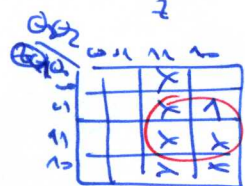
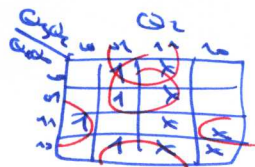
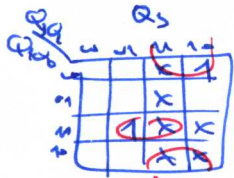
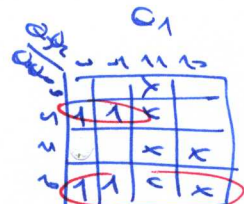
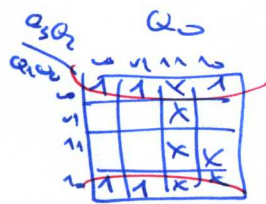
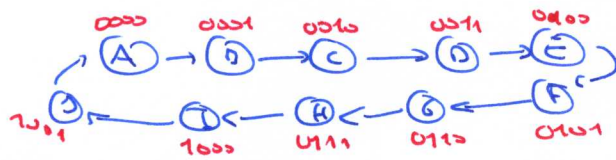


12 Implementeu un comptador mòdul 10 (la seqüència del comptador és: 0000, 0001, 0010, 0011, 0100, 0101, 0110, 0111, 1000, 1001 i a partir d'aquí torna a 0000...) utilitzant Flip-Flops D i les portes lògiques corresponents. El disseny ha d'incorporar un senyal de control 'SC' que valgui '1' quan la sortida del comptador sigui '1001'.

es me adia del sistema

10 steps \rightarrow 4 FF's



$$Z = Q_3 Q_0$$

	Q_3	Q_2	Q_1	Q_0	D_3	D_2	D_1	D_0	Z
0	0	0	0	0	0	0	0	1	0
1	0	0	0	1	0	0	1	0	0
2	0	0	1	0	0	0	1	1	0
3	0	0	1	1	0	1	0	0	0
4	0	1	0	0	0	1	0	1	0
5	0	1	0	1	0	1	1	0	0
6	0	1	1	0	0	1	1	1	0
7	0	1	1	1	1	0	0	0	0
8	1	0	0	0	1	0	0	1	0
9	1	0	0	1	0	0	0	0	1
10	1	0	1	0	x	x	x	x	x
11	1	0	1	1	x	x	x	x	x
12	1	1	0	0	x	x	x	x	x
13	1	1	0	1	x	x	x	x	x
14	1	1	1	0	x	x	x	x	x
15	1	1	1	1	x	x	x	x	x

$$D_3 = Q_3 \bar{Q}_0 + Q_2 Q_1 Q_0, D_1 = Q_1 \bar{Q}_0 + \bar{Q}_3 \bar{Q}_1 Q_0$$

$$D_2 = Q_2 \bar{Q}_0 + Q_2 \bar{Q}_1 + \bar{Q}_0 Q_1 Q_0, D_0 = \bar{Q}_0$$

