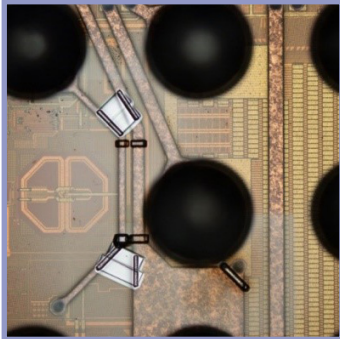




FIB CIRCUIT EDIT SERVICE

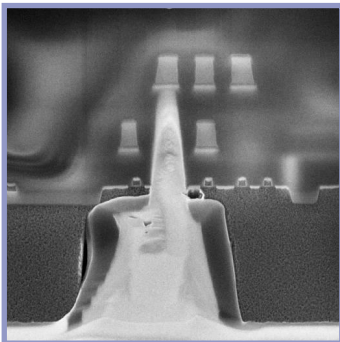
- DEDICATED TF CENTRIOS FIB CIRCUIT EDIT SYSTEM
- UP TO 14 NM PROCESS NODES
- CAD NAVIGATION USING GDS-II FILES
- CAPABLE OF PERFORMING BACK SIDE FIB CIRCUIT EDIT
- NIR MICROSCOPE FOR EASY NAVIGATION

FIB CIRCUIT EDIT SERVICE



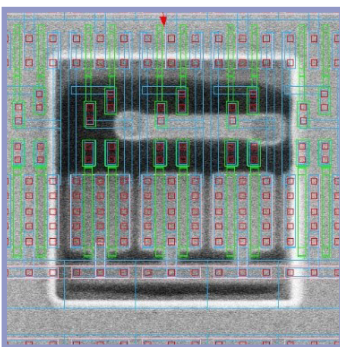
COPPER METAL SILICON EDIT

- Dedicated FIB Circuit Edit system: ThermoFisher Centrios
- 2x MultiChem™ Gas Delivery Systems up to 6 gas chemistries
- Dual nozzle gas injection for uniform deposition/etching
- Up to 14 nm low-K process nodes
- CAD navigation using GDS-II files



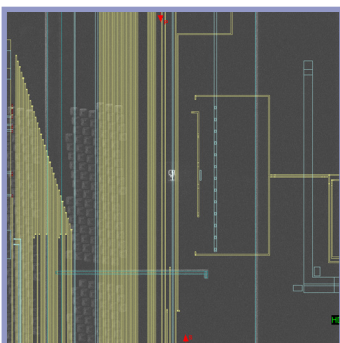
BACK SIDE CIRCUIT EDIT

- In-chamber CCD IR camera for through silicon localization
- Easy navigation using GDS-II overlay
- FIB assisted end point detected
- Circuit Edit on lower metal layers
- Mechanical silicon thinning before back side FIB Circuit Edit



CAD NAVIGATION

- In-chamber CCD IR microscope for alignment
- CAD (NEXS) navigation using GDS-II files
- Secure FTP server for GDS-II upload
- Fast and easy navigation
- Link FIB image to GDS file



DIFFERENT GASSES

- Dx for Cu/SiO₂ and Cu/low-k dielectric
- IDEP III Insulator deposition
- DE Low-k Dielectric Etch gas
- Selective Carbon Mill Etch gas
- Tungsten Deposition gas
- XeF₂ etch gas