

inertDEP-C



GLOVEBOX INTEGRATED THIN FILM DEPOSITION SYSTEM

The inertDEP-C Physical Vapour Deposition (PVD) system can be integrated within a glovebox to create an inert environment for O₂ & H₂O sensitive materials.

Designed for easy handling and operation within a two-port glovebox, the inertDEP-C is a small footprint workhorse for depositing thin films inside an inert environment.



Why inertDEP?



Compact footprint - ideal for labs with limited space



High-vacuum performance with rapid pump-down



Manual or fully automated operation



Intuitive software with 22" touchscreen control system



Engineered for minimal outgassing & stability



Designed & built in Australia with 2-year warranty

Key Applications

- ✓ Quantum & Photonic Devices
- ✓ Wearable electronics
- ✓ Photovoltaics & perovskite solar cells
- ✓ OLEDs, OPVs & OFETs
- ✓ Thin-film research & nanofabrication

DESIGNED FOR *innovation*

Delivering reliable, high-quality thin films for cutting-edge technologies.



**GET IN TOUCH
WITH US:**

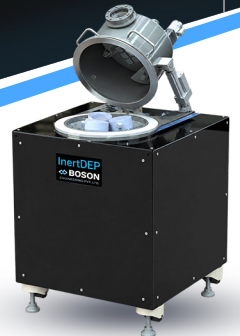
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TECHNICAL SPECIFICATIONS

Substrate Size & Uniformity • 4" (100mm) Diameter max – Or smaller pieces • +/- 5% uniformity	Mass Flow Controllers (Sputtering) • Ar plus up to 2x reactive gases (O2, N2..etc) for sputtering
Base Pressure • $<5 \times 10^{-7}$ mbar (3.75×10^{-7} Torr)	Deposition Control • Quartz Crystal monitor for either film monitoring or thickness control with PID loop
Deposition Source Types • High Temperature Thermal Boat/Crucibles • Low Temperature Organics • 2" or 3" Magnetron Sputtering (DC, RF, Pulsed DC, HiPIMS)	Substrate Heating/Cooling • Heating to 500°C • Cooling to room temperature or optional -5°C
Typical Materials • High Temperature Thermal = Au, Ag, Cu, Cr, Al...etc • Organics = Small molecules ALQ3, C60...etc • Sputtering = Metals, Oxides or Nitrides	Vacuum Pumping • 250l/s Turbomolecular pump with market leading pumping speeds for light gases • Optional oil sealed or oil free scroll backing pump
Warranty • 2 Years	Country of Manufacture • Australia

inertDEP system shown without the glovebox



System Features



One-touch automatic pump-down & vent



Recipe control for accurate & repeatable films



Automatic film thickness and pressure control options



Comprehensive safety features

Built for Performance & Reliability

All systems are engineered & assembled in Sydney, Australia to AS3000 electrical & safety standards using industrial PLC controllers, ensuring quality, durability & safety.

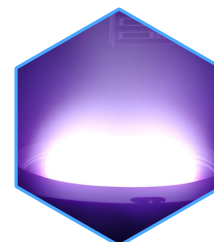
Deposition Techniques



High Temp Thermal



Low Temp Organic



Sputtering