = \mathbf{Pl}(0,4,0,1,0,0)_{28}$$

$$\ell_{50} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4684} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4684} = \mathbf{Pl}(0,1,0,3,0,1)_{807}$$

$$\ell_{51} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4733} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4733} = \mathbf{Pl}(0,6,0,7,0,1)_{872}$$

$$\ell_{52} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4709} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4709} = \mathbf{Pl}(0,4,0,1,0,1)_{780}$$

$$\ell_{53} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4704} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4704} = \mathbf{Pl}(0,3,0,5,0,1)_{839}$$

$$\ell_{54} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4739} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4739} = \mathbf{Pl}(0,7,0,4,0,1)_{828}$$

$$\ell_{55} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4696} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4696} = \mathbf{Pl}(0,2,0,6,0,1)_{853}$$

$$\ell_{56} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4719} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4719} = \mathbf{Pl}(0,5,0,2,0,1)_{796}$$

$$\ell_{57} = \begin{bmatrix} 0 & 1 & \gamma^5 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4707} = \begin{bmatrix} 0 & 1 & 3 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4707} = \mathbf{Pl}(0,3,0,1,0,0)_{27}$$

$$\ell_{58} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4685} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4685} = \mathbf{Pl}(0,1,0,4,0,1)_{822}$$

$$\ell_{59} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4728} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4728} = \mathbf{Pl}(0,6,0,2,0,1)_{797}$$

$$\ell_{60} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4715} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4715} = \mathbf{Pl}(0,4,0,7,0,1)_{870}$$

$$\ell_{61} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4700} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4700} = \mathbf{Pl}(0,3,0,1,0,1)_{779}$$

$$\ell_{62} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4741} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4741} = \mathbf{Pl}(0,7,0,6,0,1)_{858}$$

$$\ell_{63} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4695} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4695} = \mathbf{Pl}(0,2,0,5,0,1)_{838}$$

$$\ell_{64} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4720} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4720} = \mathbf{Pl}(0,5,0,3,0,1)_{811}$$

$$\ell_{65} = \begin{bmatrix} 0 & 1 & \gamma^4 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4743} = \begin{bmatrix} 0 & 1 & 7 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4743} = \mathbf{Pl}(0,7,0,1,0,0)_{31}$$

$$\ell_{66} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4686} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4686} = \mathbf{Pl}(0,1,0,5,0,1)_{837}$$

$$\ell_{67} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4730} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4730} = \mathbf{Pl}(0,6,0,4,0,1)_{827}$$

$$\ell_{68} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4711} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4711} = \mathbf{Pl}(0,4,0,3,0,1)_{810}$$

$$\ell_{69} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4701} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4701} = \mathbf{Pl}(0,3,0,2,0,1)_{794}$$

$$\ell_{70} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4736} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4736} = \mathbf{Pl}(0,7,0,1,0,1)_{783}$$

$$\ell_{71} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4697} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4697} = \mathbf{Pl}(0,2,0,7,0,1)_{868}$$

$$\ell_{72} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4723} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4723} = \mathbf{Pl}(0,5,0,6,0,1)_{856}$$

$$\ell_{73} = \begin{bmatrix} 0 & 1 & \gamma & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4698} = \begin{bmatrix} 0 & 1 & 2 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4698} = \mathbf{Pl}(0,2,0,1,0,0)_{26}$$

$$\ell_{74} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4687} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4687} = \mathbf{Pl}(0,1,0,6,0,1)_{852}$$

$$\ell_{75} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4729} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4729} = \mathbf{Pl}(0,6,0,3,0,1)_{812}$$

$$\ell_{76} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4710} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4710} = \mathbf{Pl}(0,4,0,2,0,1)_{795}$$

$$\ell_{77} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4706} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4706} = \mathbf{Pl}(0,3,0,7,0,1)_{869}$$

$$\ell_{78} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4740} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4740} = \mathbf{Pl}(0,7,0,5,0,1)_{843}$$

$$\ell_{79} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4691} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4691} = \mathbf{Pl}(0,2,0,1,0,1)_{778}$$

$$\ell_{80} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4721} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4721} = \mathbf{Pl}(0,5,0,4,0,1)_{826}$$

$$\ell_{81} = \begin{bmatrix} 0 & 1 & \gamma^3 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4725} = \begin{bmatrix} 0 & 1 & 5 & 0 \\ 0 & 0 & 0 & 1 \end{bmatrix}_{4725} = \mathbf{Pl}(0,5,0,1,0,0)_{29}$$

$$\ell_{82} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & \gamma^4 \end{bmatrix}_{4688} = \begin{bmatrix} 0 & 1 & 0 & 1 \\ 0 & 0 & 1 & 7 \end{bmatrix}_{4688} = \mathbf{Pl}(0,1,0,7,0,1)_{867}$$

$$\ell_{83} = \begin{bmatrix} 0 & 1 & 0 & \gamma^6 \\ 0 & 0 & 1 & \gamma^3 \end{bmatrix}_{4731} = \begin{bmatrix} 0 & 1 & 0 & 6 \\ 0 & 0 & 1 & 5 \end{bmatrix}_{4731} = \mathbf{Pl}(0,6,0,5,0,1)_{842}$$

$$\ell_{84} = \begin{bmatrix} 0 & 1 & 0 & \gamma^2 \\ 0 & 0 & 1 & \gamma^6 \end{bmatrix}_{4714} = \begin{bmatrix} 0 & 1 & 0 & 4 \\ 0 & 0 & 1 & 6 \end{bmatrix}_{4714} = \mathbf{Pl}(0,4,0,6,0,1)_{855}$$

$$\ell_{85} = \begin{bmatrix} 0 & 1 & 0 & \gamma^5 \\ 0 & 0 & 1 & \gamma^2 \end{bmatrix}_{4703} = \begin{bmatrix} 0 & 1 & 0 & 3 \\ 0 & 0 & 1 & 4 \end{bmatrix}_{4703} = \mathbf{Pl}(0,3,0,4,0,1)_{824}$$

$$\ell_{86} = \begin{bmatrix} 0 & 1 & 0 & \gamma^4 \\ 0 & 0 & 1 & \gamma \end{bmatrix}_{4737} = \begin{bmatrix} 0 & 1 & 0 & 7 \\ 0 & 0 & 1 & 2 \end{bmatrix}_{4737} = \mathbf{Pl}(0,7,0,2,0,1)_{798}$$

$$\ell_{87} = \begin{bmatrix} 0 & 1 & 0 & \gamma \\ 0 & 0 & 1 & \gamma^5 \end{bmatrix}_{4693} = \begin{bmatrix} 0 & 1 & 0 & 2 \\ 0 & 0 & 1 & 3 \end{bmatrix}_{4693} = \mathbf{Pl}(0,2,0,3,0,1)_{808}$$

$$\ell_{88} = \begin{bmatrix} 0 & 1 & 0 & \gamma^3 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4718} = \begin{bmatrix} 0 & 1 & 0 & 5 \\ 0 & 0 & 1 & 1 \end{bmatrix}_{4718} = \mathbf{Pl}(0,5,0,1,0,1)_{781}$$

