2)

اسل))

+20

+15

د)
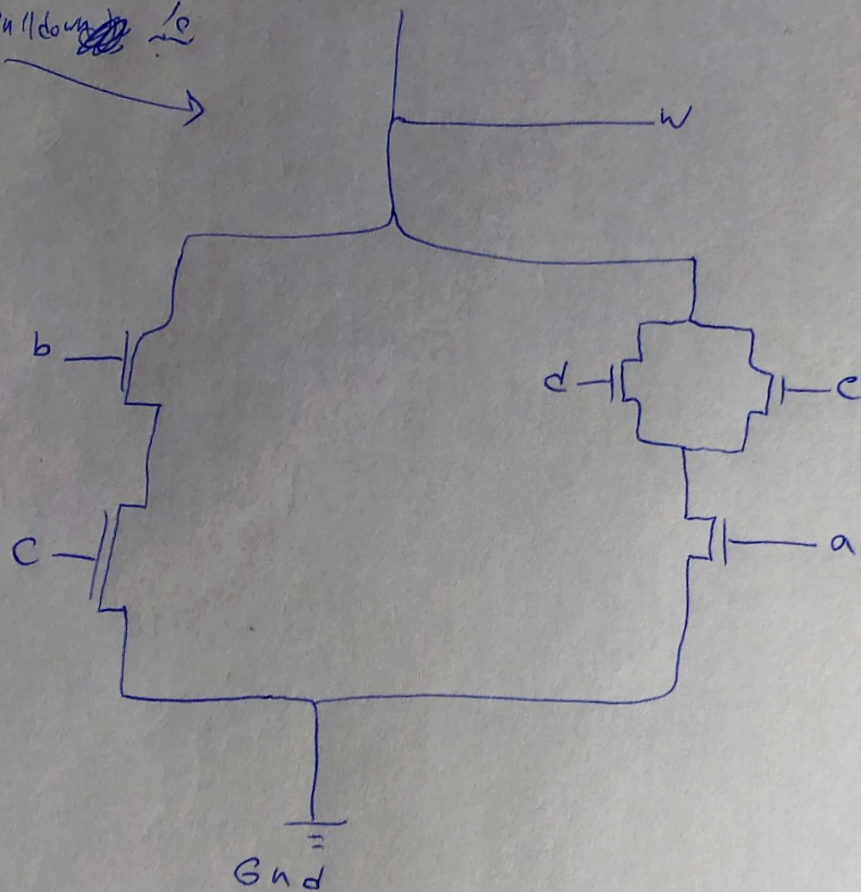$$f = (\bar{c}\bar{d} + \bar{a})(\bar{b} + \bar{c}) = \overline{(b.c) + (a.(d+c))}$$