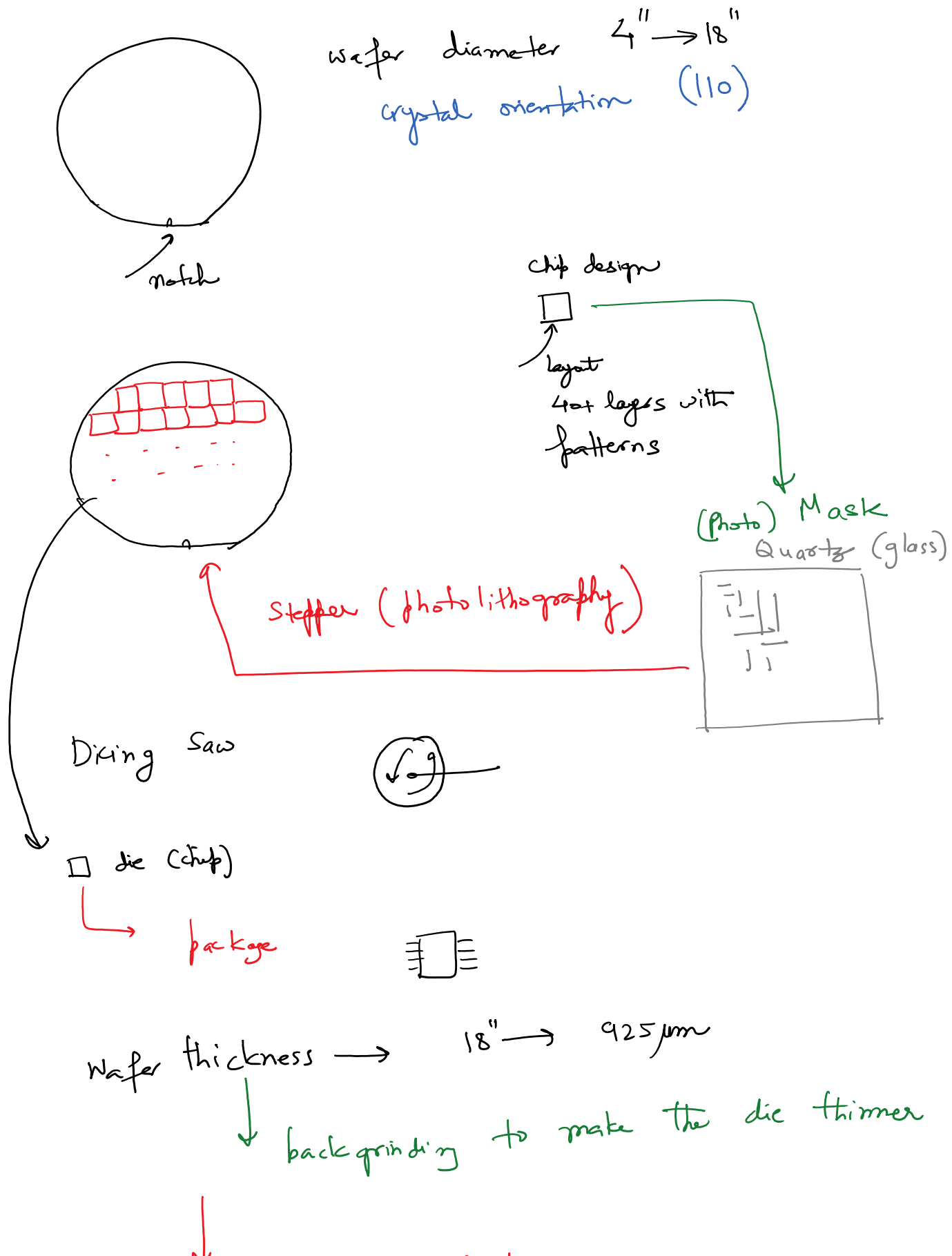
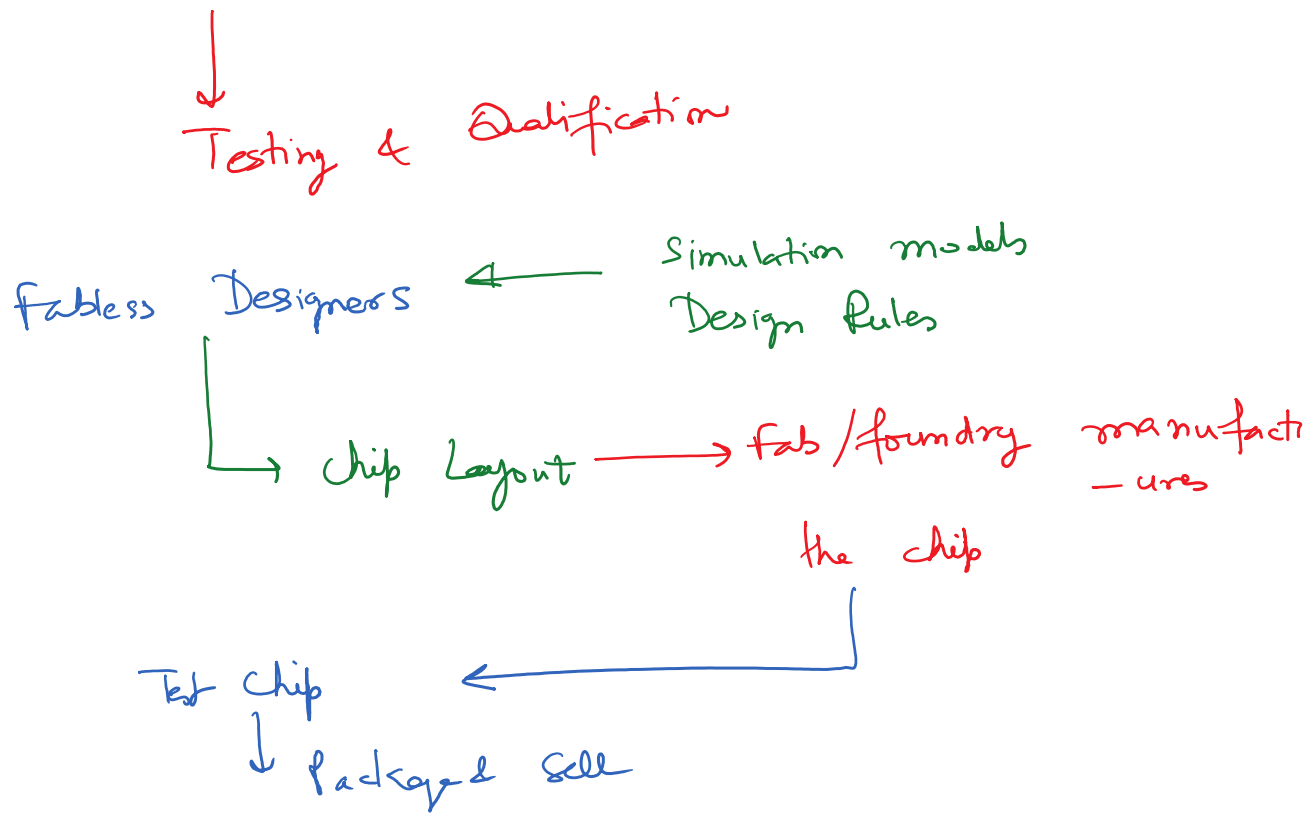
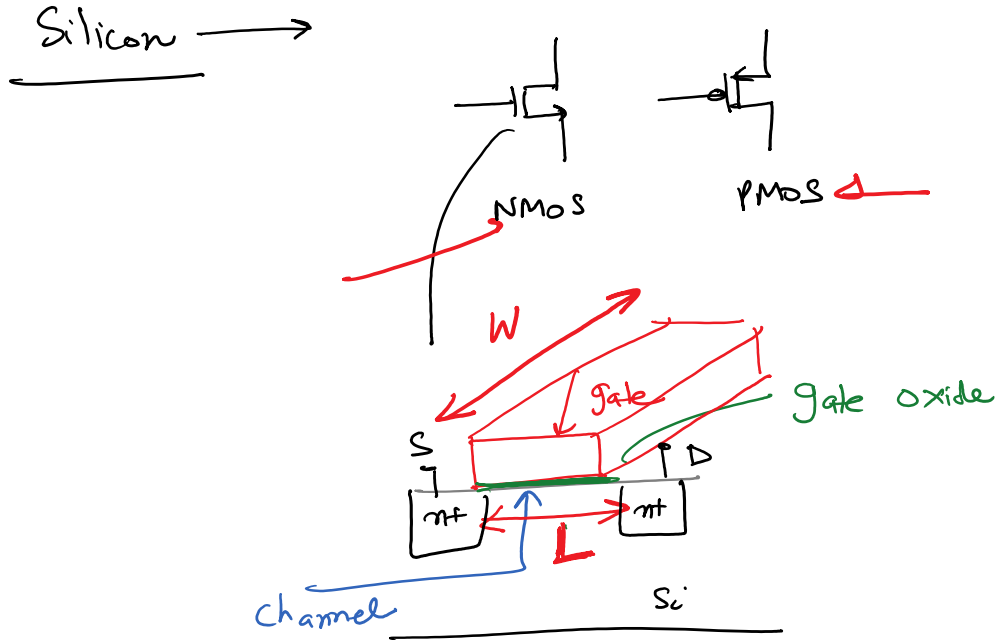


