2. 
$$r^3 - 7 r^2 + 14 r - 8$$
 has a factor  $(r-1)$  compute all other factors: 
$$(r-2) (r-1)^2$$
 
$$(r-4) (r-1) (r+2)$$
 
$$(r-4) (r-2) (r-1)$$
 
$$(r-1)^2 (r+2)$$

## Solution

Apply Long Division. (r-4) (r-2) (r-1)