X-MET8000 Series

Rapid, accurate analysis of precious metals





The Business of Science®

X-MET8000 Series

Maximise profits through smarter buying and selling

In order to control costs and quality, jewellery and other precious metal items (e.g. coins, silverware) are tested for composition many times over their life-time, from the raw materials to the finished product to the recycling. The analysis is also required to verify authenticity, and determine monetary value. The high price of precious metals such as gold (Au) and platinum (Pt) means that a small difference in their contents means a large difference in the product's value. Handheld X-ray Fluorescence (HHXRF) analysers are commonly used for this test, as they

provide non-destructive, "point and shoot" multi-element analysis of large and small precious metals items.

Capitalising on the success of its **X-MET**7000 Series, Oxford Instruments has raised the bar with its latest range of handheld XRF analysers, the **X-MET**8000 Series. The optimised combination of high performance X-ray tubes and Oxford Instruments' large area silicon-drift detector (SDD) delivers the speed and performance required throughout the precious metals life cycle, from refining to recycling, with the following advantages:

- Non-destructive No mark left on the sample, no material loss Retain the full value of the tested piece
- Fast and accurate High analysis throughput, for maximised productivity and profitability
- Low limits of detection Analyse impurities and toxic elements (e.g. Pb and Cd) to identify potentially harmful pieces
- Fully portable Compact and light (1.5kg with battery), the X-MET8000 can be transported and used anywhere anytime. All accessories fit in the small and rugged transport case
- Rugged: IP54 compliant for superior protection against dust and water; thick Kapton window (on X-MET8000 Smart), or optional shield (on Optimum and Expert models) to prevent detector and X-ray tube damage when testing small components and sharp objects





Main menu

Light stand and safety shield to measure small items on the go Results screen



X-MET8000 Series

METALS



Easy to use

- Proven "point and shoot" simplicity
- Intuitive, icon-driven user interface: minimal operator training required
- Large 4.3" colour touchscreen for excellent results visibility



- Quick-swap window with shield
- Quick-swap analysis window: no tool required to change the analysis window when broken or dirty
- Customisable results screen for fast valuation: display information that is important to you, e.g. karat value and/or full chemistry, with elements listed in your chosen order
- Optional integrated camera for accurate measurement positioning
- Optional benchtop stand to transform the **X-MET** into a benchtop analyser for optimum productivity and operator safety when measuring small and awkwardly shaped samples

Powerful data management

- Store up to 100,000 results including spectra and sample image (if camera is fitted)
- Download results and reports directly to a USB memory stick using a CSV format or tamper-proof PDF for ultimate data integrity
- Automatically send results to a networked computer after each analysis: all results are saved immediately and can be processed further
- Print results on paper or sticky labels using a portable Bluetooth printer to attach them to measured items; no mix-ups
- Create customised, professional looking reports using the X-MET report generator (no software installation needed): include company logo, sample image, results, spectra, additional sample information (e.g. description, batch number) etc.



Oxford Instruments: meets all your precious metals analysis needs

Handheld XRF: For fast, reliable, non-destructive analysis of precious metals alloys (e.g. jewellery, coins, silverware), from items valuation to quality control and identification of tramp elements.

X-MET8000 Smart: Cost effective solution for rapid karat and chemistry determination.

X-MET8000 **Optimum** and **Expert**: When full flexibility and best performance are needed.

Benchtop small-spot XRF: For the rapid analysis of intricate, small pieces (e.g. individual links on a necklace), and the determination of coating thickness (e.g. Rh on white gold).



OiService - Here to help

OiService aims to keep your **X-MET**8000 working as hard as you do. Our global network of Service hubs provides a full range of technical support:

- Telephone help-desks For a fast response to your problem
- **On-line diagnostics** In-depth support over the internet
- Rental instruments To keep you working when your analyser is not
- Recertification and maintenance Ensures your analyser produces the right result every time
- **Training** Understand your analyser and its features
- Extended warranties Avoid unplanned costs
- Consumables and accessories From spare batteries to benchtop stands
- **Repairs** Fast and efficient turn around

X-MET8000 service agreements provide a great way to avoid unplanned costs and ensure your analyser is maintained in excellent condition. Purchasing an agreement with your analyser provides seamless coverage for up to 5 years.

visit www.oxford-instruments.com/X-MET8000 for more information or email: industrial@oxinst.com

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