

Note: This is a special corrected Table of Contents and Errata sheet, current through 3 August 2018

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ERRATA

PAGE 2

Spill the wine

Important pair of ruby and diamond pendent earrings, featuring untreated Mozambique Myanmar rubies of 11.10 and 10.41 ct respectively. These sold for HK\$8,850,000 (US\$1,141,223) at Tiancheng's 15 December 2015 sale. Image © Tiancheng International Auctioneer Ltd.

PAGE 46

Column 2, paragraph 8

Change Zylin Sun to Ziyin Sun.

PAGE 65

Column 2, last paragraph

Change 18 cm to 18 mm.

PAGE 94

Column 1, last paragraph

Change cohesion to adhesion

PAGE 161

Figure 4.78:

Rays C and D were accidentally omitted. See the following page for the correct figure.

PAGE 161

Column 2, add:

Chase, A.B. and Osmer, J.A. (1970) Habit changes of sapphire grown from PbO-PbF₂ and MoO₃-PbF₂ fluxes. *Journal of the American Ceramic Society*, Vol. 53, No. 6, pp. 343–345; RWHL.

PAGE 162

Column 1, add:

Harlow, George E. and Bender, W. (2013) A study of ruby (corundum) compositions from the Mogok Belt, Myanmar: Searching for chemical fingerprints. *American Mineralogist*, Vol. 98, No. 7, pp. 1120–1132.

PAGE 163

Column 1, change "Moon and Phillips (1991a) to read as follows:

Moon, A.R. and Phillips, M.R. (1991a) Iron and spinel precipitation in iron-doped sapphire. *Journal of the American Ceramic Society*, Vol. 74, No. 4, April, pp. 865–868; RWHL*.

PAGE 164

Column 1, change "Volynets and Sidorova (1971) to read as follows:

Volynets, F.K. and Sidorova, E.A. (1971) The absorption spectrum of alumina containing vanadium. *Journal of Applied Spectroscopy*, Vol. 14, No. 1, Jan., pp. 68–70; RWHL.

PAGE 191

Column 1, change "Koivula (1980a)..." to read as follows:

Koivula, J.I. (1980a) Fluid inclusions: Hidden trouble for the jeweler and lapidary. *Gems & Gemology*, Vol. 16, No. 9, Spring, pp. 273–276; RWHL*.

PAGE 258

Column 2, Figure 7.13, line 2

change "In natural stones (right)..." to "In natural stones (left)..."

PAGE 264

Column 2, Table 7.2, Verneuil Syn. Corundum, Red, Pink

change "C³⁺" to "Cr³⁺".

PAGE 307

Column 1, change "Plato (1952)..." to read as follows:

Plato, W. (1952) Oriented lines in synthetic corundum. *Gems & Gemology*, Vol. 7, No. 7, Fall, pp. 223–224; RWHL*.

PAGE 326

Figure 9.10

change "γ" to "o".

PAGE 326

Column 1, in Meen, V.B. (1969) change "Vol.8" to "Vol. 13".

Meen, V.B. (1969) The largest gems in the crown jewels of Iran. *Gems & Gemology*, Vol. 13, No. 1, Spring, pp. 2–14; RWHL.

PAGE 549

Figure 12.45. Map. Change "Andranddambo" to "Andranondambo".

PAGE 549

Figure 12.99. Superb example of a 15 ct untreated M^öng H^su Mogok ruby.

Photo: Wimon Manorotkul; ring: Veerasak Gems

PAGE 574

Column 1 change "Scott (1936a)..." to read as follows:

Scott, W.H. (1936a) The ruby mines of Burma. *Gems & Gemology*, Vol. 2, No. 1, Spring, pp. 3–6; No. 2, Summer, pp. 31–34; RWHL.

PAGE 675

Column 1, "Schubnel (1975)..." change "No. 43" to "No. 45":

Schubnel, H.-J. (1975) Excursion à la mine de saphirs de Bò-Phl^oi (Thaïlande). *Revue de Gemmologie A.F.G.*, No. 45, December, pp. 8–10; seen.

