

Abstract Submitted
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Spectroscopic Analysis of Today's Compact Fluorescent Light Bulbs EDWARD PLUHAR, None — In today's consumer market, there are many different light bulbs that claim to produce 'natural' light. In my research, I both quantitatively and qualitatively analyzed this claim. First, utilizing a spectroscope, I compared the spectra emitted by different brands and types of compact fluorescent light (CFL) bulbs to the spectra emitted by the Sun. Once the bulbs were quantitatively analyzed, I proceeded to qualitatively analyze them by exposing subjects to the different bulbs. The subjects were asked to rate the quality of color in different pictures illuminated by each type of CFL. From these tests, I was able to determine the "best" CFL bulbs, and conclude whether the health risks associated with CFL bulbs outweigh the cost savings, longevity of the bulbs, and/or quality of light benefits.

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None

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