Phenom Inserts for Resin and Metallurgical Mount Samples

For Phenom XL Desktop SEM





thermoscientific







For clamping 6 x 32 mm (11/4") diameter resin mounts



For clamping 9 x 25 mm (1") diameter resin mounts

A unique sample holder concept

Embedding, cutting and polishing are common techniques used to create flat samples for microscopic investigation.

Typically, these samples are embedded in a resin and can have a few standard size diameters.

The Manual Z sample holder which is normally used in the Phenom XL can be extended with 3 types of resin or metallurgical mount inserts. This means that the sample holder can accommodate the most common sized resin mount samples.

The resin mount inserts offer a few specific advantages. Sample clamping is very straight forward and all samples will have the same working distance, which is very useful when performing X-ray (EDS) analysis.

Resin mount samples have a perfectly -flat- prepared top surface, which is a requirement for quantitative EDS results. However, the bottom surface can be very rough or even skewed. Mounting these samples without the insert can often result in the top surface not being level, which can have a negative effect on the EDS quantification results.

By using the inserts, the resin sample bottom will not touch the surface of the sample holder. The top side of the resin samples will be perfectly clamped at the same height inside the insert, enabling both high resolution imaging and EDS analysis at the same time.

The Resin and Metallurgical Mount Sample Insert is available in 3 models to support standard sized samples of 25 mm (~1 inch), 32mm (~1½ inch) and 40 mm (~1½ inch) diameter. An allen key for clamping the samples is included.

Specifications	
There are 3 types of resin mount inserts available depending on sample size requirement:	
4 x 40 mm	11/2" diameter samples, maximum 25 mm height
6 x 32 mm	11/4" diameter samples, maximum 25 mm height
9 x 25 mm	1" diameter samples, maximum 25 mm heigh

