### HITACHI Inspire the Next

#### Analyzers for hazardous substances



## RoHS screening simplified

Ensuring compliance with today's hazardous substance directives adds a layer of complexity to manufacturing facilities already under pressure to meet delivery deadlines. And changing specifications add more uncertainty.

When it comes to meeting RoHS and similar directives, manufacturers need equipment that gives them results they can trust for every measurement and will integrate easily into a busy production environment. This has been our focus during our 45 years of developing high-end analysis equipment for real-world production and ever-evolving RoHS directives.

Hitachi analyzers for compliance are designed to meet specific ranges of current directives, depending on the application, including RoHS, ELV, EN71 and halogen-free standards. And as directives develop over time, so does our equipment, with software upgrades that ensure you are always meeting current obligations.

From the EA1000AIII that puts simplicity and ease-of-use at the forefront, to the automation features of the EA6000VX, our range of analyzers help ensure compliance - fast.





# your business

Which of our range of analyzers is best depends on your specific application, which directives you need to meet and your production volume. However, all our analyzers offer the

#### SUPPORTS RoHS AND OTHER DIRECTIVES

The EA series and HM1000A detect metals and phthalates covered under regulations. The analyzers come pre-loaded with RoHS software and calibrations can be updated as directives change over time.

#### EASY TO USE

The software is intuitive, sample loading is simple, and results are presented in an easy to understand format. This means there's no need to recruit specialist staff as the equipment can be used by anyone with just a little training.

#### **IDEAL FOR HIGH-VOLUME PRODUCTION**

Innovative RoHS software automatically stops detection once defined perameters are met, increasing sample throughput whilst maintaining accuracy.

#### **COSTS LITTLE TO RUN**

Few consumables are needed, and the analyzers are designed to reduce the need for expensive helium by optimizing the detection technology for air or nitrogen-based analysis.

#### **ANALYZE A RANGE OF SAMPLES**

Large chamber sizes with moveable precision stages mean you can analyze a wide variety of sample shapes and sizes without losing accuracy.



#### EA1000AIII: SIMPLIFIED ANALYSIS FOR EASY RoHS SCREENING

The EA1000AIII has been developed to speed up and simplify RoHS testing in production environments. The analyzer helps you work toward the current RoHS, EN71 and halogen-free directives and allows you to update substance control criteria as directives change over time.

#### The EA1000AIII offers:

- Ability to load up to 12 samples at once, helping to reduce overall measurement times
- Automated monthly reporting that keeps records up to date and helps demonstrate the steps you have taken to meet the RoHS directives compliance
- Optimized measurement time during analysis to deliver the highest accuracy within the shortest timeframe
- Superior differentiation between elements that are very close in type, improving accuracy
- Automatic selection of optimum analysis recipe for most accurate result
- Measurement time of less than 70 seconds to detect lead, cadmium, mercury, chromium and bromine in plastic.



#### EA1400: HIGH THROUGHPUT RoHS ANALYSIS

The EA1400 benchtop XRF analyzer uses leading detection technology coupled with innovative X-Ray optics design for rapid analysis of RoHS substances including lighter elements.

#### The EA1400 offers:

- High performance SDD detector boosts the count rate for improved resolution of trace elements from the bulk material
- The optimized X-ray irradiation method means that there is a more reproducible analysis of uneven and irregular surfaces
- Pass/fail determination can be made before defined measurement time with the in-built software
- Vacuum option gives superior measurement ability for lighter elements
- Screening for cadmium in brass is twice as fast as conventional models, allowing for higher throughput
- Beyond RoHS screening, the EA1400 also has the capability to distinguish between the main components in slag (Si, Ca, Al and Mg), polymers, minerals, chemicals and other materials.





#### HM1000A: FAST AND SIMPLE SCREENING OF PHTHALATES FOR RoHS COMPLIANCE

This thermal desorption mass spectrometer helps you meet the latest RoHS directive for phthalates by giving you a first-pass screening test for the covered substancesIts small footprint makes it suitable for manufacturers, retailers and importers.

#### The HM1000A offers:

- A fast method of determining the total amount of prohibited phthalate esters within a sample to establish which products will need to undergo further testing
- A screening time of only 10 minutes, which is much less than standard testing methods
- An auto-sampler that can accommodate up to 50 samples at once, helping to streamline the testing process
- Relatively low-cost measurements as analysis is carried out in nitrogen, not helium
- Intuitive and easy to use software that's easy to navigate and helps to reduce operator error
- Ability to export results into Excel format for easy record-keeping.



#### X-MET8000: RAPID AND RELIABLE REGULATORY COMPLIANCE SCREENING

In addition to our benchtop analyzers, the handheld X-MET8000 XRF analyzer provides fast and non-destructive screening for many regulatory directives, including RoHS, CPSIA, ELV and EN71-3.

#### The X-MET8000 offers:

- An easy to use and lightweight analyzer
- Ability to give you results in seconds.



## What next?

Contact one of our experts today at **contact@hitachi-hightech.com** to discuss which analyzer is best for your RoHS analysis and arrange a demo.

#### **MORE INFORMATION**

To find out more about the range of analyzers for RoHS, visit www.hitachi-hightech.com/hha

## Other products

We have been providing production analysis products to a wide range of industries for over 45 years.

- **Microspot XRF:** for precise analysis of the smallest samples and features of miniaturized electronics.
- **Benchtop EDXRF:** for rapid analysis of polymers.
- Electromagnetic gauges: for rapid thickness measurement of PCB copper for surface mount and thru-hole technology.
- **Thermal Analysis:** sensitive materials analysis including material temperature stability and thermal expansion.

Browse our full range of products online at **www.hitachi-hightech.com/hha** 

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