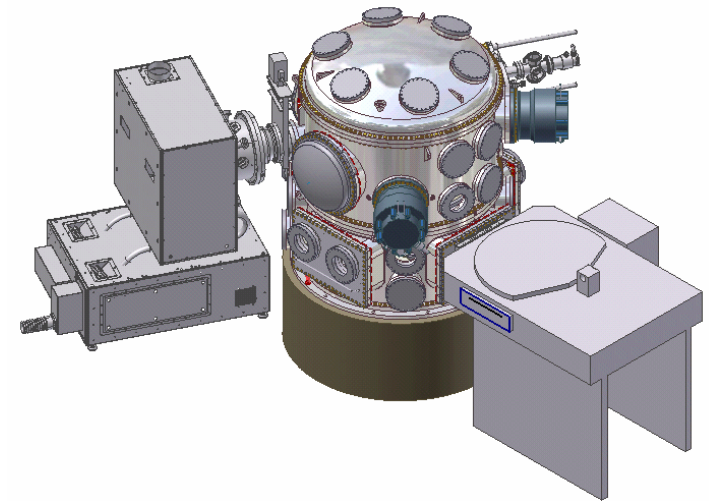




EUV Stimulated Photoresist Outgassing

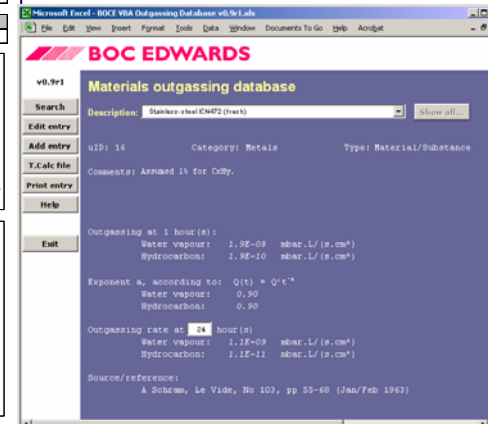
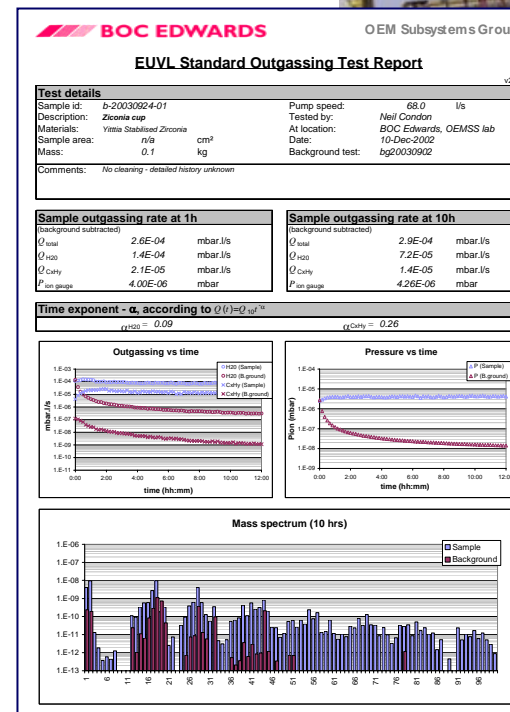
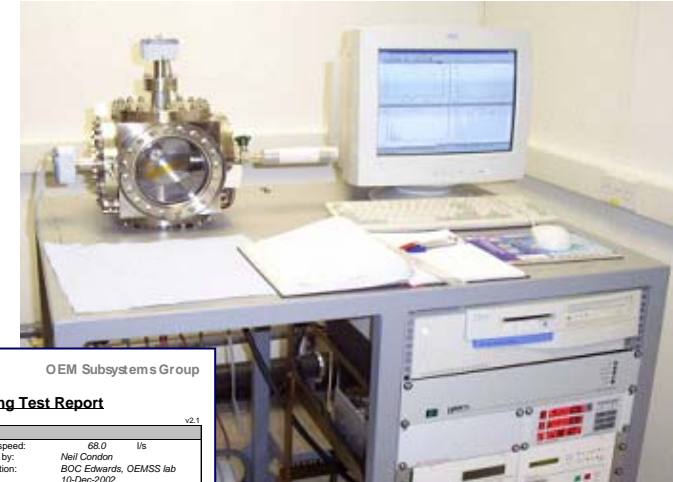
BOC Edwards Expertise for Systems Integration

