

## Ci7000 Series

Benchtop Sphere Spectrophotometer



### Ci7000 Series

### Industry-Leading Benchtop Sphere Spectrophotometer

- 1 Easy-to-read **LED status panel** provides real-time instrument status.
- 2 Embedded NetProfiler status verifies the device is in an optimized state via NetProfiler.
- 3 Video and door preview allows the operator to view the exact targeted spot. Video preview through Color iQC enables operator to capture an image of the measurement.
- 4 Instrument temperature and humidity sensors located above the drawer ensure the environment is suitable for measurements.
- 5 Multiple aperture plates offer flexibility to measure a wide range of sample sizes.

- 6 Sample positioning arm and fixturing capabilities minimize sample presentation variability.
- **Built-in storage drawer** ensures all calibration media and aperture plates are stored with the device to maintain organization.
- and direct transmission measurement, multiple areas of view for transmission measurement, laser targeting for small sample measurements, and an infinite width for measurement of larger samples. Transmission measurements can be made with the door open or closed.
- 9 Multiple connection ports enables connections via USB or ethernet.







### Ci7000 Series

Our industry-leading benchtop sphere spectrophotometer helps accelerate color approvals and reduce color rejections through features that provide procedural and operational efficiencies as well as color measurement consistency and accuracy.

Built on a history of innovation, the Ci7000 Series offers the latest color measurement technology available, combining the newest advances in 2D CCD array technology with sophisticated processing capabilities to deliver the industry's most accurate and repeatable color measurement.

### **CONFIDENCE**

### IN COLOR MEASUREMENT

The Ci7000 Series delivers industry-leading repeatability of  $\leq$ 0.01 Delta E and inter-instrument agreement as tight as  $\leq$ 0.06 Delta E to establish and achieve the strictest color standards for each stage of the product development process, from formulation to final production to quality control.



### **Unmatched Color Accuracy and Precision**

- Measure both color and appearance simultaneously with specular included (SPIN/SCI) or specular excluded (SPEX/SCE) conditions, allowing for the assessment of gloss.
- Communicate, share and coordinate color values and specifications seamlessly with the entire supply chain with 25% tighter specification than other industrial spectrophotometers.
- Ensure repeatable color across a global supply chain with a spectrophotometer that delivers the industry benchmark of .01 average Delta E.



### **Versatile Color Measurement**

- Measure color and appearance of opaque, transparent, translucent, and fluorescent samples.
- Measure a wide range of samples sizes with multiple reflectance and transmission aperture plates.\*
- Fasten a wide range of fixturing accessories to the instrument to measure a broad range of sample types.
- Control optical brighteners in paper, textiles, plastics, paint, and coatings with advanced calibrated UV.

\*Not included in the Ci7500

### **Parts & Accessories**

Compatible with all models, Ci7000 parts and accessories are designed to solve the most common device and measurement challenges.



Transmission Sample Holder
Assists in total or direct measurement of non-opaque samples



Port Down Vertical Stand
Enables port down reflectance measurements
for fast presentation and measurement on
samples like denim and fabrics.

# OPTIMIZE OPERATOR PERFORMANCE

The Ci7000 Series is more stable, delivers repeatable performance and is easier to service than any other benchtop sphere spectrophotometer on the market. For brands, this means measurement reliability across the supply chain.



### **Increase Operator Confidence**

- Delivers consistent configuration across all locations and eliminates the potential for error using automated, software-driven setup.
- Speed measurement time and guarantee a precise measurement using the on-board camera for preview and active targeting. The camera can also capture images for future retrieval so any smudges, scratches or imperfections can be detected and accompany the measurement data.



### **Maximize Productivity**

- Minimize downtime with easy and complete global on-site or near-site maintenance and service.
- Preserve legacy color data and ensure easy adoption in any supply chain with backwards data compatibility.



### **Optimize Instrument Performance**

- Pairs with NetProfiler to minimize color variance among instruments.
   NetProfiler is a combination of software and ceramic standards that allow customers to verify and optimize the performance of their instrument(s) on a regular basis.
- Ensures perpetual and optimal instrument performance when paired with NetProfiler.



#### **Dust Filter Kit**

Prevents dust and other airborne contaminants in the working environment from entering the instrument and negatively impacting performance.



#### Orange Juice and Liquid Test Tube Holder

Magnetically attaches to the front of the device to hold and measure orange juice and other liquids.



#### **Preform Holder**

Available for either reflectance or transmission measurement of non-opaque preform samples.



### **Compression Holder**

Pneumatic powered assembly enables measurement of deep pile samples.

### TOTAL COLOR SOLUTION

### **Digital Color Standard Specification**

By delivering the most accurate possible digital color specification to suppliers across even the most complex supply chain, brands can reduce costly errors and rework while speeding time to market.

When paired with X-Rite Color iQC quality assurance software, our Ci7000 Series benchtop spectrophotometers help brands quickly identify whether a sample is within tolerance, and if not, provides direct feedback to get it back on target.

