

DATA SHEET

Extended hot mirror

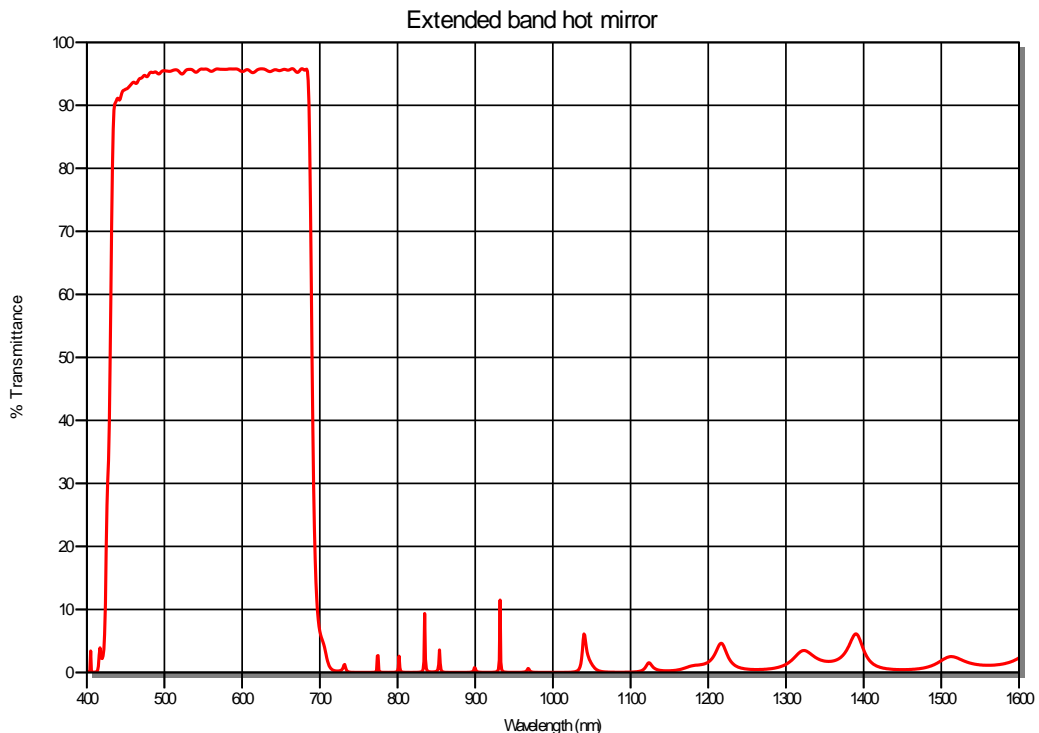
A 'hot mirror' coating is designed to reflect the heat component from the visible light developed by high intensity light sources, while allowing the visible light to pass through with minimal loss or colouration. Orion Photonics offers an extended hot mirror coating designed to attenuate the IR from 0.7 to 1.6 μ m. The hot mirror coatings can be configured to suit different applications and operate at different angles and wavebands. They exhibit high efficiency visible transmission with high attenuation of infra-red radiation. Manufacture is by plasma assisted electron beam deposition process which provides high spectral stability independent of temperature or humidity variations. The coatings are extremely rugged, passing all relevant military specifications.

Features of the hot mirror coatings are:

- Plasma assisted deposition for thermal and environmental stability
- High visible transmission with minimal colouration and efficient heat rejection
- Temperature stable with extended operational lifetime
- Meets most military durability specifications

Typical Specification for hot mirror coating

Transmission 425-680nm	>85% average
IR rejection 730-1600nm	>98% average
Operating temperature range:	-40 to 200°C
Adhesion, abrasion resistance	MIL-C-48497
Humidity, salt fog, temp. shock	MIL-STD-810B



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