Rank of lines: (0, 64, 4672, 4680, 4673, 4678, 4676, 4675, 4679, 4674, 4677, 4744, 4681, 4726, 4708, 4699, 4735, 4690, 4717, 138, 508, 360, 286, 582, 212, 434, 81, 486, 324, 243, 567, 162, 405, 4689, 4682, 4732, 4712, 4702, 4742, 4692, 4722, 4734, 4683, 4727, 4713, 4705, 4738, 4694, 4724, 4716, ...4737, 4693, 4718)
Rank of points on Klein quadric: (0, 2, 649, 17, 769, 844, 814, 799, 859, 784, 829, 1, 657, 662, 660, 659, 663, 658, 661, 1322, 1337, 1352, 1367, 1382, 1397, 1412, 1217, 1218, 1219, 1220, 1221, 1222, 1223, 25, 777, 857, 825, 809, 873, 793, 841, 30, 792, 782, 840, 854, 813, 823, 871, 28, ...798, 808, 781)

Eckardt Points

The surface has 0 Eckardt points:

Double Points

The surface has 64 Double points:
The double points on the surface are:

$P_0 = (1,0,0,0) = \ell_0 \cap \ell_1$
$P_5 = (1,1,0,0) = \ell_0 \cap \ell_{19}$
$P_6 = (2,1,0,0) = \ell_0 \cap \ell_{20}$
$P_7 = (3,1,0,0) = \ell_0 \cap \ell_{21}$
$P_8 = (4,1,0,0) = \ell_0 \cap \ell_{22}$
$P_9 = (5,1,0,0) = \ell_0 \cap \ell_{23}$
$P_{10} = (6,1,0,0) = \ell_0 \cap \ell_{24}$
$P_{11} = (7,1,0,0) = \ell_0 \cap \ell_{25}$
$P_{12} = (1,0,1,0) = \ell_1 \cap \ell_{26}$
$P_{13} = (2,0,1,0) = \ell_1 \cap \ell_{27}$
$P_{14} = (3,0,1,0) = \ell_1 \cap \ell_{28}$
$P_{15} = (4,0,1,0) = \ell_1 \cap \ell_{29}$
$P_{16} = (5,0,1,0) = \ell_1 \cap \ell_{30}$
$P_{17} = (6,0,1,0) = \ell_1 \cap \ell_{31}$
$P_{18} = (7,0,1,0) = \ell_1 \cap \ell_{32}$
$P_4 = (1,1,1,1) = \ell_{19} \cap \ell_{26}$
$P_{155} = (2,2,1,1) = \ell_{19} \cap \ell_{27}$
$P_{164} = (3,3,1,1) = \ell_{19} \cap \ell_{28}$
$P_{173} = (4,4,1,1) = \ell_{19} \cap \ell_{29}$
$P_{182} = (5,5,1,1) = \ell_{19} \cap \ell_{30}$
$P_{191} = (6,6,1,1) = \ell_{19} \cap \ell_{31}$
$P_{200} = (7,7,1,1) = \ell_{19} \cap \ell_{32}$
$P_{211} = (2,1,2,1) = \ell_{20} \cap \ell_{26}$
$P_{221} = (4,2,2,1) = \ell_{20} \cap \ell_{27}$
$P_{231} = (6,3,2,1) = \ell_{20} \cap \ell_{28}$
$P_{238} = (5,4,2,1) = \ell_{20} \cap \ell_{29}$
$P_{248} = (7,5,2,1) = \ell_{20} \cap \ell_{30}$
$P_{250} = (1,6,2,1) = \ell_{20} \cap \ell_{31}$
$P_{260} = (3,7,2,1) = \ell_{20} \cap \ell_{32}$
$P_{276} = (3,1,3,1) = \ell_{21} \cap \ell_{26}$
$P_{287} = (6,2,3,1) = \ell_{21} \cap \ell_{27}$
$P_{294} = (5,3,3,1) = \ell_{21} \cap \ell_{28}$
$P_{298} = (1,4,3,1) = \ell_{21} \cap \ell_{29}$
$P_{307} = (2,5,3,1) = \ell_{21} \cap \ell_{30}$
$P_{320} = (7,6,3,1) = \ell_{21} \cap \ell_{31}$
$P_{325} = (4,7,3,1) = \ell_{21} \cap \ell_{32}$
$P_{341} = (4,1,4,1) = \ell_{22} \cap \ell_{26}$
$P_{350} = (5,2,4,1) = \ell_{22} \cap \ell_{27}$
$P_{354} = (1,3,4,1) = \ell_{22} \cap \ell_{28}$
$P_{368} = (7,4,4,1) = \ell_{22} \cap \ell_{29}$

$P_{372} = (3,5,4,1) = \ell_{22} \cap \ell_{30}$
$P_{379} = (2,6,4,1) = \ell_{22} \cap \ell_{31}$
$P_{391} = (6,7,4,1) = \ell_{22} \cap \ell_{32}$
$P_{406} = (5,1,5,1) = \ell_{23} \cap \ell_{26}$
$P_{416} = (7,2,5,1) = \ell_{23} \cap \ell_{27}$
$P_{419} = (2,3,5,1) = \ell_{23} \cap \ell_{28}$
$P_{428} = (3,4,5,1) = \ell_{23} \cap \ell_{29}$
$P_{439} = (6,5,5,1) = \ell_{23} \cap \ell_{30}$
$P_{445} = (4,6,5,1) = \ell_{23} \cap \ell_{31}$
$P_{450} = (1,7,5,1) = \ell_{23} \cap \ell_{32}$
$P_{471} = (6,1,6,1) = \ell_{24} \cap \ell_{26}$
$P_{474} = (1,2,6,1) = \ell_{24} \cap \ell_{27}$
$P_{488} = (7,3,6,1) = \ell_{24} \cap \ell_{28}$
$P_{491} = (2,4,6,1) = \ell_{24} \cap \ell_{29}$
$P_{501} = (4,5,6,1) = \ell_{24} \cap \ell_{30}$
$P_{508} = (3,6,6,1) = \ell_{24} \cap \ell_{31}$
$P_{518} = (5,7,6,1) = \ell_{24} \cap \ell_{32}$
$P_{536} = (7,1,7,1) = \ell_{25} \cap \ell_{26}$
$P_{540} = (3,2,7,1) = \ell_{25} \cap \ell_{27}$
$P_{549} = (4,3,7,1) = \ell_{25} \cap \ell_{28}$
$P_{559} = (6,4,7,1) = \ell_{25} \cap \ell_{29}$
$P_{562} = (1,5,7,1) = \ell_{25} \cap \ell_{30}$
$P_{574} = (5,6,7,1) = \ell_{25} \cap \ell_{31}$
$P_{579} = (2,7,7,1) = \ell_{25} \cap \ell_{32}$

