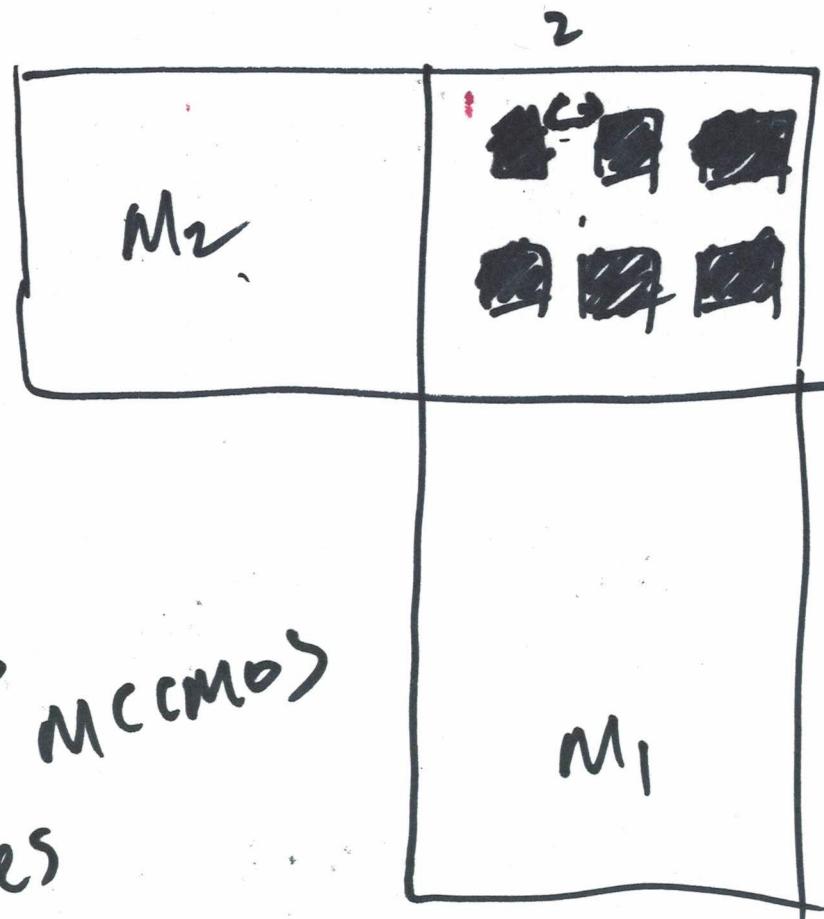
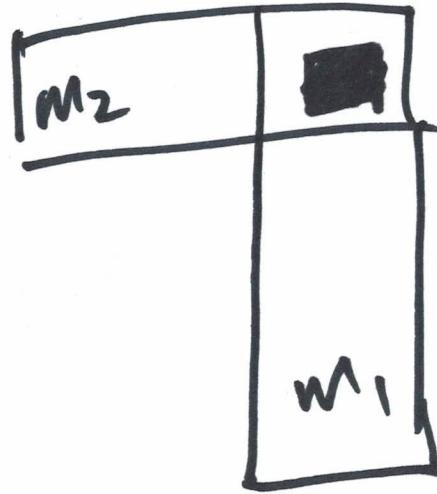
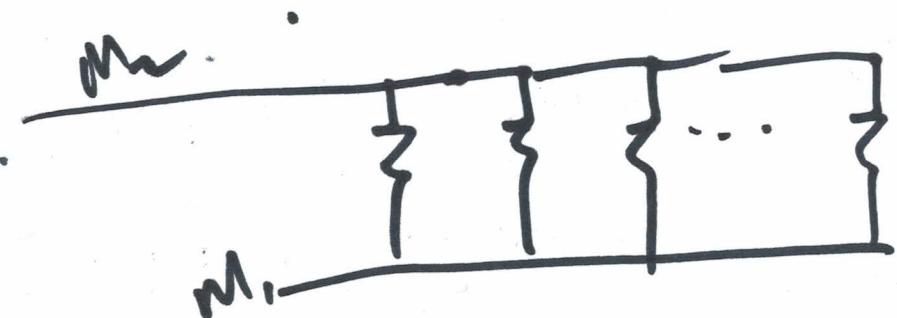


