

## **Optical Properties Demonstration Device**

OPTX is an inexpensive optics demonstration and experimentation kit for the study of light reflection, refraction, transmission and absorption for middle-school curriculum. This project was a cooperative effort between mechanical engineering and industrial design students. Students and teachers can use OPTX to see that the four optics phenomena can take place concurrently, and to student the variables affecting reflection, refraction, transmission, and absorption.

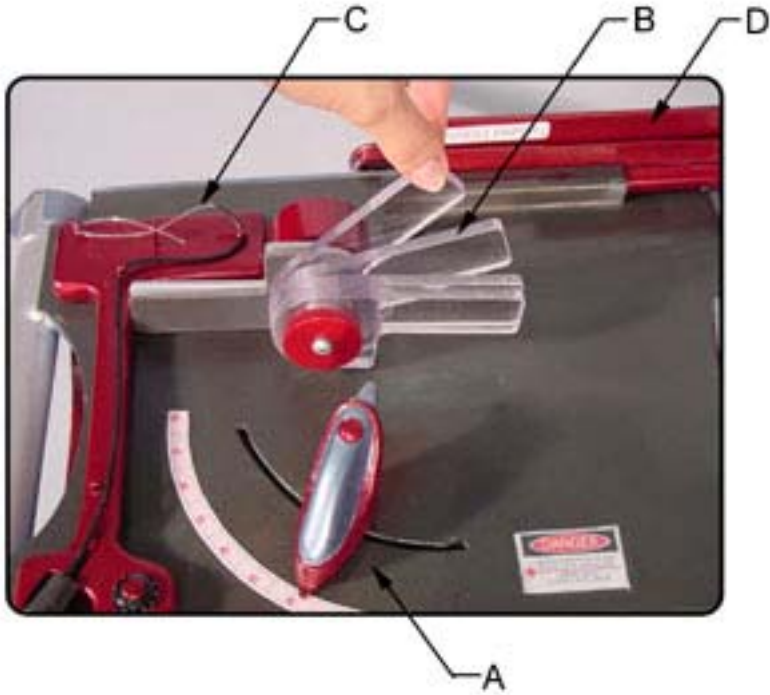
OPTX consists of a carrying housing case the optical components to demonstrate or experiment light reflection, refraction, transmission and absorption. The cover of the case can be turned into the legs of the test perform where all the optical components are pre-set and ready for use.



**OPTX Equipment**



**OPTX Bench When Open**



A = Laser pointer on a circular track

B = 1-to-4 glass plates to interact with laser

C = An optical fiber to interact with laser

D = Holder for screen to capture the optics phenomena