Single Points

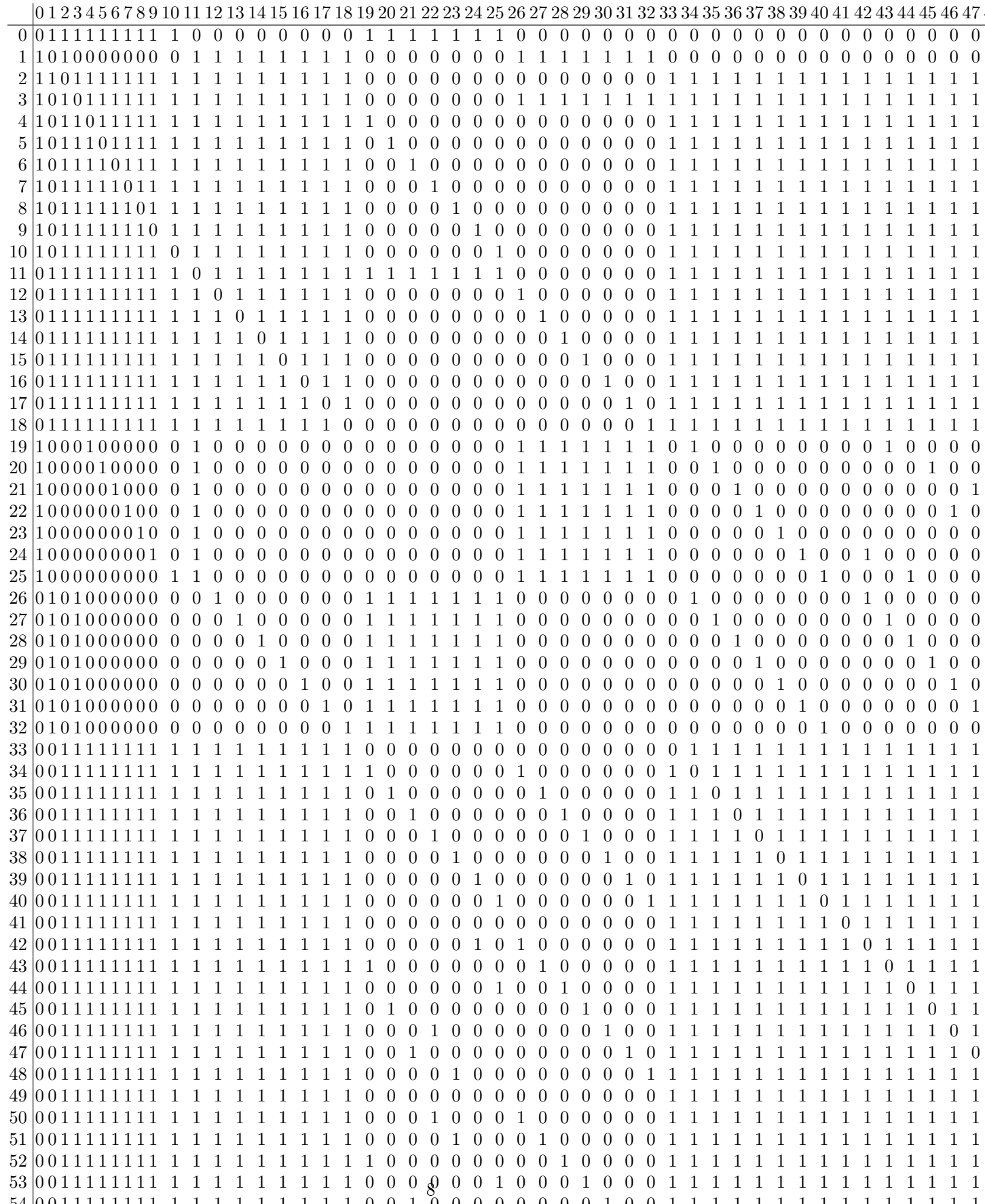
The surface has 0 single points:
The single points on the surface are:

The single points on the surface are:

Points on surface but on no line

The surface has 0 points not on any line:
The points on the surface but not on lines are:

Line Intersection Graph



Neighbor sets in the line intersection graph:
Line 0 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}
in point	P_0	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_5	P_6	P_7	P_8	P_9	P_{10}	P_{11}

Line 1 intersects

Line	ℓ_0	ℓ_2	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}
in point	P_0	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{12}	P_{13}	P_{14}	P_{15}	P_{16}	P_{17}	P_{18}

Line 2 intersects

Line	ℓ_0	ℓ_1	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}	ℓ_{34}	ℓ_{35}	ℓ_{36}
in point	P_1	P_2	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{19}	P_{19}	P_{19}	P_{19}

Line 3 intersects

Line	ℓ_0	ℓ_2	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{26}	ℓ_{27}	ℓ_{28}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_3	P_{82}	P_{90}	P_{98}	P_{106}	P_{114}	P_{122}	P_{130}	P_{82}	P_{90}	P_{98}

Line 4 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{19}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{138}	P_{146}	P_{153}	P_{161}	P_{169}	P_{177}	P_{185}	P_{193}	P_{138}	P_{146}

Line 5 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_4	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{20}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{201}	P_{209}	P_{217}	P_{225}	P_{233}	P_{241}	P_{249}	P_{257}	P_{201}	P_{217}

Line 6 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{21}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{265}	P_{273}	P_{281}	P_{289}	P_{297}	P_{305}	P_{313}	P_{321}	P_{265}	P_{289}