①



rules
 \downarrow
 ~~$l = 300 \text{ nm}$~~
 rules
 MCCMOS

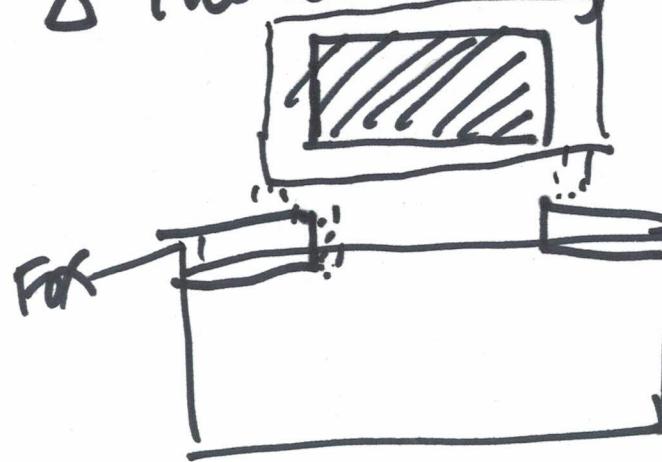
- ① Reduce resistance
- ② Improve yield



2

Active and Poly layers

△ The active layer — opens Fox



Fox
well
contact

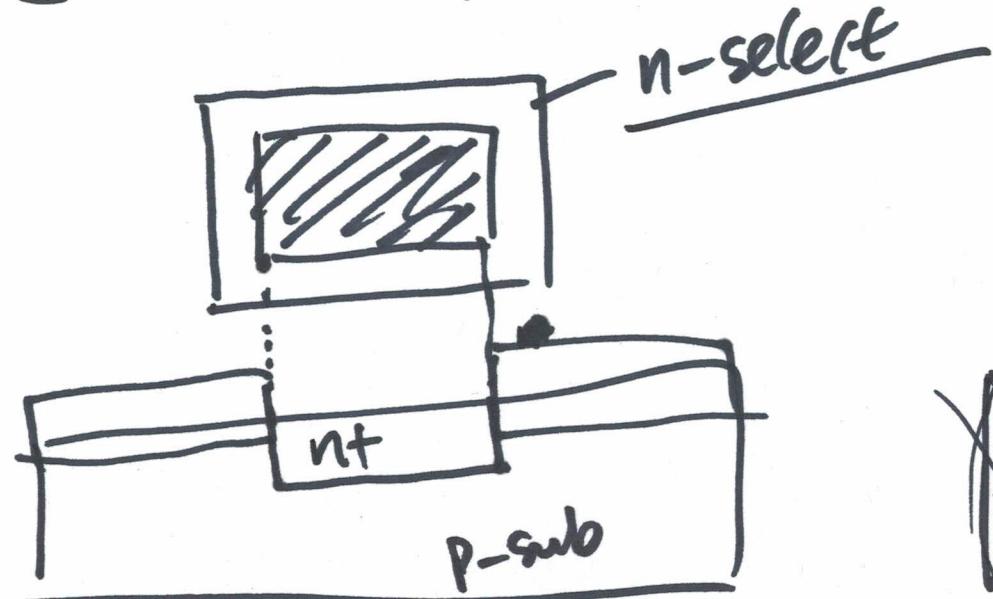