ECE 445 - Lecture 1

Wednesday, January 9, 2019 8:01 AM







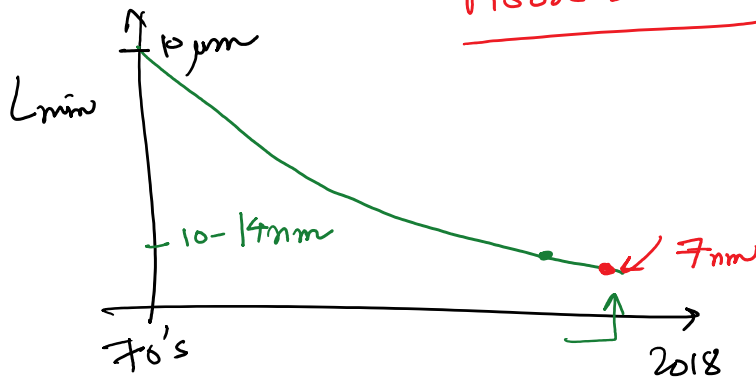
Saturation Equation

$$I_D = \frac{\mu_n C_{ox}}{2} \left(\frac{W}{L} \right) (V_{GS} - V_{THN})^2$$

CMOS Technology Node → Process Node

↳ Specify minimum length

Mooore's Law



In this Course → On Semi's 65 technology
 $L_{min} = 0.6 \mu m \rightarrow (0.5 \mu m)$
 ↳ 1985

Von Neumann Architecture

