

Week	Gemmology Basics Theory Class– 36 hours
1	Intro to program & Role of the Gemmologist in the Jewellery Trade  Formation of Minerals & Gemstones
2	Crystallography
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4	Hardness, Cleavage, Fracture and SG
5	Nature of Light – EM Spectrum, reflection, refraction, TIR, SR, DR, intro to polariscope and polarized light, refractometer.
6	Nature of light. Review of Refraction, measuring RI and the Refractometer  Absorption of light, Polariscope, Spectroscope, Pleochroism, Dichroscope, colour filters
7	Optical Effects – Internal and External  Magnification
8	Other Gem Properties ex fluorescence
9	Gemstone Pipeline
10	How Gems are Finished Nomenclature and Units of Weights and Measurement
11	<i>Assembled, Treated and Imitation stones define assembled and imitation, weight lecture on an introduction to treatments in preparation to Gemstone Theory Course.</i>
12	<i>Synthetic Gem Materials this is an introduction to synthetics, weighted on Flame Fusion method.</i>