SV

P+ P+

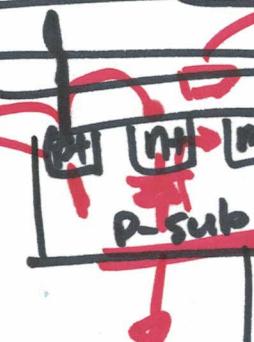


△ n-select, p-select

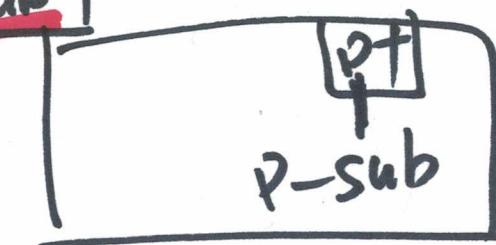


n-select

substrate
contact



Body-effect



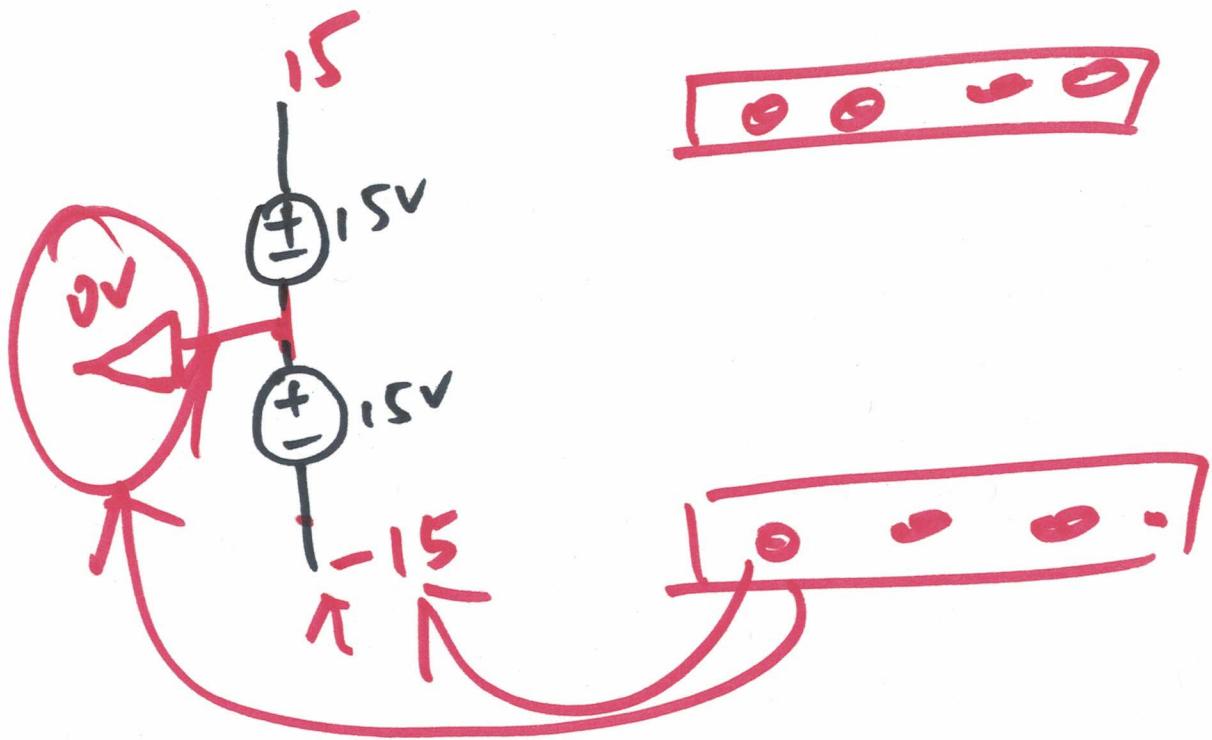
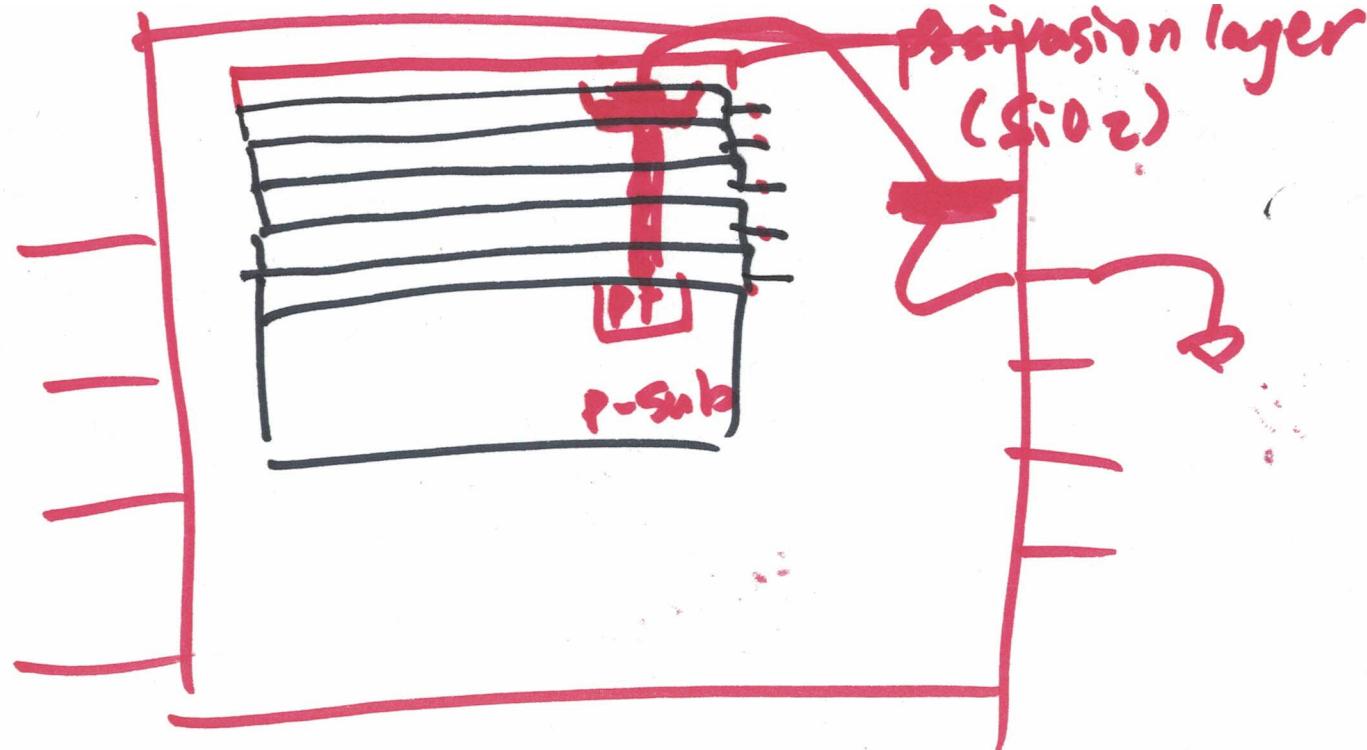
p-sub