- Expertise in vacuum science, system design & engineering
- As an example, Exitech MS13.5 MET (Micro Exposure Tool) at Intel & Sematech
 - Vacuum system design and modelling
 - Vacuum materials qualification
 - Vacuum equipment specification, supply and integration
 - Vacuum control system specification, design, build, test and integration including RGAs for contamination control



EUV Materials & Component Selection

- Outgassing Measurement
 - Selection of materials/components for EUVL systems is critical to success
- BOC Edwards has fundamental understanding of the theory of outgassing
- Fully developed methods to measure outgassing
 - Standard Reporting
 - Database of Materials
- Knowledge & practical experience of pre-treatment, preparation & handling methods
- Knowledge gained from extensive sample testing > 350 samples over last 4 years
- Experience of EUV Stimulated photoresist outgassing measurement which can be applied to standardizing method



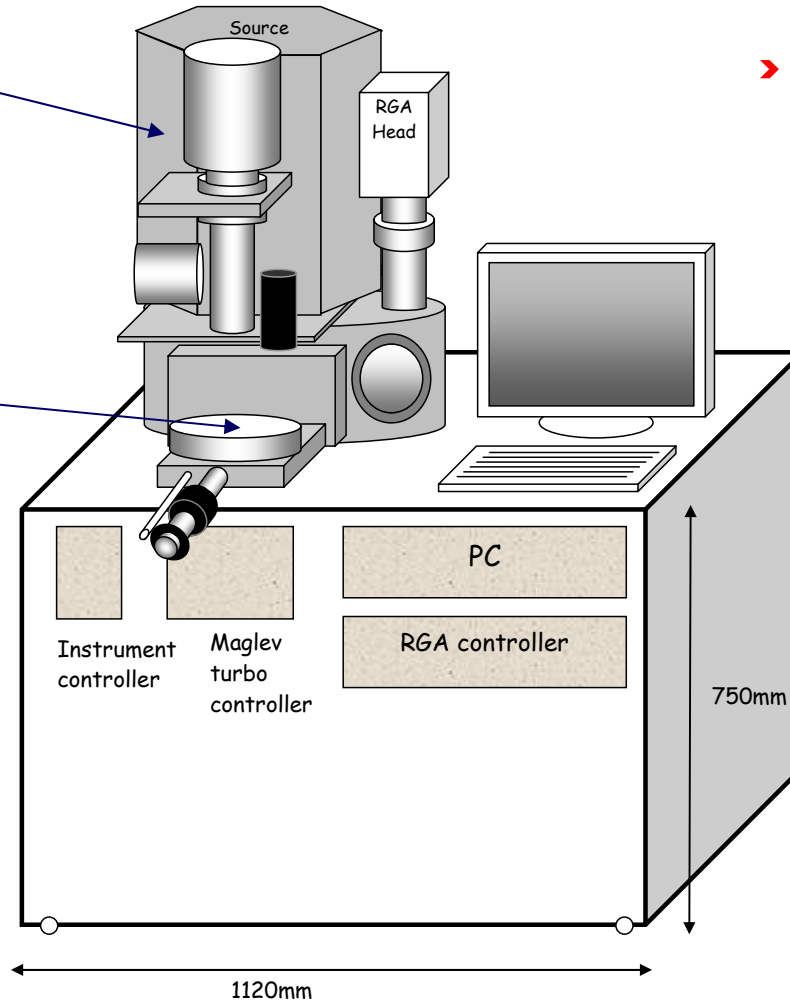
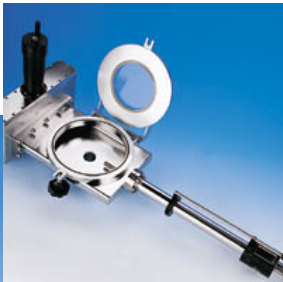
EUV Stimulated Outgassing System Concept

> Source

- In-band
- Broad band (SPF)

> Sample Type

- Wafer (6", 8", 12")
- Wafer Fragment



> Level of automation?

- Manual
- Semi/fully automated

- > Developed methodology for resist outgassing measurement