

$$\begin{array}{r|l}
 x^3 + x^2 - x - 1 & x - 1 \\
 \hline
 x^3 - x^2 & \\
 \hline
 -2x^2 - x & \\
 -2x^2 - 2x & \\
 \hline
 x - 1 & \\
 -x - 1 & \\
 \hline
 0 &
 \end{array}$$