

WOW

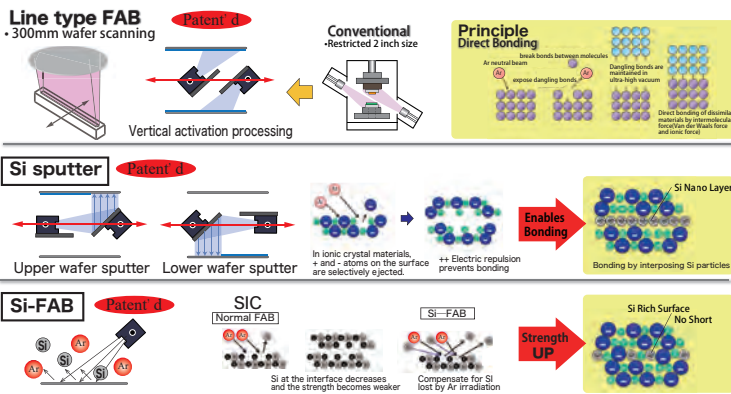
COW

Hybrid Bonding

WOW



① Room temperature direct bonding in ultra high vacuum



Direct Bonding

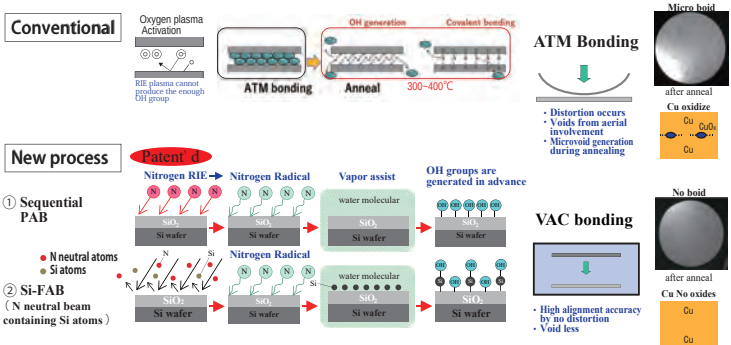
±0.2μm

WF-3000

- Ar neutral beam in UHV
- Line type FAB
- Si sputter
- Si-FAB
Ar beam containing Si atoms
- 300mm Wafer
CTC Auto handling



② Hydrophilic bonding in Vacuum

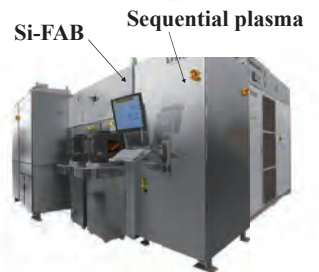


CIS,Memory

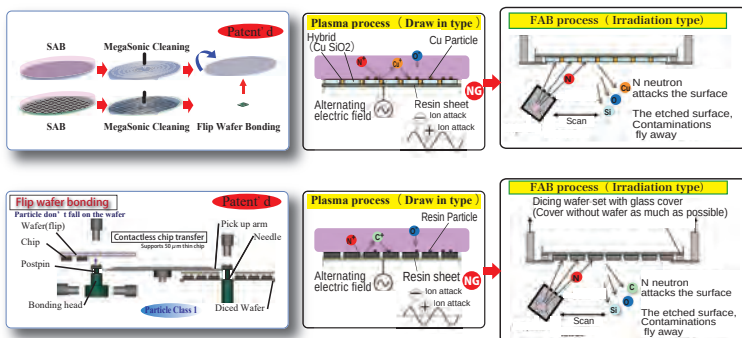
±0.2μm

HBWS-3000

- Sequential PAB
- Si-FAB
- Particle cleaning
- 300mm Wafer
CTC Auto handling
- 15~20
WPH



③ Surface activated Bonding COW for Semiconductor front end



Logic,Memory,CIS

±0.2μm

HBCW-3000

- Alignment accuracy
± 0.2μm
- FAB activation treatment
- Particle cleaning (Mega sonic)
- 300mm wafer CTC automatic handling

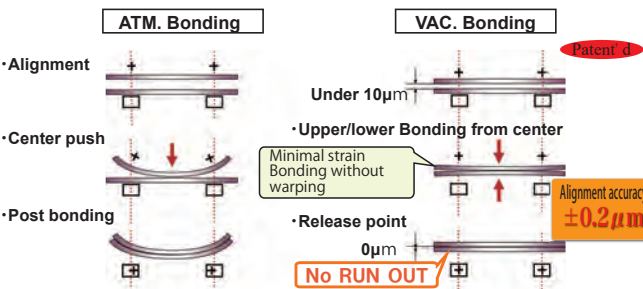


High Accuracy Alignment System

WOW



WOW



COW

Auto Coplanarity adjustment by Lazer

