Precise flattening and correction of features on a wafer

**Key Benefits**
- High productivity due to automated handling, batch processing and double load lock;
- Integrated metrology;
- Process variety and adaptability for a wide range of applications (different ion beam diameters to choose within process);
- Well-proven ion beam technology;
- Customer service worldwide;

**Application Examples**
- Radio frequency communication (RF connectivity)
- High performance sensor & actuator market (SAW, BAW, etc.)
- Micro-electro-mechanical systems (MEMS)
- Wafer-level bonding
- Silicon on insulator (SOI)
- Manufacturers of micro and nano electronics
- High-end optics
Solution

Tailored solution based on our flexible machine, configured out of modules for process, handling, metrology and software, which are built in semiconductor fabrication environment for machining substrates up to Ø300mm.

Option: Robot and Cassette Handling (for loading and unloading of substrates)

Option: Multiple Substrate Configurations (up to 300mm wafer diameter)

Option: Measurement System
Optical Thin Film Probing (OTFP) (integrated spectrometer to determine layer thickness of dielectric thin films)

Cleanroom

Double Load Lock

Greyroom

Process Chamber

Option: In-Situ Etch Rate Monitoring (ISERM)
(Determination of an ion beams etching rate within seconds)

80mm RF80 Ion Beam Source
Option: replacement RF80 -> 40mm RF40

3 Axes system (X, Y, Z)

Option: Diaphragm Changer
(automatic ion beam spot adjustment with different apertures)

Additional Options:
Additional turbomolecular pump, UPS system, Thermal imaging system for substrate and chamber, Cryogenerator System

Basic footprint: W3980 x D1770 x H1900 (doors closed)

Equipment Weight: 4700kg

Processible Material: LiN, LiTa, SiO2, Si and others