#### **Formulation Excellence**

Together, the X-Rite Ci7000 Series and Color iMatch software help formulators meet color trends and achieve customer demands by capturing the most precise data and formulating ideal color matches with fewer corrections

Simply measure a sample with the Ci7000 Series spectrophotometer, then select the most appropriate recipe from Color iMatch formulation software for formulation success.

### **Global Quality Control**

The powerful combination of the Ci7000 Series and Color iQC software helps ensure consistent color quality throughout the workflow so final products meet color expectations. Whether approving production samples or finished goods, Color iQC can adapt to any workflow for fast, easy, and accurate color control.

This software-instrument combination also offers an unprecedented Audit Trail for transparency into device measurement details to quickly pinpoint problems that may affect color:

- Provides critical information to quickly and easily identify where color started to drift.
- Offers video preview and ability to save an image of the sample measurement with the job.
- Includes Digital Signature to identify which instrument was used, whether it was profiled, and the color standard used.
- Saves other critical device information, like internal humidity and temperature, with the job.





### A Benchtop Sphere Spectrophotometer

### **For Every Workflow**

	Ci7500  Reflectance-only benchtop ideal for laboratory or quality control applications that measure opaque samples.	Ci7600 Ideal for color quality control, improves color measurement, management, communication and reporting.	Ci7800  Supply chain instrument of choice, delivering an interinstrument agreement of .08 to meet the tightest tolerances.	Ci7860  The most advanced color measurement instrument in the market, delivering .06 average dE inter-instrument agreement.
Inter-Instrument Agreement (Max DE*)	0.15	0.15	0.08	0.06
White Repeatability (Max DE*)	0.03	0.03	0.01	0.01
Photometric Resolution	0.01%	0.01%	0.001%	0.001%
Spectral Range	360-750nm	360-750nm	360-780nm	360-780nm
Standard Reflectance Apertures Plates	10, 25mm	6, 10, 25mm	6, 10, 17, 25mm	6, 10, 17, 25mm
Optional Reflectance Aperture Plates	N/A	3.5 and 17mm	3.5mm	3.5mm
Standard Transmission Apertures	N/A	6, 10, 25mm	6, 10, 17, 25mm	6, 10, 17, 25mm
UV filters available (nm)	400	400, 420, 460	400, 420, 460	400, 420, 460
Wavelength intervals	10nm* 20nm	10nm* 20nm	5nm 10nm* 20nm	5nm 10nm* 20nm
Instrument Temperature / Humidity Sensors	1	✓	✓	✓

### Ci7500 / Ci7600 / Ci7800 / Ci7860

Industry Standards	USA and Canada: Standard for Safety Electrical Equipment For Measurement, Control, and Laboratory Use; UL 61010-1, Ed:3;
	CAN/CSAC22.2 No.61010-1

EU and International: Safety Requirements for Electrical Equipment for Measurement, Control, and Laboratory Use: 2014/35/ EU (LVD) - IEC/EN 61010-1 Issued:2010/06/10 Ed:3; Electrical equipment for measurement, control and laboratory use - EMC requirements: 2014/30/EU (EMC) - IEC/EN61326-1:2012/13

Measuring Reflectance: CIE No. 15, ASTM E1164, DIN 5033 Teil 7, JIS Z 8722, ISO 7724/1

#### Ci7600 / Ci7800 / Ci7860

Industry Standards	Measuring Haze: ASTM D1003
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#### Ci7500 / Ci7600 / Ci7800 / Ci7860

What's Included	Instrument with white calibration standard, black trap, green standard, UV calibration standard, aperture plates, manual (CD), AC
	adapter, and USB cable.

### The X-Rite Service Promise



X-Rite's Ci7000 Series benchtop sphere spectrophotometers are manufactured to rigorous quality standards and our global service options ensure uninterrupted performance. We back our devices with a one-year standard warranty\* that includes comprehensive global services and superior phone and web support.

The Ci7000 Series was purposefully designed with a modular architecture to allow for easy serviceability whether it requires a complete global on-site service or near-site maintenance and service. Adding a Ci7000 Service Program extends the assurance of optimum device performance and limited operational downtime and hassle. This program is ideal for those who require annual ISO or other certification and protection against unforeseen incidents. 17025 Certifications are also available.

With 800+ employees, 17 locations, and 30+ service partners worldwide, you can rest assured that we can serve you no matter where you are. \*unless different regulations or custom contracts apply

### Your Global Color Partner

We recognize that great color portrays great quality and know that your success hinges on the consistent and accurate production of this color. With so many places for color to go wrong, it can be hard to know how to get it right. That's where we can help. By blending the art and science of color, we help you achieve the highest level of color integrity so your product — and your customer's product — comes out ahead.



#### **End-To-End Solutions**

We provide solutions that span the entire workflow, from design through production, to ensure your color is optimized.

### Innovation

Bridging the gap between color and appearance, we are blazing the trail for you to take your color operations to the next level.

### **Experience**

With 60+ years of experience in color manufacturing, our expertise spans a range of industries.

#### **Passion**

Inspired by the great color our customers produce, our X-Rite color team provides quality support and training services.

Call **888-800-9580** or visit **www.xrite.com** 

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