+15



+15

-15

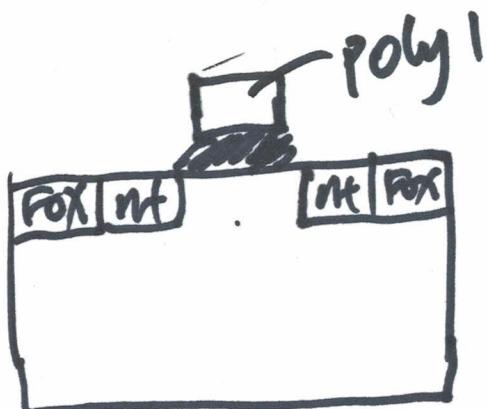


n-select area > active area

p-select area > active area

Active layer — opens a window on Fox

△ Poly layers



△ poly used as resistors

poly	200 Ω/square
metal	0.1 Ω/square
silicide	mixture of Al/copper with tungsten

To reduce the resistance of
the poly wires.

(5)

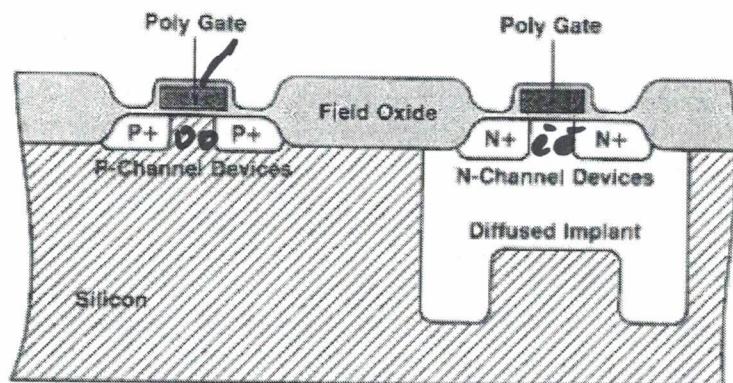


Fig. 3. After the $P+$ and $N+$ diffusions, more oxide is deposited over the P -channel and N -channel devices.