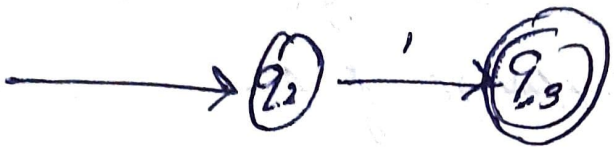
Tutorial 3

05/10/20

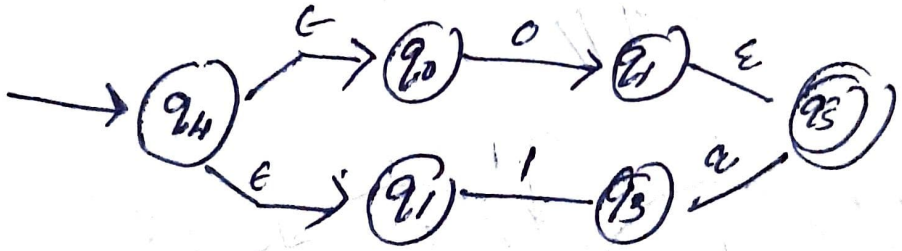
? $(0+1)^*.1.(0+1)$

r_1 :

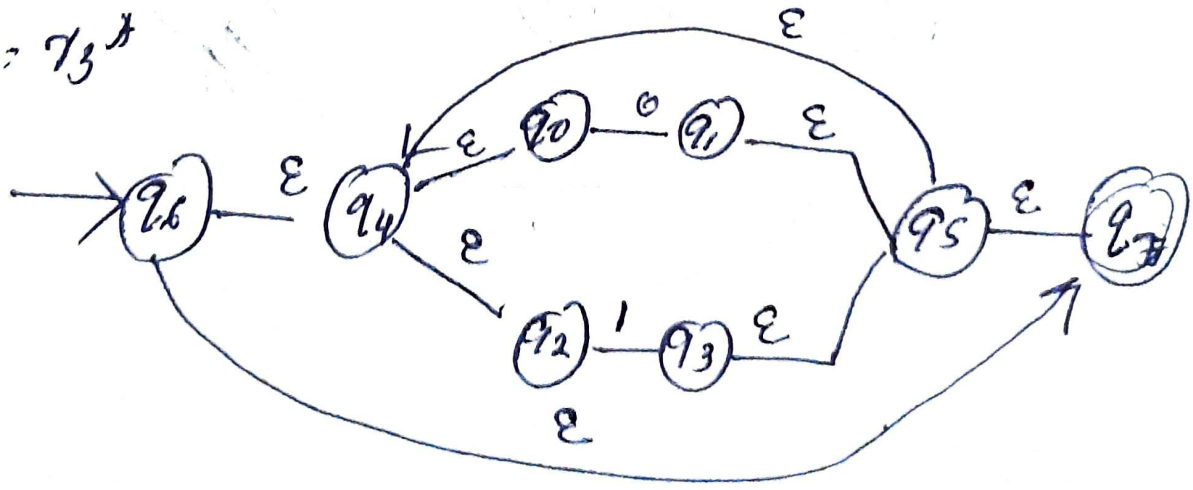
r_2



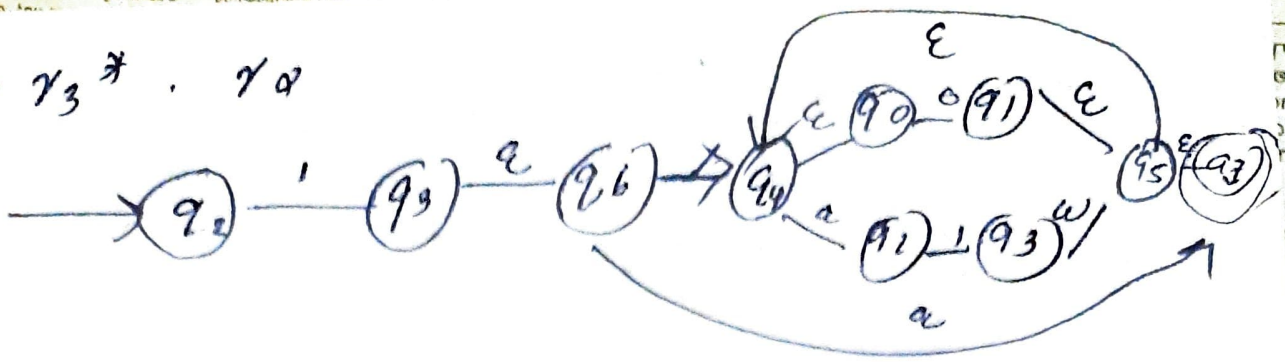
$r_3 = r_1 + r_2$



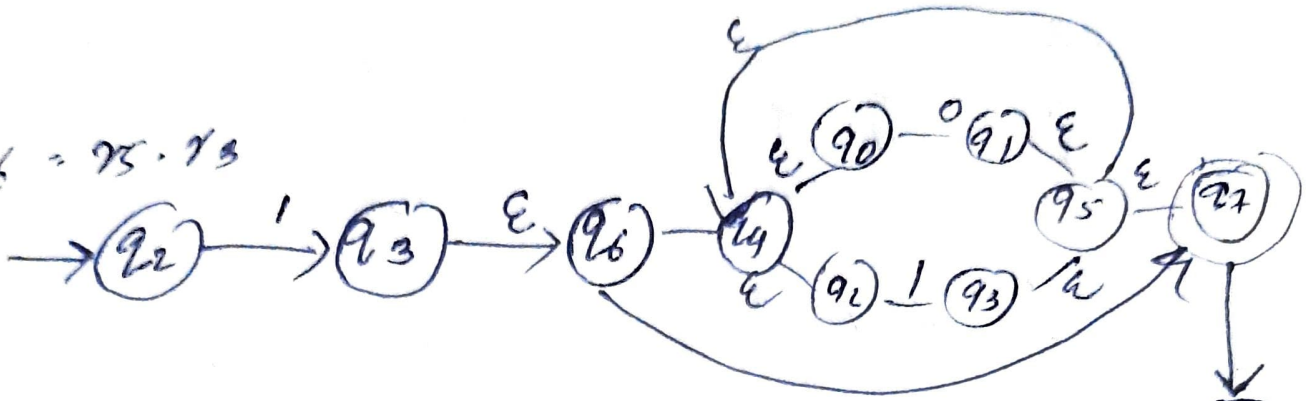
$r_4 = r_3^*$

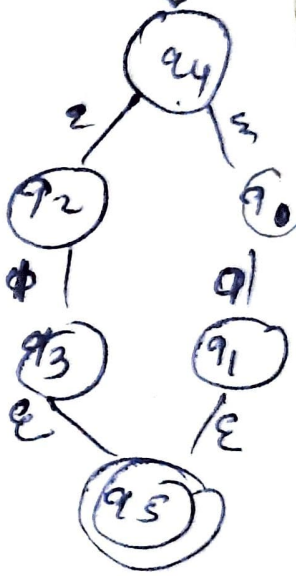


$r_5 = r_3^* \cdot r_4$

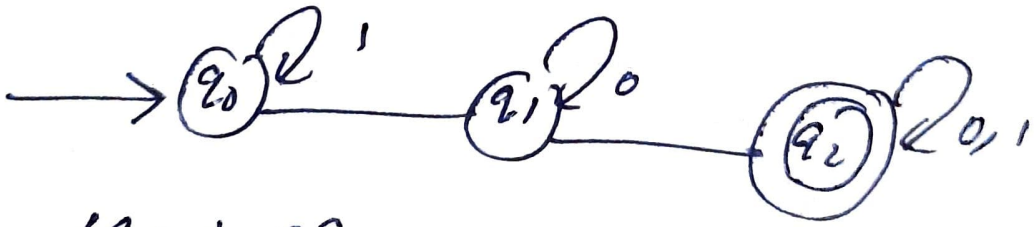


$r_6 = r_5 \cdot r_3$





2) Convert DFA to RG



$q_0 = 1q_0 + 0q_1$

$q_1 = 0q_1 + 1q_2$

$q_2 = 0q_2 + 1q_2 + \varepsilon$

$q_2 = (0+1)q_2 + \varepsilon$

$\alpha \quad A \quad \alpha \quad . \quad B$

$q_2 = (0+1)^*$

$q_1 = 0q_1 + 1 \cdot (0+1)^*$

$x \quad Ax \quad B$

$q_1 = 0^* 1 \cdot (0+1)^*$

$q_0 = 1 \cdot q_0 + 0 \cdot 0^* 1 \cdot (0+1)^*$

$x \quad A \quad x \quad B$

$q_0 = 1 \cdot^* 0 \cdot 0^* 1 (0+1)^*$
