

Question 1

1)

$\textcircled{1}$ 1. $\textcircled{3}$

A	B	C	D	F_1	F_2
0	0	0	0	1	0
0	0	0	1	1	0
0	0	1	0	0	1
0	0	1	1	0	1
0	1	0	0	1	0
0	1	0	1	1	0
0	1	1	0	0	1
0	1	1	1	0	1
1	0	0	0	0	1
1	0	0	1	1	1
1	0	1	0	1	1
1	0	1	1	0	1
1	1	0	0	1	0
1	1	0	1	1	1
1	1	1	0	0	0
1	1	1	1	0	0

$\textcircled{1}$ 1. $\textcircled{6}$

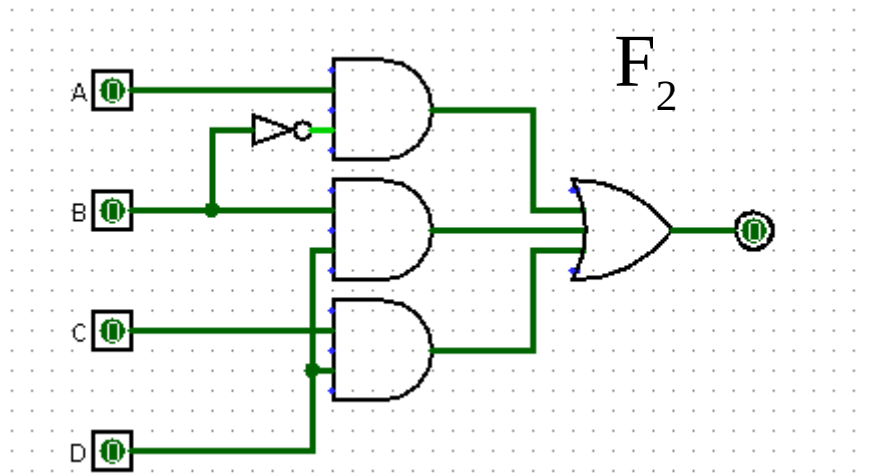
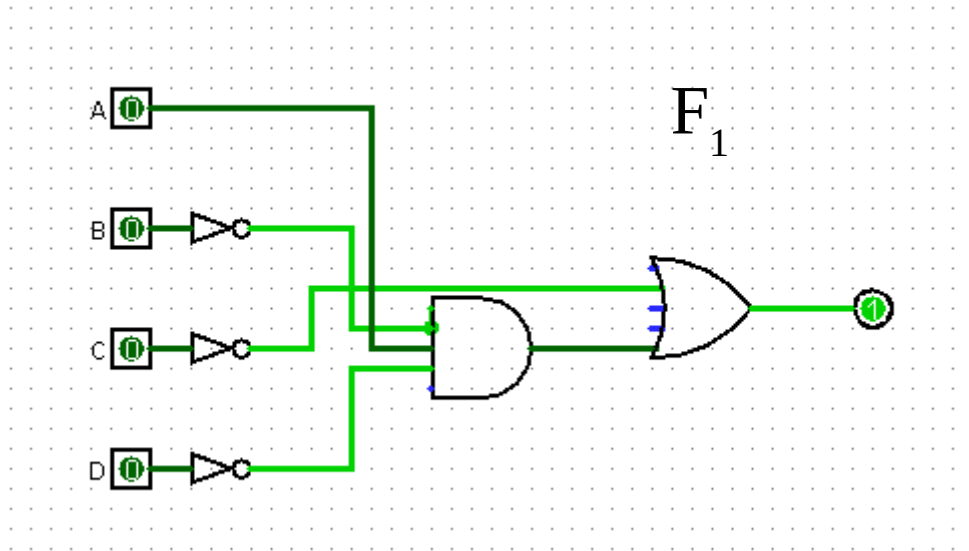
		AB			
		00	01	11	10
CD	00	1	1	1	1
	01	1	1	1	1
	11	0	0	0	0
	10	0	0	0	1

