

$$\widetilde{F} = \begin{pmatrix} \mathcal{I}_4 \\ \partial_1 \bullet \mathcal{I}_4 \\ \partial_2 \bullet \mathcal{I}_4 \\ \partial_3 \bullet \mathcal{I}_4 \\ \partial_1 \partial_3 \bullet \mathcal{I}_4 \\ \partial_2 \partial_3 \bullet \mathcal{I}_4 \\ \partial_3^2 \bullet \mathcal{I}_4 \end{pmatrix} = g_{\text{sunrise}} \begin{pmatrix} \mathcal{I}_1 \\ \mathcal{I}_2 \\ \mathcal{I}_3 \\ \mathcal{I}_4 \\ \mathcal{I}_5 \\ \mathcal{I}_6 \\ \mathcal{I}_7 \end{pmatrix},$$