PAGE 725

Column 2

Add Galibert, Olivier 45, 389, 454–456, 527–528, 571, 656

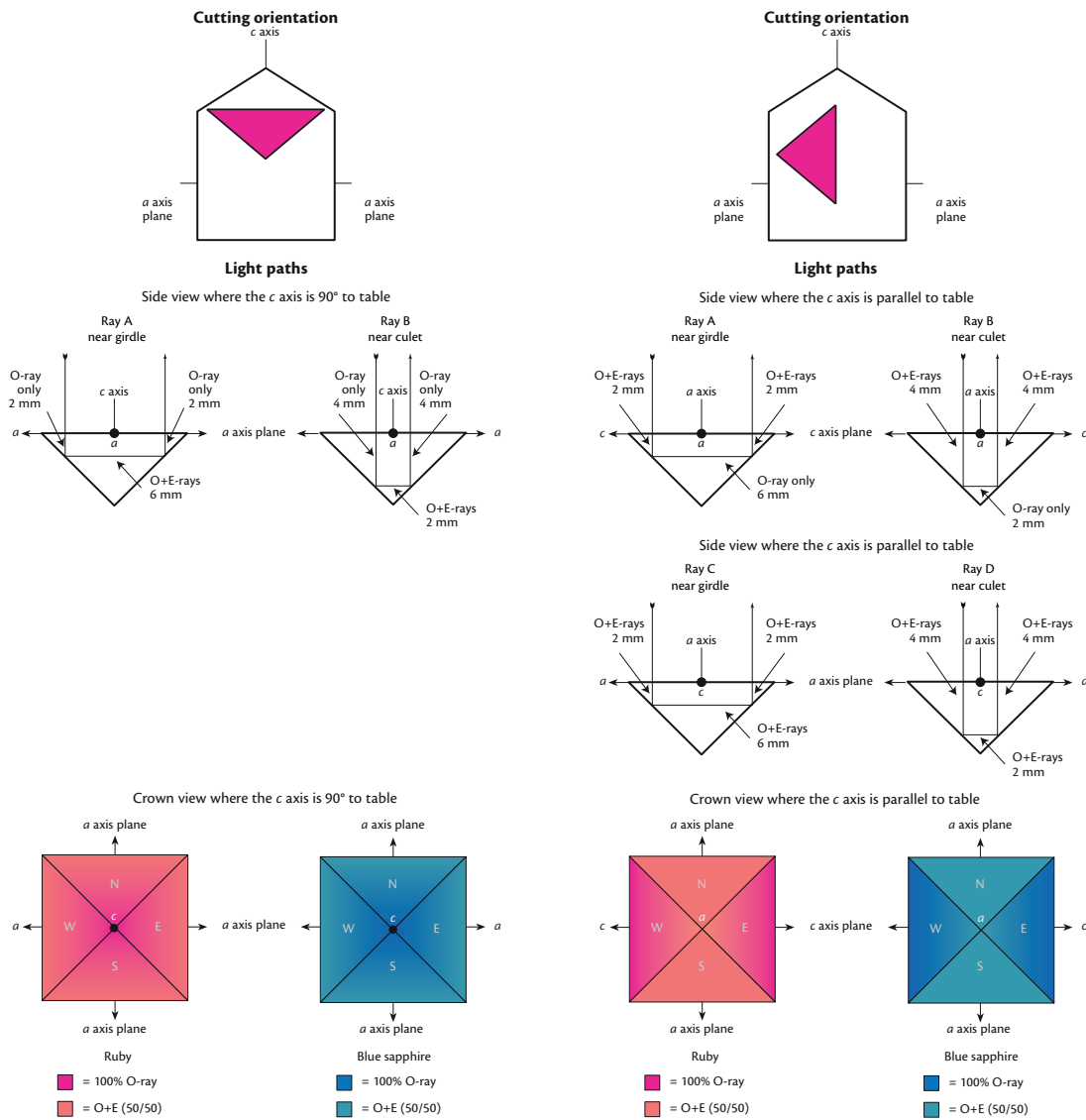


Figure 4.78 The visual effects of pleochroism on the appearance of corundum

The stone above left is cut with the c axis 90° to the table facet.

- Ray A enters near the girdle, traveling 4 mm parallel to the c axis (O-ray only) and 6 mm parallel to the a axis (3 mm of O-ray and 3 mm of E-ray). The color of Ray A therefore consists of 70% O-ray and 30% E-ray.
- Ray B strikes the pavilion much closer to the culet. Ray A and Ray B have identical path lengths, each traveling 10 mm through the gem. But Ray B's light path consists of 8 mm parallel to the c axis (8 mm of O-ray only) and just 2 mm parallel to the a axis (1 mm of O-ray and 1 mm of E-ray). Thus, the color of Ray B is 90% O-ray and only 10% E-ray.

The stone above right is cut with the c axis 90° to the table facet.

- Ray A has 6 mm of O-ray only, and 4 mm of equally mixed O- and E-rays, giving a total of 80% O-ray and 20% E-ray.
- Ray B consists of 2 mm of O-ray only, and 8 mm of equally mixed O- and E-rays, giving a total of 40% O-ray and 60% E-ray. As a result, the color on these facets will show more of the O-ray near the girdle and less at the culet.
- Rays C and D are equal mixtures of O- and E-rays, because their entire journey takes place perpendicular to the c axis. Those facets will display a uniform 50%–50% split.