Solution

To find the t-intercept, we set u equal to 0, so :

 $u(t) = t^2 - 6t + 8 = (-4 + t)(-2 + t) = 0$

-4 + t = 0 or -2 + t = 0

t= 4 or t= 2

So, the t-intercepts are at the points (4,0) and (2,0)