

# Ion Beam Maintenance Training Course

An intermediate-level course providing knowledge and skills designed to enhance internal self-sufficiency by improving hardware troubleshooting and fault diagnosis.

⚙️ Intermediate-level	👥 4 places
👤 Training Manager	🕒 4 days
📍 UK headquarters	🍴 Included
📋 Classroom	

## Course details

- System health and safety
- System health checks and benchmarking tool performance
- Introduction to vacuum (if required)
- Location of the main hardware components, such as platen, source, targets, and neutralise
- Introduction to Ion Beam
- LogViewer for identifying system health trends
- Full schematic walkthrough
- High voltage DC power supplies
- X20 PLC
- EN13849 for Ion Beam (machinery standard safety circuit)
- RF Matching and the Automatic Matching Unit (AMU)

## Suitability

Equipment Engineers seeking to develop the essential skills required to troubleshoot system hardware issues as they might arise, bringing self-sufficiency to the fault diagnosis process. Attendees will be working in and around live conductors during the fault tracing exercises and must be suitably qualified and experienced before undertaking assessment.



- Essential skills – Practical units including:
  - Source disassembly
  - Grid cleaning
  - Neutraliser conditioning
  - Bearing change and set up
  - Water seals replacement
- Practice diagnostic skills and fault tracing exercise using actual fault scenarios as reported by field service engineers
- Optional candidate assessment included (multiple-choice question sheet)
- Understand the source state controller to aid isolation of system hardware failures