Advanced Higher Maths
SQA 2022 Paper 2
Question 5

Matrix A is given by

$$A = \begin{pmatrix} 1 & 3 & 1 \\ 2 & k & 3 \\ k & 18 & -7 \end{pmatrix}, \text{ where } k \in \mathbb{R}.$$

Find the values of k so that the matrix A is singular. 3

Answer:

k = 6, k = –4