$$ \left[ \begin{matrix} (1-\alpha\_{11k}) & -\alpha\_{12k} & -\alpha\_{13k} & -\alpha\_{14k} & -\alpha\_{15k} & -\alpha\_{16k} & -\alpha\_{17k} & -\alpha\_{18k} & -\alpha\_{19k} \ -\alpha\_{21k} & (1-\alpha\_{22k}) & -\alpha\_{23k} & -\alpha\_{24k} & -\alpha\_{25k} & -\alpha\_{26k} & -\alpha\_{27k} & -\alpha\_{28k} & -\alpha\_{29k} \ -\alpha\_{31k} & -\alpha\_{32k} & (1-\alpha\_{33k}) & -\alpha\_{34k} & -\alpha\_{35k} & -\alpha\_{36k} & -\alpha\_{37k} & -\alpha\_{38k} & -\alpha\_{39k} \ -\alpha\_{41k} & -\alpha\_{42k} & -\alpha\_{43k} & (1-\alpha\_{44k}) & -\alpha\_{45k} & -\alpha\_{46k} & -\alpha\_{47k} & -\alpha\_{48k} & -\alpha\_{49k} \ -\alpha\_{51k} & -\alpha\_{52k} & -\alpha\_{53k} & -\alpha\_{54k} & (1-\alpha\_{55k}) & -\alpha\_{56k} & -\alpha\_{57k} & -\alpha\_{58k} & -\alpha\_{59k} \ -\alpha\_{61k} & -\alpha\_{62k} & -\alpha\_{63k} & -\alpha\_{64k} & -\alpha\_{65k} & (1-\alpha\_{66k}) & -\alpha\_{67k} & -\alpha\_{68k} & -\alpha\_{69k} \ -\alpha\_{71k} & -\alpha\_{72k} & -\alpha\_{73k} & -\alpha\_{74k} & -\alpha\_{75k} & -\alpha\_{76k} & (1-\alpha\_{77k}) & -\alpha\_{78k} & -\alpha\_{79k} \ -\alpha\_{81k} & -\alpha\_{82k} & -\alpha\_{83k} & -\alpha\_{84k} & -\alpha\_{85k} & -\alpha\_{86k} & -\alpha\_{87k} & (1-\alpha\_{88k}) & -\alpha\_{89k} \ -\alpha\_{91k} & -\alpha\_{92k} & -\alpha\_{93k} & -\alpha\_{94k} & -\alpha\_{95k} & -\alpha\_{96k} & -\alpha\_{97k} & -\alpha\_{98k} & (1-\alpha\_{99k}) \

\end{matrix}

\right]

\left[ \begin{matrix} \lambda\_{1k} \ \lambda\_{2k} \ \lambda\_{3k} \ \lambda\_{4k} \ \lambda\_{5k} \ \lambda\_{6k} \ \lambda\_{7k} \ \lambda\_{8k} \ \lambda\_{9k} \ \end{matrix} \right] = \left[ \begin{matrix} g\_{10k} \ g\_{20k} \ g\_{30k} \ g\_{40k} \ g\_{50k} \ g\_{60k} \ g\_{70k} \ g\_{80k} \ g\_{90k} \ \end{matrix} \right] $$

$$ \left[ \begin{matrix} 1 & 0 & 0 & 0 & 0 & 0 & 0 & -\alpha\_{18k} & 0 \ -\alpha\_{21k} & 1 & 0 & 0 & 0 & 0 & 0 & 0 & 0 \ 0 & 0 & 1 & 0 & 0 & 0 & -\alpha\_{37k} & 0 & 0 \ 0 & -\alpha\_{42k} & 0 & 1 & 0 & 0 & 0 & 0 & 0 \ 0 & 0 & 0 & -\alpha\_{54k} & 1 & 0 & 0 & 0 & 0 \ 0 & 0 & 0 & 0 & -\alpha\_{65k} & 1 & 0 & 0 & 0 \ -\alpha\_{71k} & -\alpha\_{72k} & 0 & 0 & 0 & 0 & 1 & 0 & 0 \ 0 & 0 & 0 & 0 & 0 & 0 & 0 & 1 & -\alpha\_{89k} \ 0 & 0 & 0 & 0 & -\alpha\_{95k} & 0 & 0 & 0 & 1 \

\end{matrix}

\right]

\left[ \begin{matrix} \lambda\_{1k} \ \lambda\_{2k} \ \lambda\_{3k} \ \lambda\_{4k} \ \lambda\_{5k} \ \lambda\_{6k} \ \lambda\_{7k} \ \lambda\_{8k} \ \lambda\_{9k} \ \end{matrix} \right] = \left[ \begin{matrix} g\_{10k} \ g\_{20k} \ 0 \ g\_{40k} \ 0 \ 0 \ 0 \ 0 \ g\_{90k} \ \end{matrix} \right] $$