Line 7 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{22}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{329}	P_{337}	P_{345}	P_{353}	P_{361}	P_{369}	P_{377}	P_{385}	P_{329}	P_{361}

Line 8 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{23}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{393}	P_{401}	P_{409}	P_{417}	P_{425}	P_{433}	P_{441}	P_{449}	P_{393}	P_{433}

Line 9 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{24}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{457}	P_{465}	P_{473}	P_{481}	P_{489}	P_{497}	P_{505}	P_{513}	P_{457}	P_{505}

Line 10 intersects

Line	ℓ_0	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{25}	ℓ_{33}
in point	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_1	P_{521}	P_{529}	P_{537}	P_{545}	P_{553}	P_{561}	P_{569}	P_{577}	P_{521}	P_{577}

Line 11 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{19}	ℓ_{20}
in point	P_2	P_2	P_3	P_{138}	P_{201}	P_{265}	P_{329}	P_{393}	P_{457}	P_{521}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{138}	P_{201}

Line 12 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{26}	ℓ_{33}	ℓ
in point	P_2	P_2	P_{82}	P_{146}	P_{209}	P_{273}	P_{337}	P_{401}	P_{465}	P_{529}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{82}	P_{146}	P

Line 13 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{27}	ℓ_{33}	
in point	P_2	P_2	P_{90}	P_{153}	P_{217}	P_{281}	P_{345}	P_{409}	P_{473}	P_{537}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{90}	P_{217}	P

Line 14 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{28}	ℓ_{33}	
in point	P_2	P_2	P_{98}	P_{161}	P_{225}	P_{289}	P_{353}	P_{417}	P_{481}	P_{545}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{98}	P_{289}	P

Line 15 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{29}	ℓ_{33}
in point	P_2	P_2	P_{106}	P_{169}	P_{233}	P_{297}	P_{361}	P_{425}	P_{489}	P_{553}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{106}	P_{361}

Line 16 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{17}	ℓ_{18}	ℓ_{30}	ℓ_{33}
in point	P_2	P_2	P_{114}	P_{177}	P_{241}	P_{305}	P_{369}	P_{433}	P_{497}	P_{561}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{114}	P_{433}

Line 17 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{18}	ℓ_{31}	ℓ_{33}
in point	P_2	P_2	P_{122}	P_{185}	P_{249}	P_{313}	P_{377}	P_{441}	P_{505}	P_{569}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{122}	P_{505}

Line 18 intersects

Line	ℓ_1	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{32}	ℓ_{33}
in point	P_2	P_2	P_{130}	P_{193}	P_{257}	P_{321}	P_{385}	P_{449}	P_{513}	P_{577}	P_2	P_2	P_2	P_2	P_2	P_2	P_2	P_{130}	P_{577}

Line 19 intersects

Line	ℓ_0	ℓ_4	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{34}	ℓ_{43}	ℓ_{52}	ℓ_{61}	ℓ_{70}	ℓ_{79}	ℓ_{88}
in point	P_5	P_{138}	P_{138}	P_4	P_{155}	P_{164}	P_{173}	P_{182}	P_{191}	P_{200}	P_{138}	P_{138}	P_{138}	P_{138}	P_{138}	P_{138}	P_{138}

Line 20 intersects

Line	ℓ_0	ℓ_5	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{35}	ℓ_{45}	ℓ_{55}	ℓ_{62}	ℓ_{72}	ℓ_{74}	ℓ_{84}
in point	P_6	P_{201}	P_{201}	P_{211}	P_{221}	P_{231}	P_{238}	P_{248}	P_{250}	P_{260}	P_{201}	P_{201}	P_{201}	P_{201}	P_{201}	P_{201}	P_{201}

Line 21 intersects

Line	ℓ_0	ℓ_6	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{36}	ℓ_{47}	ℓ_{54}	ℓ_{58}	ℓ_{67}	ℓ_{80}	ℓ_{85}
in point	P_7	P_{265}	P_{265}	P_{276}	P_{287}	P_{294}	P_{298}	P_{307}	P_{320}	P_{325}	P_{265}	P_{265}	P_{265}	P_{265}	P_{265}	P_{265}	P_{265}

Line 22 intersects

Line	ℓ_0	ℓ_7	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{37}	ℓ_{46}	ℓ_{50}	ℓ_{64}	ℓ_{68}	ℓ_{75}	ℓ_{87}
in point	P_8	P_{329}	P_{329}	P_{341}	P_{350}	P_{354}	P_{368}	P_{372}	P_{379}	P_{391}	P_{329}	P_{329}	P_{329}	P_{329}	P_{329}	P_{329}	P_{329}

Line 23 intersects

Line	ℓ_0	ℓ_8	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{38}	ℓ_{48}	ℓ_{51}	ℓ_{60}	ℓ_{71}	ℓ_{77}	ℓ_{82}
in point	P_9	P_{393}	P_{393}	P_{406}	P_{416}	P_{419}	P_{428}	P_{439}	P_{445}	P_{450}	P_{393}	P_{393}	P_{393}	P_{393}	P_{393}	P_{393}	P_{393}

Line 24 intersects

Line	ℓ_0	ℓ_9	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{39}	ℓ_{42}	ℓ_{56}	ℓ_{59}	ℓ_{69}	ℓ_{76}	ℓ_{86}
in point	P_{10}	P_{457}	P_{457}	P_{471}	P_{474}	P_{488}	P_{491}	P_{501}	P_{508}	P_{518}	P_{457}	P_{457}	P_{457}	P_{457}	P_{457}	P_{457}	P_{457}

Line 25 intersects

Line	ℓ_0	ℓ_{10}	ℓ_{11}	ℓ_{26}	ℓ_{27}	ℓ_{28}	ℓ_{29}	ℓ_{30}	ℓ_{31}	ℓ_{32}	ℓ_{40}	ℓ_{44}	ℓ_{53}	ℓ_{63}	ℓ_{66}	ℓ_{78}	ℓ_{83}
in point	P_{11}	P_{521}	P_{521}	P_{536}	P_{540}	P_{549}	P_{559}	P_{562}	P_{574}	P_{579}	P_{521}	P_{521}	P_{521}	P_{521}	P_{521}	P_{521}	P_{521}

