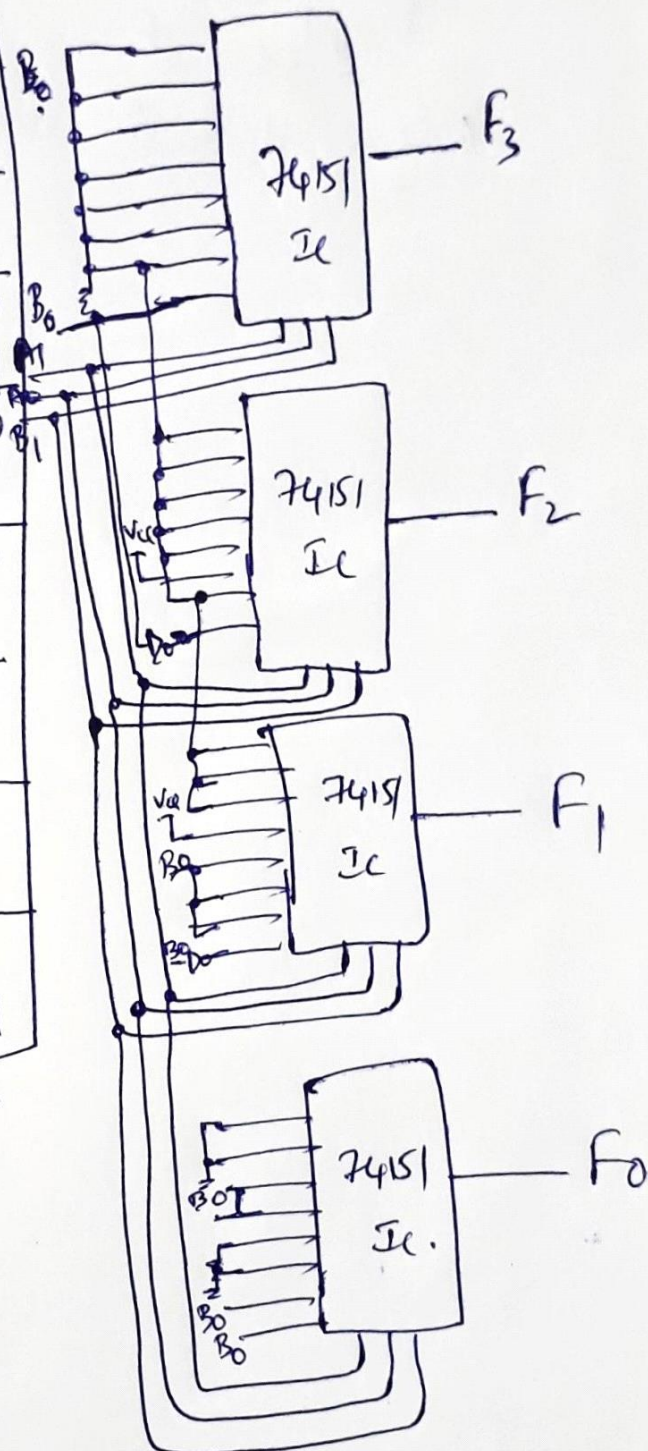


### Sat-3.

(Q3). Design a 2-bit x 2-bit binary multiplier using 74151 ICs and minimum external gates.

A <sub>1</sub> A <sub>0</sub>	B <sub>1</sub> B <sub>0</sub>	F <sub>3</sub>	F <sub>2</sub>	F <sub>1</sub>	F <sub>0</sub>
0 0	0 0	0	0	0	0
0 0	0 1	0	0	0	0
0 0	1 0	0	0	0	0
0 0	1 1	0	0	0	0
0 1	0 0	0	0	0	0
0 1	0 1	0	0	0	1
0 1	1 0	0	0	1	0
0 1	1 1	0	0	1	1
1 0	0 0	0	0	0	0
1 0	0 1	0	0	1	0
1 0	1 0	0	1	0	0
1 0	1 1	0	1	1	0
1 1	0 0	0	0	0	0
1 1	0 1	0	0	1	1
1 1	1 0	0	1	1	0
1 1	1 1	1	0	0	1

1 Mark.



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