

# Hazard Analysis Software

## New Version!

Perform safety calculations using formulas in the ANSI Z-136.1-2022, IEC 60825 and EN 207 standards to obtain MPE's, NHZ's, OD's, and much more.

- Intrabeam
- Lens-on-Laser
- Diffuse Reflections
- Fiber Optics
- Extended Source Lasers
- And Many More



*Subscriptions and site licenses are available.*

### LAZAN™ 7 Premium

LAZAN™ Premium performs hazard evaluation and classification according to the ANSI Z136.1-2022 through computation or measurements, computes hazards pursuant to conditions 1, 2, and 3 from the IEC 60825-1, and calculates visual interference hazards and distances according to the ANSI Z136.6. Laser parameters may be stored to disk, and printed as an extensive customized report, which may also be saved as text.

### LAZAN™ 7 Standard

LAZAN™ performs over 50 calculations including MPE's, NHZ's, OD's, and EN-207 L Numbers. Laser data is saved in a networkable database and displayed in a customizable table on the main screen. Data entry is made easy with features like user-defined groups, multiple exposure time fields, and context- sensitive help.

### LAZAN™ 7 Lite

LAZAN™ Lite performs over 50 calculations including MPE's, NHZ's, OD's, and EN-207 L Numbers. Data entry is made easy with features like the Data Entry Wizard, multiple exposure time fields, and context- sensitive help.

## LAZAN™ Family Comparison Chart

	Changes to 2022 ANSI	LAZAN Lite	LAZAN Standard	LAZAN Premium
MPE (Eye)	•	•	•	•
MPE (Skin)	•	•	•	•
Maximum Optical Density (OD)	•	•	•	•
OD (Unaided & Optically Aided )	•			•
OD at Any Distance from Laser	•			•
Analysis by ANSI and IEC	•		•	•
Analysis by previous Standards	•			•
Thermal and Photochemical	•		•	•
Choice of units (W/cm <sup>2</sup> or W/m <sup>2</sup> )				•
Results displayed as irradiance or radiant exposure/pulse				•
Checks for Diffraction Limit and Duty Cycle				•
Selectable Result Display Options				•
Correction Factors List	•		•	•
Printable Data Entry Form				•
L Numbers		•	•	•
R, LB, & RB Numbers				•
NHZ's - Unaided Eye	•	•	•	•
NHZ's - Optically Aided Viewing	•			•
Laser Hazard Classification	•			•
Intrabeam	•	•	•	•
Lens on Laser	•	•	•	•
Fiber Optics	•	•	•	•
Diffuse Reflections	•	•	•	•
Pulse Groups	•			•
Layered Pulse Groups	•			•
Customized Viewing Optics				•
Specify Beam Shapes		•	•	•
Gaussian, Flat top Profile				•
Extended Source (Diode) Lasers	•		•	•
Beams with External Focus	•			•
Use Measured Values				•
Laser Barrier Separation Distance				•
Visual Interference per ANSI Z-136.6 / AC-70				•
Printable Range Data Graphs				•
Printable Screens				•
Saves Laser Data			•	•
ANSI Z136.1 & Z136.6 Examples	•			•
Database Management			•	•
Printable Database			•	•
Export Database to Csv File			•	
Print Reports		•	•	•
On Screen Exposure Demonstration				•