Line 26 intersects

Line	ℓ_1	ℓ_3	ℓ_{12}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{34}	ℓ_{42}	ℓ_{50}	ℓ_{58}	ℓ_{66}	ℓ_{74}	ℓ_{82}
in point	P_{12}	P_{82}	P_{82}	P_4	P_{211}	P_{276}	P_{341}	P_{406}	P_{471}	P_{536}	P_{82}	P_{82}	P_{82}	P_{82}	P_{82}	P_{82}	P_{82}

Line 27 intersects

Line	ℓ_1	ℓ_3	ℓ_{13}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{35}	ℓ_{43}	ℓ_{51}	ℓ_{59}	ℓ_{67}	ℓ_{75}	ℓ_{83}
in point	P_{13}	P_{90}	P_{90}	P_{155}	P_{221}	P_{287}	P_{350}	P_{416}	P_{474}	P_{540}	P_{90}	P_{90}	P_{90}	P_{90}	P_{90}	P_{90}	P_{90}

Line 28 intersects

Line	ℓ_1	ℓ_3	ℓ_{14}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{36}	ℓ_{44}	ℓ_{52}	ℓ_{60}	ℓ_{68}	ℓ_{76}	ℓ_{84}
in point	P_{14}	P_{98}	P_{98}	P_{164}	P_{231}	P_{294}	P_{354}	P_{419}	P_{488}	P_{549}	P_{98}	P_{98}	P_{98}	P_{98}	P_{98}	P_{98}	P_{98}

Line 29 intersects

Line	ℓ_1	ℓ_3	ℓ_{15}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{37}	ℓ_{45}	ℓ_{53}	ℓ_{61}	ℓ_{69}	ℓ_{77}	ℓ_{85}
in point	P_{15}	P_{106}	P_{106}	P_{173}	P_{238}	P_{298}	P_{368}	P_{428}	P_{491}	P_{559}	P_{106}	P_{106}	P_{106}	P_{106}	P_{106}	P_{106}	P_{106}

Line 30 intersects

Line	ℓ_1	ℓ_3	ℓ_{16}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{38}	ℓ_{46}	ℓ_{54}	ℓ_{62}	ℓ_{70}	ℓ_{78}	ℓ_{86}
in point	P_{16}	P_{114}	P_{114}	P_{182}	P_{248}	P_{307}	P_{372}	P_{439}	P_{501}	P_{562}	P_{114}	P_{114}	P_{114}	P_{114}	P_{114}	P_{114}	P_{114}

Line 31 intersects

Line	ℓ_1	ℓ_3	ℓ_{17}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{39}	ℓ_{47}	ℓ_{55}	ℓ_{63}	ℓ_{71}	ℓ_{79}	ℓ_{87}
in point	P_{17}	P_{122}	P_{122}	P_{191}	P_{250}	P_{320}	P_{379}	P_{445}	P_{508}	P_{574}	P_{122}	P_{122}	P_{122}	P_{122}	P_{122}	P_{122}	P_{122}

Line 32 intersects

Line	ℓ_1	ℓ_3	ℓ_{18}	ℓ_{19}	ℓ_{20}	ℓ_{21}	ℓ_{22}	ℓ_{23}	ℓ_{24}	ℓ_{25}	ℓ_{40}	ℓ_{48}	ℓ_{56}	ℓ_{64}	ℓ_{72}	ℓ_{80}	ℓ_{88}
in point	P_{18}	P_{130}	P_{130}	P_{200}	P_{260}	P_{325}	P_{391}	P_{450}	P_{518}	P_{579}	P_{130}	P_{130}	P_{130}	P_{130}	P_{130}	P_{130}	P_{130}

Line 33 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{34}
in point	P_{19}	P_3	P_{146}	P_{217}	P_{289}	P_{361}	P_{433}	P_{505}	P_{577}	P_3	P_{146}	P_{217}	P_{289}	P_{361}	P_{433}	P_{505}	P_{577}	P_{19}

Line 34 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{19}	P_{82}	P_{138}	P_{225}	P_{281}	P_{369}	P_{425}	P_{513}	P_{569}	P_{138}	P_{82}	P_{281}	P_{225}	P_{425}	P_{369}	P_{569}	P_{513}	P

Line 35 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{19}	P_{90}	P_{161}	P_{201}	P_{273}	P_{377}	P_{449}	P_{489}	P_{561}	P_{201}	P_{273}	P_{90}	P_{161}	P_{489}	P_{561}	P_{377}	P_{449}	P

Line 36 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{19}	P_{98}	P_{153}	P_{209}	P_{265}	P_{385}	P_{441}	P_{497}	P_{553}	P_{265}	P_{209}	P_{153}	P_{98}	P_{553}	P_{497}	P_{441}	P_{385}	P

Line 37 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{19}	P_{106}	P_{177}	P_{249}	P_{321}	P_{329}	P_{401}	P_{473}	P_{545}	P_{329}	P_{401}	P_{473}	P_{545}	P_{106}	P_{177}	P_{249}	P_{321}

Line 38 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{19}	P_{114}	P_{169}	P_{257}	P_{313}	P_{337}	P_{393}	P_{481}	P_{537}	P_{393}	P_{337}	P_{537}	P_{481}	P_{169}	P_{114}	P_{313}	P_{257}

Line 39 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{19}	P_{122}	P_{193}	P_{233}	P_{305}	P_{345}	P_{417}	P_{457}	P_{529}	P_{457}	P_{529}	P_{345}	P_{417}	P_{233}	P_{305}	P_{122}	P_{193}

Line 40 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{19}	P_{130}	P_{185}	P_{241}	P_{297}	P_{353}	P_{409}	P_{465}	P_{521}	P_{521}	P_{465}	P_{409}	P_{353}	P_{297}	P_{241}	P_{185}	P_{130}

Line 41 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}
in point	P_{27}	P_3	P_{153}	P_{233}	P_{313}	P_{369}	P_{449}	P_{465}	P_{545}	P_3	P_{465}	P_{153}	P_{545}	P_{233}	P_{369}	P_{313}	P_{449}	P_3

Line 42 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{27}	P_{82}	P_{161}	P_{241}	P_{321}	P_{361}	P_{441}	P_{457}	P_{537}	P_{457}	P_{82}	P_{537}	P_{161}	P_{361}	P_{241}	P_{441}	P_{321}	P

Line 43 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{27}	P_{90}	P_{138}	P_{249}	P_{297}	P_{385}	P_{433}	P_{481}	P_{529}	P_{138}	P_{529}	P_{90}	P_{481}	P_{297}	P_{433}	P_{249}	P_{385}	P

