

ZIRCON;

A GEM RADIATES FROM INSIDE...

The Kalpa Tree of Hindu religion, a symbolical offering to the Gods, is described by Hindu poets as a glowing mass of precious stones. Pearls hung from its boughs and beautiful emeralds from its shoots; the tender young leaves were corals, and the ripe fruit consisted of rubies. The roots were of sapphire; the base of the trunk of diamond, the uppermost part of cat's eye, while the section between was of topaz, the foliage (except the young leaves) was entirely formed of zircons.

By Fredrick Kunz in "The Curious Lore of Precious Stones"

Zircon has always been a popular gemstone throughout history for different reasons. While colorless zircon was considered a convincing substitute of diamond for centuries before cubic zirconia or moissanite appeared in the market, all other colors were enjoyed in their own merit thanks to its high dispersion. Zircon tends to be high in clarity, although its eye-visible double refraction may cause a hazy appearance in faceted stones. It is also a brittle gemstone despite its relatively high hardness. Zircon is best set in pendants and earrings rather than rings and bracelets to enjoy its beauty longer.



8.90ct blue zircon. Courtesy of Mayer and Watt.
Photo by Geoffrey Watt

Zircon contains trace amount of uranium and thorium, which make its crystal structure unstable, hence the term metamict. Although it is slightly radioactive, the level of radioactivity is too low to pose any health concerns. Gemologists use this property as a useful identification feature as these elements create a significant visible spectrum. Most zircons are heat treated to enhance their color. It comes in colorless, yellow, brown, green, red, and blue.

Blue zircon from Cambodia is sufficiently available to support the market today. Vivid blue accompanied by high dispersion make this variety very popular as the color is akin to cuprian tourmaline. Almost 80% of all zircons sold in the market are the blue variety. Also, blue zircon demands the higher per carat prices compared to other colors due to its popularity. Lower saturation or lighter tones of blue diminishes the price as expected.

Early in the last decade a noteworthy amount of zircon from Tanzania entered the market. This material has a slightly orangey rich brown color with strong pink component, a color not typically seen in the traditional material from Sri Lanka or Cambodia. For this reason, the market was particularly excited about the material. After a long period of price sta-

bility, zircon has experienced a price increase during last decade. Brown zircons lacking the pinkish modifier are priced lower.

Orange, green, and red zircons are also reportedly in higher demand than they historically have been. However, dealers advise that these colors are not as common in the market. Prices have held stable but production is sporadic at best for all but the orange variety. There are rare examples of cat's eye zircons which are considered collector's stones. Recently, SSEF Gem Lab in Switzerland published that they have tested rare color-change zircons from Burma. Although this phenomenon of zircon is known, these particular examples display grayish blue to slightly purplish-blue in daylight to green and greyish green in



An art deco platinum ring set with 12.15ct brown zircon and diamonds. Courtesy of Heritage Auctions.

incandescent light. The research has indicated that the phenomenon is the result of heat treatment and the starting material is a rather unattractive brownish green. ♦

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