Technical Data Sheet

Max +

Max + extends the operational EDS range of your microscope to acquire high quality EDS data simultaneously with WDS, under high beam current conditions.

Max + is a flapped interface, with a rotatable aperture disc. The Ultim Max detector can be retracted behind the aperture, collimating the X-ray signal, allowing EDS acquisition at a wider range of beam currents.

- Max + does not affect the performance of the Ultim Max detector when fully inserted, for high sensitivity, high solid angle nanoanalysis.
- Extends range of beam currents at which the Ultim Max detector can collect EDS data, fully matching the range required for all types of WDS analysis.
- Allows EDS spectra to be collected at optimum resolution for accurate quantitative analysis when combined with WDS.

Example of functional beam current ranges for quantitative EDS analysis:

- The rotatable aperture disk in the Max + flap provides 5 selectable apertures sizes and 1 blank, allowing quantitative analysis at beam currents greater than 1000 nA.
- The colour coded rings in this image represent the typical types of analysis possible with each beam current range for the different apertures.

Out of operating range
Mapping (> 800 kcps)
Qual Analysis (400 - 800 kcps)
Quant Analysis (<400 kcps)
Blank

'Aperture 3 recommended for routine simultaneous EDS and WDS analysis.'