Line 44 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{27}	P_{98}	P_{146}	P_{257}	P_{305}	P_{377}	P_{425}	P_{473}	P_{521}	P_{521}	P_{146}	P_{473}	P_{98}	P_{425}	P_{305}	P_{377}	P_{257}	P

Line 45 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{27}	P_{106}	P_{185}	P_{201}	P_{281}	P_{337}	P_{417}	P_{497}	P_{577}	P_{201}	P_{337}	P_{281}	P_{417}	P_{106}	P_{497}	P_{185}	P_{577}

Line 46 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{27}	P_{114}	P_{193}	P_{209}	P_{289}	P_{329}	P_{409}	P_{489}	P_{569}	P_{329}	P_{209}	P_{409}	P_{289}	P_{489}	P_{114}	P_{569}	P_{193}

Line 47 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{27}	P_{122}	P_{169}	P_{217}	P_{265}	P_{353}	P_{401}	P_{513}	P_{561}	P_{265}	P_{401}	P_{217}	P_{353}	P_{169}	P_{561}	P_{122}	P_{513}

Line 48 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{27}	P_{130}	P_{177}	P_{225}	P_{273}	P_{345}	P_{393}	P_{505}	P_{553}	P_{393}	P_{273}	P_{345}	P_{225}	P_{553}	P_{177}	P_{505}	P_{130}

Line 49 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}
in point	P_{35}	P_3	P_{161}	P_{249}	P_{305}	P_{337}	P_{409}	P_{513}	P_{553}	P_3	P_{337}	P_{409}	P_{161}	P_{553}	P_{305}	P_{249}	P_{513}	P_3

Line 50 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{35}	P_{82}	P_{153}	P_{257}	P_{297}	P_{329}	P_{417}	P_{505}	P_{561}	P_{329}	P_{82}	P_{153}	P_{417}	P_{297}	P_{561}	P_{505}	P_{257}	P

Line 51 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{35}	P_{90}	P_{146}	P_{233}	P_{321}	P_{353}	P_{393}	P_{497}	P_{569}	P_{393}	P_{146}	P_{90}	P_{353}	P_{233}	P_{497}	P_{569}	P_{321}	P

Line 52 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{35}	P_{98}	P_{138}	P_{241}	P_{313}	P_{345}	P_{401}	P_{489}	P_{577}	P_{138}	P_{401}	P_{345}	P_{98}	P_{489}	P_{241}	P_{313}	P_{577}	P

Line 53 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{35}	P_{106}	P_{193}	P_{217}	P_{273}	P_{369}	P_{441}	P_{481}	P_{521}	P_{521}	P_{273}	P_{217}	P_{481}	P_{106}	P_{369}	P_{441}	P_{193}

Line 54 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{35}	P_{114}	P_{185}	P_{225}	P_{265}	P_{361}	P_{449}	P_{473}	P_{529}	P_{265}	P_{529}	P_{473}	P_{225}	P_{361}	P_{114}	P_{185}	P_{449}

Line 55 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{35}	P_{122}	P_{177}	P_{201}	P_{289}	P_{385}	P_{425}	P_{465}	P_{537}	P_{201}	P_{465}	P_{537}	P_{289}	P_{425}	P_{177}	P_{122}	P_{385}

Line 56 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{35}	P_{130}	P_{169}	P_{209}	P_{281}	P_{377}	P_{433}	P_{457}	P_{545}	P_{457}	P_{209}	P_{281}	P_{545}	P_{169}	P_{433}	P_{377}	P_{130}

Line 57 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}
in point	P_{43}	P_3	P_{169}	P_{241}	P_{273}	P_{385}	P_{417}	P_{473}	P_{569}	P_3	P_{273}	P_{473}	P_{417}	P_{169}	P_{241}	P_{569}	P_{385}	P_3

Line 58 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{43}	P_{82}	P_{177}	P_{233}	P_{265}	P_{377}	P_{409}	P_{481}	P_{577}	P_{265}	P_{82}	P_{409}	P_{481}	P_{233}	P_{177}	P_{377}	P_{577}	P

Line 59 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{43}	P_{90}	P_{185}	P_{257}	P_{289}	P_{369}	P_{401}	P_{457}	P_{553}	P_{457}	P_{401}	P_{90}	P_{289}	P_{553}	P_{369}	P_{185}	P_{257}	P

Line 60 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{43}	P_{98}	P_{193}	P_{249}	P_{281}	P_{361}	P_{393}	P_{465}	P_{561}	P_{393}	P_{465}	P_{281}	P_{98}	P_{361}	P_{561}	P_{249}	P_{193}	P

Line 61 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{43}	P_{106}	P_{138}	P_{209}	P_{305}	P_{353}	P_{449}	P_{505}	P_{537}	P_{138}	P_{209}	P_{537}	P_{353}	P_{106}	P_{305}	P_{505}	P_{449}

Line 62 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{43}	P_{114}	P_{146}	P_{201}	P_{297}	P_{345}	P_{441}	P_{513}	P_{545}	P_{201}	P_{146}	P_{345}	P_{545}	P_{297}	P_{114}	P_{441}	P_{513}

Line 63 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{43}	P_{122}	P_{153}	P_{225}	P_{321}	P_{337}	P_{433}	P_{489}	P_{521}	P_{521}	P_{337}	P_{153}	P_{225}	P_{489}	P_{433}	P_{122}	P_{321}

Line 64 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{43}	P_{130}	P_{161}	P_{217}	P_{313}	P_{329}	P_{425}	P_{497}	P_{529}	P_{329}	P_{529}	P_{217}	P_{161}	P_{425}	P_{497}	P_{313}	P_{130}

Line 65 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}
in point	P_{51}	P_3	P_{177}	P_{257}	P_{281}	P_{353}	P_{441}	P_{489}	P_{529}	P_3	P_{529}	P_{281}	P_{353}	P_{489}	P_{177}	P_{441}	P_{257}	P_3

Line 66 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{51}	P_{82}	P_{169}	P_{249}	P_{289}	P_{345}	P_{449}	P_{497}	P_{521}	P_{521}	P_{82}	P_{345}	P_{289}	P_{169}	P_{497}	P_{249}	P_{449}	P

Line 67 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{51}	P_{90}	P_{193}	P_{241}	P_{265}	P_{337}	P_{425}	P_{505}	P_{545}	P_{265}	P_{337}	P_{90}	P_{545}	P_{425}	P_{241}	P_{505}	P_{193}	P

