



962

### Portable 0/45 Spectrophotometer

A 0/45 handheld spectrophotometer designed to address a wide range of industry specific color needs, ensuring consistent color quality in the plant, laboratory or field.



## 962 Advantages

- **Easy to Read.** Large, graphical LCD display
- **Special PROJECT Mode.** Multiple color standards can be collected under an identified project as part of corporate color standards programs
- **Pass/Fail Mode.** Up to 1,024 standards with tolerances can be stored for easy pass/fail measurement
- **Interchangeable Apertures.** Measuring apertures are available to accommodate a range of samples
- **Wide Colorimetric Range.** Including: CIE XYZ, CIE Yxy, CIE LAB, Hunter LAB, CIE LCH, CMC, CIE94, Whiteness and Yellowness per ASTM E313-98, Metamerism Index and DIN 6172
- **Inter-Instrument Agreement.** Superior agreement capabilities ensures integrity of multiple-instrument color control
- **Opacity, Color Strength and Shade Sorting.** Device measures opacity, color strength in chromatic, apparent, and tri-stimulus calculations, and 555 shade sorting for precise color control of products involving plastic, painted, or textile materials
- **User-Friendly Ergonomics.** A wrist strap and tactile side grips facilitate holding and a flip back target shoe adds flexibility
- **Rechargeable Battery.** Allows for remote use

## 962 Options

- Aperture kits for alternate spot sizes
- Remote battery charger
- Replacement rechargeable battery packs
- Fixtures and accessories for standardized sample measurement
- UV filter 968-61-08E

## X-Rite: Your source for accurate color. On time. Every time.

X-Rite is a world leader in providing global color control solutions for manufacturing and quality management requirements.

We lead the industry in offering service options to ensure uninterrupted performance of all X-Rite products. Training and educational resources are available globally and online for both new and experienced users to optimize their color measurement capabilities.

Visit [xrite.com](http://xrite.com) for more information about X-Rite products. X-Rite customers worldwide may also call the Applications Support team at [CASupport@xrite.com](mailto:CASupport@xrite.com) or Customer Service at 800-248-9748.



## Specifications

### Model Numbers

962 (7mm measurement area)  
962S (4mm measurement area)  
962L (15mm measurement area)

### Measuring Geometrics

0°/45°, DRS spectral engine, interchangeable apertures:

- 4mm measurement area/6.5mm target window
- 7mm measurement area/9mm target window
- 15mm measurement area/21.5mm target window

### Light Source

Gas-filled tungsten lamp

### Illuminant Types

C, D50, D65, D75, A, F2, F7, F11 & F12

### Standard Observers

2° & 10°

### Detector

Blue-enhanced silicon photodiodes

### Spectral Range

400 – 700nm

### Spectral Interval

10nm – measured  
10nm – output

### Storage

1,024 standards with tolerances,  
2,000 samples

### Inter-Instrument Agreement

CIE L\*a\*b\*:  
Avg. 0.20 DE\*<sub>ab</sub> based on avg. of 12 BCRA Series II tiles  
Max. 0.40 DE\*<sub>ab</sub> on any tile

### Short-Term Repeatability<sup>1</sup>

0.10 DE\*<sub>ab</sub> on white ceramic (standard deviation)

### Measurement Range

0 to 200% reflectance

### Measuring Time

Approx. 2 seconds

### Lamp Life

Approx. 500,000 measurements

### Power Supply

Removable (Ni-metal hydride) battery pack

### AC adapter Requirements

90 – 130VAC or 100-240VAC,  
50 – 60Hz, 15W max

### Charge time

Approx. 4 hours – 100% capacity

### Measurements Per Charge

1,000 measurements (within 8 hours)

### Display

128 x 256 pixel graphical LCD

### Data Interface

Patented bi-directional RS-232,  
300-57,600 baud

### Operating Temperature Range

50° to 104°F (10° to 40°C)  
85% relative humidity maximum (non-condensing)

### Storage Temperature Range

-4° to 122°F (-20° to 50°C)

### Weight

2.4 lbs. (1.1 kg)

### Dimensions

4.3"H    3.3"W    7.7"L  
(10.9 cm    8.4 cm    19.6 cm)

### Accessories Provided

Calibration standards, operation manual on CD-ROM, AC adapter and a carrying case

<sup>1</sup>Based on 20 measurements on a white tile.

\*Specifications and design subject to change without notice. X-Rite standards are traceable to National Institute of Standards and Technology, Gaithersburg, Maryland, USA.

