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## EX.2.2.2.b2c, Sauer3

Find the LU factorization of the given matrices. Check by matrix multiplication.

(b) 
$$\begin{pmatrix} 4 & 2 & 0 \\ 4 & 4 & 2 \\ 2 & 2 & 3 \end{pmatrix}$$
 (c)  $\begin{pmatrix} 1 & -1 & 1 & 2 \\ 0 & 2 & 1 & 0 \\ 1 & 3 & 4 & 4 \\ 0 & 2 & 1 & -1 \end{pmatrix}$ 

Note: the LU factorization for these two matrices is done using Python in CP.2.2.1.b2c.