Line 68 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{51}	P_{98}	P_{185}	P_{233}	P_{273}	P_{329}	P_{433}	P_{513}	P_{537}	P_{329}	P_{273}	P_{537}	P_{98}	P_{233}	P_{433}	P_{185}	P_{513}	P

Line 69 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{51}	P_{106}	P_{146}	P_{225}	P_{313}	P_{385}	P_{409}	P_{457}	P_{561}	P_{457}	P_{146}	P_{409}	P_{225}	P_{106}	P_{561}	P_{313}	P_{385}

Line 70 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{51}	P_{114}	P_{138}	P_{217}	P_{321}	P_{377}	P_{417}	P_{465}	P_{553}	P_{138}	P_{465}	P_{217}	P_{417}	P_{553}	P_{114}	P_{377}	P_{321}

Line 71 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{51}	P_{122}	P_{161}	P_{209}	P_{297}	P_{369}	P_{393}	P_{473}	P_{577}	P_{393}	P_{209}	P_{473}	P_{161}	P_{297}	P_{369}	P_{122}	P_{577}

Line 72 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{51}	P_{130}	P_{153}	P_{201}	P_{305}	P_{361}	P_{401}	P_{481}	P_{569}	P_{201}	P_{401}	P_{153}	P_{481}	P_{361}	P_{305}	P_{569}	P_{130}

Line 73 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}
in point	P_{59}	P_3	P_{185}	P_{209}	P_{321}	P_{345}	P_{425}	P_{481}	P_{561}	P_3	P_{209}	P_{345}	P_{481}	P_{425}	P_{561}	P_{185}	P_{321}	P_3

Line 74 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{59}	P_{82}	P_{193}	P_{201}	P_{313}	P_{353}	P_{433}	P_{473}	P_{553}	P_{201}	P_{82}	P_{473}	P_{353}	P_{553}	P_{433}	P_{313}	P_{193}	P

Line 75 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{59}	P_{90}	P_{169}	P_{225}	P_{305}	P_{329}	P_{441}	P_{465}	P_{577}	P_{329}	P_{465}	P_{90}	P_{225}	P_{169}	P_{305}	P_{441}	P_{577}	P

Line 76 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{59}	P_{98}	P_{177}	P_{217}	P_{297}	P_{337}	P_{449}	P_{457}	P_{569}	P_{457}	P_{337}	P_{217}	P_{98}	P_{297}	P_{177}	P_{569}	P_{449}	P

Line 77 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{59}	P_{106}	P_{153}	P_{241}	P_{289}	P_{377}	P_{393}	P_{513}	P_{529}	P_{393}	P_{529}	P_{153}	P_{289}	P_{106}	P_{241}	P_{377}	P_{513}

Line 78 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{59}	P_{114}	P_{161}	P_{233}	P_{281}	P_{385}	P_{401}	P_{505}	P_{521}	P_{521}	P_{401}	P_{281}	P_{161}	P_{233}	P_{114}	P_{505}	P_{385}

Line 79 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{59}	P_{122}	P_{138}	P_{257}	P_{273}	P_{361}	P_{409}	P_{497}	P_{545}	P_{138}	P_{273}	P_{409}	P_{545}	P_{361}	P_{497}	P_{122}	P_{257}

Line 80 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{59}	P_{130}	P_{146}	P_{249}	P_{265}	P_{369}	P_{417}	P_{489}	P_{537}	P_{265}	P_{146}	P_{537}	P_{417}	P_{489}	P_{369}	P_{249}	P_{130}

Line 81 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ_{33}
in point	P_{67}	P_3	P_{193}	P_{225}	P_{297}	P_{377}	P_{401}	P_{497}	P_{537}	P_3	P_{401}	P_{537}	P_{225}	P_{297}	P_{497}	P_{377}	P_{193}	P_3

Line 82 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{67}	P_{82}	P_{185}	P_{217}	P_{305}	P_{385}	P_{393}	P_{489}	P_{545}	P_{393}	P_{82}	P_{217}	P_{545}	P_{489}	P_{305}	P_{185}	P_{385}	P

Line 83 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{67}	P_{90}	P_{177}	P_{209}	P_{313}	P_{361}	P_{417}	P_{513}	P_{521}	P_{521}	P_{209}	P_{90}	P_{417}	P_{361}	P_{177}	P_{313}	P_{513}	P

Line 84 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}	ℓ
in point	P_{67}	P_{98}	P_{169}	P_{201}	P_{321}	P_{369}	P_{409}	P_{505}	P_{529}	P_{201}	P_{529}	P_{409}	P_{98}	P_{169}	P_{369}	P_{505}	P_{321}	P

Line 85 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{67}	P_{106}	P_{161}	P_{257}	P_{265}	P_{345}	P_{433}	P_{465}	P_{569}	P_{265}	P_{465}	P_{345}	P_{161}	P_{106}	P_{433}	P_{569}	P_{257}

Line 86 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{67}	P_{114}	P_{153}	P_{249}	P_{273}	P_{353}	P_{425}	P_{457}	P_{577}	P_{457}	P_{273}	P_{153}	P_{353}	P_{425}	P_{114}	P_{249}	P_{577}

Line 87 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{67}	P_{122}	P_{146}	P_{241}	P_{281}	P_{329}	P_{449}	P_{481}	P_{553}	P_{329}	P_{146}	P_{281}	P_{481}	P_{553}	P_{241}	P_{122}	P_{449}

Line 88 intersects

Line	ℓ_2	ℓ_3	ℓ_4	ℓ_5	ℓ_6	ℓ_7	ℓ_8	ℓ_9	ℓ_{10}	ℓ_{11}	ℓ_{12}	ℓ_{13}	ℓ_{14}	ℓ_{15}	ℓ_{16}	ℓ_{17}	ℓ_{18}
in point	P_{67}	P_{130}	P_{138}	P_{233}	P_{289}	P_{337}	P_{441}	P_{473}	P_{561}	P_{138}	P_{337}	P_{473}	P_{289}	P_{233}	P_{561}	P_{441}	P_{130}

The surface has 137 points:
The points on the surface are:

