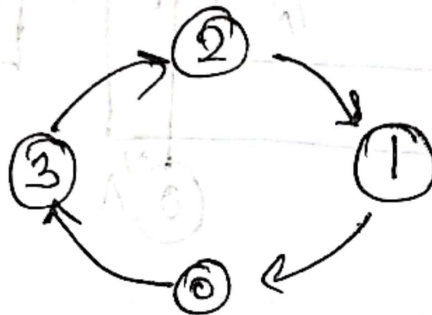


Here $(1805116 / 5 = 1)$

$S_1 = 2, 1, 0, 3, 2, 1, 0, 3$

Here, state diagram.



Excitation table,

Y_B	Y_A	Y_B^*	Y_A^*	T_B	T_A
0	0	1	1	1	1
0	1	0	0	0	1
1	0	0	1	1	0
1	1	1	0	0	1

k-map for T_B, T_A :

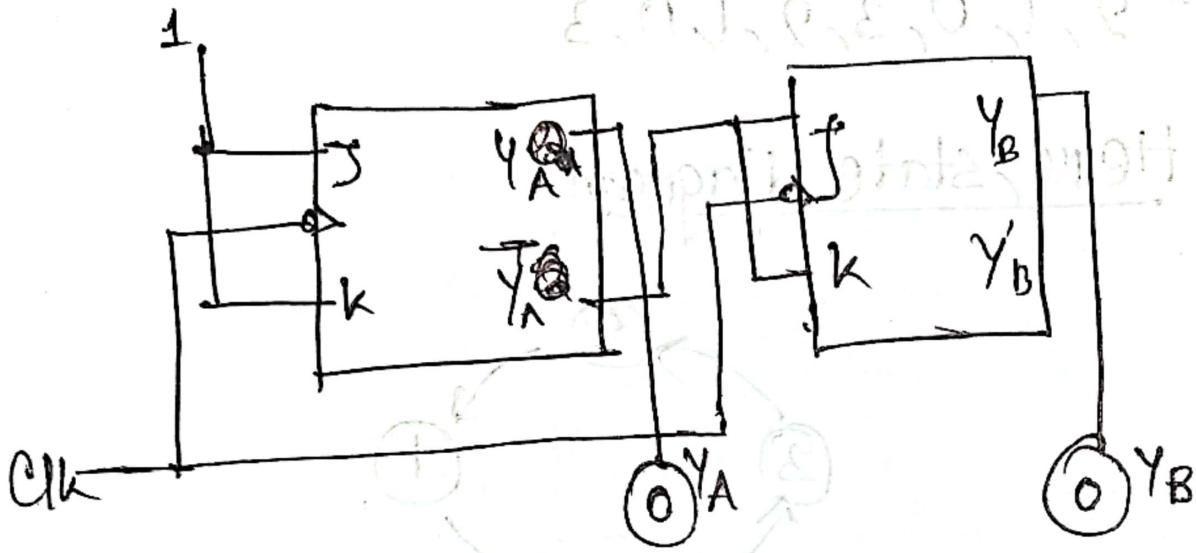
$Y_B \backslash Y_A$	0	1
0	1	0
1	0	1

$$T_B = Y_A'$$

$Y_B \backslash Y_A$	0	1
0	1	1
1	1	1

$$T_A = 1$$

Circuit diagram



A	B	Y_A	Y_B	Y_A	Y_B
1	1	1	1	0	0
1	0	0	0	1	0
1	1	1	0	0	1
0	1	0	1	1	1