

© GIA. Photo by Robert Weldon.

Species - Variety:

Corundum - Sapphire

Locality:

United States, Montana (Judith Basin), Yogo Gulch

Description

Shape: Cushion

Weight: 2.57 ct

Dimensions: 9.12 x 7.55 x 3.71 mm

Diaphaneity: Transparent

Color: Medium, strong, violetish Blue

Gemological Properties

Optical Character: Uniaxial negative

Refractive Index: 1.760 / 1.768

Birefringence: 0.008

Specific Gravity: 4.01

Pleochroism: Greenish blue / Violetish blue

Luster: Vitreous

Phenomenon: None

Fluorescence:

LWUV: None

SWUV: None

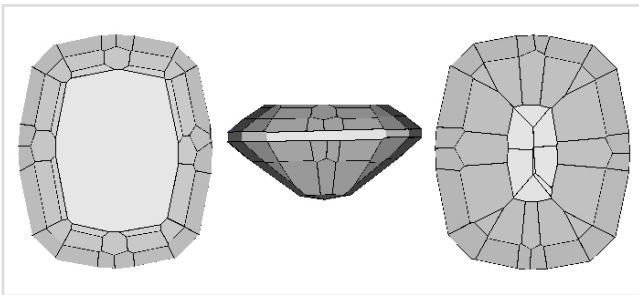
Phosphorescence:

LWUV: None

SWUV: None

Absorption Spectrum:

Broad absorption below 420 nm and above 600 nm; line at about 450 nm



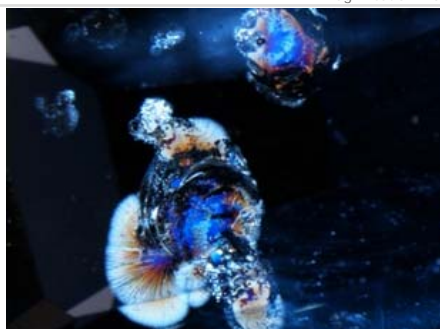
Facet Diagram: top | side | bottom

Photomicrograph

This blue sapphire contains several partially healed fracture with iridescent fingerprint inclusions with small solid inclusions and negative crystals.

Magnification: 20x

These fingerprints exhibit thin-film iridescence colors due to light from a fiber-optic illuminator. The field of view is 4.35 mm across.



© GIA. Photomicrograph by John Koivula.

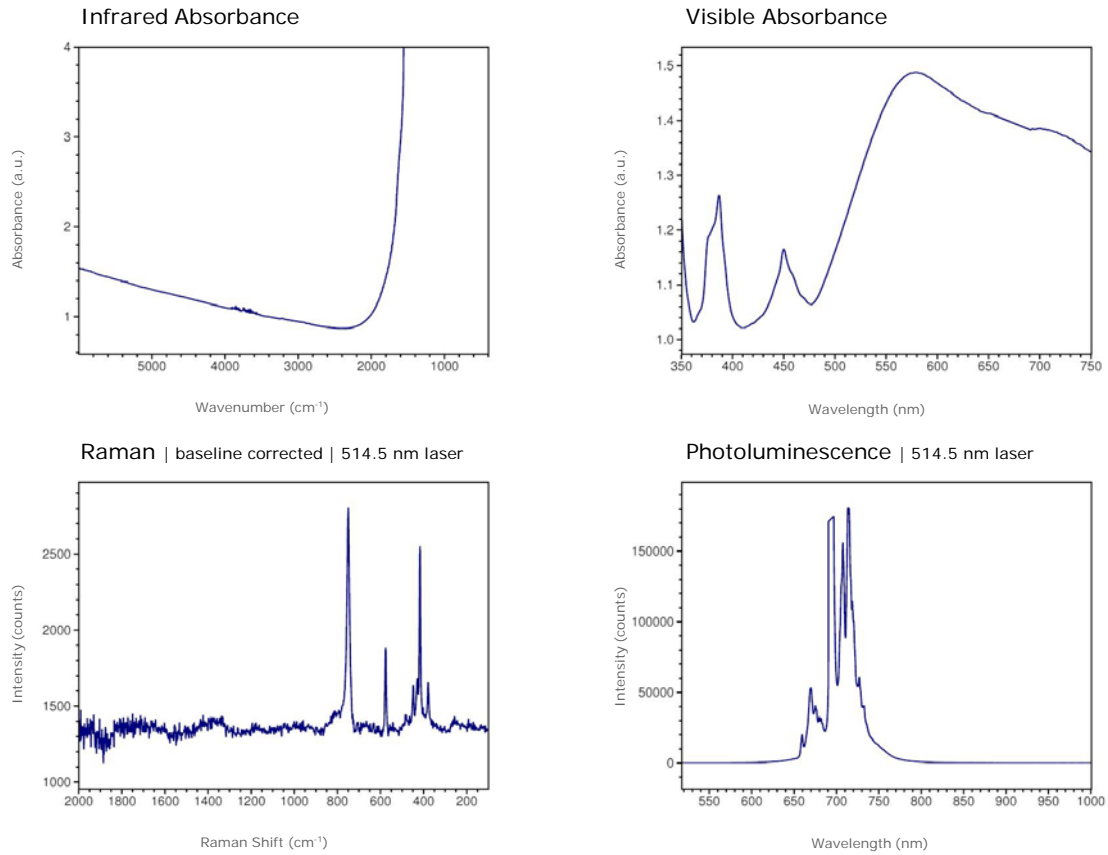
GIA Gem Database | Edward J. Gübelin Collection

Corundum - Sapphire | United States, Montana (Judith Basin)
GIA Collection Number: 35216



© GIA. Photo by Robert Weldon.

Spectrum



Chemistry | EDXRF