$0: P_0 = (1,0,0,0)$
$1: P_1 = (0,1,0,0)$
$2: P_2 = (0,0,1,0)$
$3: P_3 = (0,0,0,1)$
$4: P_4 = (1,1,1,1)$
$5: P_5 = (1,1,0,0)$
$6: P_6 = (2,1,0,0)$
$7: P_7 = (3,1,0,0)$
$8: P_8 = (4,1,0,0)$
$9: P_9 = (5,1,0,0)$
$10: P_{10} = (6,1,0,0)$
$11: P_{11} = (7,1,0,0)$
$12: P_{12} = (1,0,1,0)$
$13: P_{13} = (2,0,1,0)$
$14: P_{14} = (3,0,1,0)$
$15: P_{15} = (4,0,1,0)$
$16: P_{16} = (5,0,1,0)$
$17: P_{17} = (6,0,1,0)$
$18: P_{18} = (7,0,1,0)$
$19: P_{19} = (0,1,1,0)$
$20: P_{27} = (0,2,1,0)$
$21: P_{35} = (0,3,1,0)$
$22: P_{43} = (0,4,1,0)$
$23: P_{51} = (0,5,1,0)$
$24: P_{59} = (0,6,1,0)$
$25: P_{67} = (0,7,1,0)$
$26: P_{82} = (0,1,0,1)$
$27: P_{90} = (0,2,0,1)$
$28: P_{98} = (0,3,0,1)$
$29: P_{106} = (0,4,0,1)$
$30: P_{114} = (0,5,0,1)$
$31: P_{122} = (0,6,0,1)$
$32: P_{130} = (0,7,0,1)$
$33: P_{138} = (0,0,1,1)$
$34: P_{146} = (0,1,1,1)$
$35: P_{153} = (0,2,1,1)$
$36: P_{155} = (2,2,1,1)$
$37: P_{161} = (0,3,1,1)$
$38: P_{164} = (3,3,1,1)$
$39: P_{169} = (0,4,1,1)$
$40: P_{173} = (4,4,1,1)$
$41: P_{177} = (0,5,1,1)$
$42: P_{182} = (5,5,1,1)$
$43: P_{185} = (0,6,1,1)$
$44: P_{191} = (6,6,1,1)$
$45: P_{193} = (0,7,1,1)$
$46: P_{200} = (7,7,1,1)$
$47: P_{201} = (0,0,2,1)$
$48: P_{209} = (0,1,2,1)$
$49: P_{211} = (2,1,2,1)$
$50: P_{217} = (0,2,2,1)$
$51: P_{221} = (4,2,2,1)$
$52: P_{225} = (0,3,2,1)$
$53: P_{231} = (6,3,2,1)$
$54: P_{233} = (0,4,2,1)$
$55: P_{238} = (5,4,2,1)$
$56: P_{241} = (0,5,2,1)$
$57: P_{248} = (7,5,2,1)$
$58: P_{249} = (0,6,2,1)$
$59: P_{250} = (1,6,2,1)$
$60: P_{257} = (0,7,2,1)$
$61: P_{260} = (3,7,2,1)$
$62: P_{265} = (0,0,3,1)$
$63: P_{273} = (0,1,3,1)$
$64: P_{276} = (3,1,3,1)$
$65: P_{281} = (0,2,3,1)$
$66: P_{287} = (6,2,3,1)$
$67: P_{289} = (0,3,3,1)$
$68: P_{294} = (5,3,3,1)$
$69: P_{297} = (0,4,3,1)$
$70: P_{298} = (1,4,3,1)$
$71: P_{305} = (0,5,3,1)$
$72: P_{307} = (2,5,3,1)$
$73: P_{313} = (0,6,3,1)$
$74: P_{320} = (7,6,3,1)$
$75: P_{321} = (0,7,3,1)$
$76: P_{325} = (4,7,3,1)$
$77: P_{329} = (0,0,4,1)$
$78: P_{337} = (0,1,4,1)$
$79: P_{341} = (4,1,4,1)$
$80: P_{345} = (0,2,4,1)$
$81: P_{350} = (5,2,4,1)$
$82: P_{353} = (0,3,4,1)$
$83: P_{354} = (1,3,4,1)$
$84: P_{361} = (0,4,4,1)$
$85: P_{368} = (7,4,4,1)$
$86: P_{369} = (0,5,4,1)$
$87: P_{372} = (3,5,4,1)$
$88: P_{377} = (0,6,4,1)$
$89: P_{379} = (2,6,4,1)$
$90: P_{385} = (0,7,4,1)$
$91: P_{391} = (6,7,4,1)$
$92: P_{393} = (0,0,5,1)$
$93: P_{401} = (0,1,5,1)$
$94: P_{406} = (5,1,5,1)$
$95: P_{409} = (0,2,5,1)$
$96: P_{416} = (7,2,5,1)$
$97: P_{417} = (0,3,5,1)$
$98: P_{419} = (2,3,5,1)$
$99: P_{425} = (0,4,5,1)$
$100: P_{428} = (3,4,5,1)$
$101: P_{433} = (0,5,5,1)$
$102: P_{439} = (6,5,5,1)$
$103: P_{441} = (0,6,5,1)$
$104: P_{445} = (4,6,5,1)$
$105: P_{449} = (0,7,5,1)$
$106: P_{450} = (1,7,5,1)$
$107: P_{457} = (0,0,6,1)$
$108: P_{465} = (0,1,6,1)$
$109: P_{471} = (6,1,6,1)$
$110: P_{473} = (0,2,6,1)$
$111: P_{474} = (1,2,6,1)$
$112: P_{481} = (0,3,6,1)$
$113: P_{488} = (7,3,6,1)$
$114: P_{489} = (0,4,6,1)$
$115: P_{491} = (2,4,6,1)$
$116: P_{497} = (0,5,6,1)$
$117: P_{501} = (4,5,6,1)$
$118: P_{505} = (0,6,6,1)$
$119: P_{508} = (3,6,6,1)$
$120: P_{513} = (0,7,6,1)$
$121: P_{518} = (5,7,6,1)$
$122: P_{521} = (0,0,7,1)$
$123: P_{529} = (0,1,7,1)$
$124: P_{536} = (7,1,7,1)$
$125: P_{537} = (0,2,7,1)$
$126: P_{540} = (3,2,7,1)$
$127: P_{545} = (0,3,7,1)$
$128: P_{549} = (4,3,7,1)$
$129: P_{553} = (0,4,7,1)$
$130: P_{559} = (6,4,7,1)$
$131: P_{561} = (0,5,7,1)$
$132: P_{562} = (1,5,7,1)$
$133: P_{569} = (0,6,7,1)$
$134: P_{574} = (5,6,7,1)$
$135: P_{577} = (0,7,7,1)$
$136: P_{579} = (2,7,7,1)$