$F_1 = D'B'A + C'$ ✓

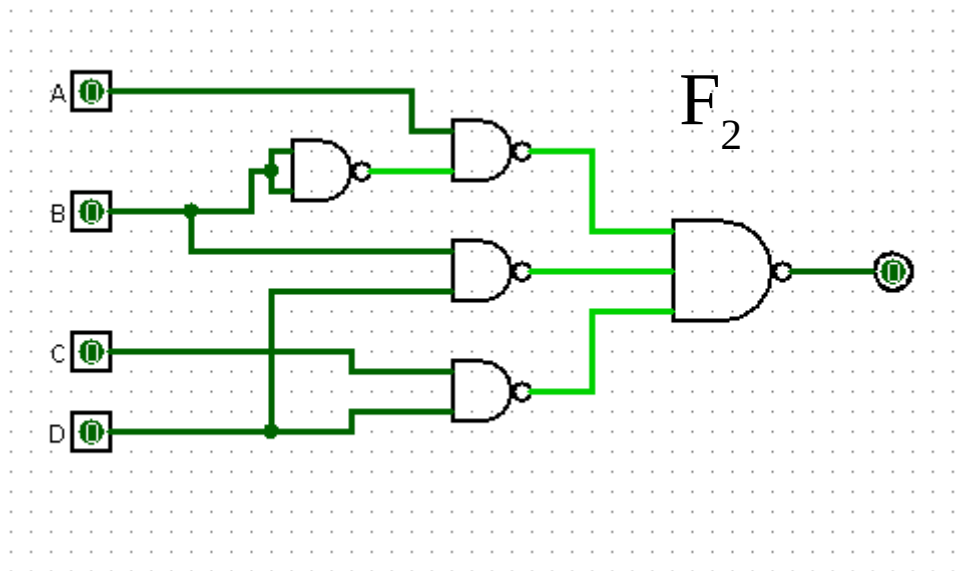
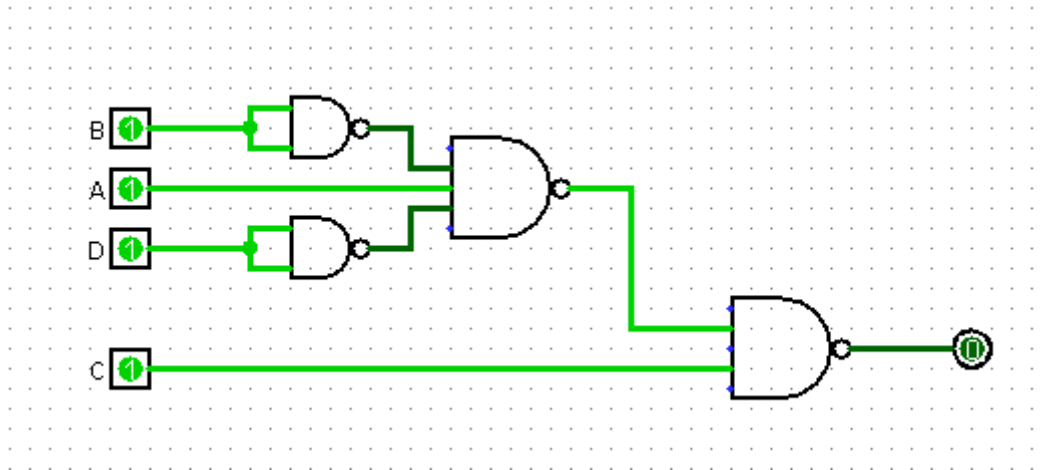
		AB			
		00	01	11	10
CD	00	0			1
	01		1	1	1
	11	1	1	1	1
	10				1

$F_2 = AB' + BD + CD$ ✓

2)



3)



Question 2

1)

A	B	C	D	F
0	0	0	0	1
0	0	0	1	0
0	0	1	0	1
0	0	1	1	0
0	1	0	0	0
0	1	0	1	0
0	1	1	0	1
0	1	1	1	1
1	0	0	0	1
1	0	0	1	1
1	0	1	0	1
1	0	1	1	1
1	1	0	0	0
1	1	0	1	1
1	1	1	0	1
1	1	1	1	1

2)

$CD \backslash AB$	00	01	11	10
00	1	0	0	1
01	0	0	1	1
11	0	1	1	1
10	1	1	1	1

3)

$CD \backslash AB$	00	01	11	10
00	1	0	0	1
01	0	0	1	1
11	0	1	1	1
10	1	1	1	1

$$F = AD + BC + B'D'$$

4)

$CD \backslash AB$	00	01	11	10
00	1	0	0	1
01	0	0	1	1
11	0	1	1	1
10	1	1	1	1

$$F' = A'B'D + A'C'D + BC'D'$$

5)

