

# micro-gloss 75

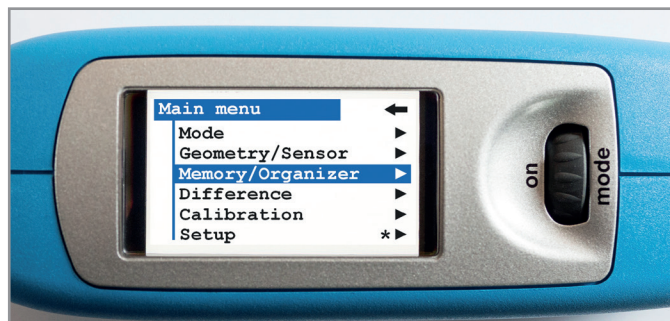
## Intelligent gloss measurement with smart communication

The micro-gloss has been the unsurpassed industry standard in gloss measurement for many years. It is the only glossmeter combining the highest accuracy, ease-of-use and multiple functionality – essential for today's testing requirements. In addition, the smart-chart software is the ideal tool for smart communication with professional documentation and efficient data analysis.



## Brilliant color display: easy to read – easy to use

Ergonomics and easy handling were the main focus for the design. The micro-gloss is not too large and not too small – it feels just right in your hand. The scroll wheel operation and new color display with an easy-to-navigate menu make gloss measurement easier than ever before.



## Auto diagnosis: Standard OK - Calibration OK

Accurate readings require reliable calibration. The gloss meter and calibration holder make a perfect couple – the calibration standard is always protected in the holder of the micro-gloss. The intelligent auto diagnosis of the gloss meter is a unique feature which guarantees long-term calibration stability and tells you when to calibrate. It even checks whether the standard is clean. Operator friendly. Safe.

| Autodiagnosis |    |
|---------------|----|
| 20°           | OK |
| 60°           | OK |
| 85°           | OK |

## 75° Gloss Measurement for Paper

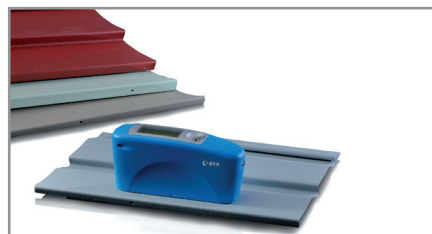
Especially coated paper, but also a variety of uncoated papers request gloss control. The 75° geometry is suitable for most ink films on **paper and paperboard**. Color differences have a negligible influence on measured gloss. For example, a white surface will measure less than one gloss unit higher than an otherwise identical black surface.

Very high gloss papers (laquered, highly varnished or waxed) should use a 20° measurement geometry. As defined in the TAPPI standard for bath QC at least ten test specimens free from folds or wrinkles or other imperfections are to be checked. The smart-lab Gloss software is ideal to document and communicate the measurement results. Its project management can be used to record the quality of one material over time and send the data either by PDF or Excel to all involved parties.



## 75° Gloss Measurement for Vinyl Siding

Another typical material to be tested for specular gloss using the 75° geometry is **vinyl siding** made principally from rigid PVC and is used to clad exterior walls of buildings. In order to evaluate the uniformity over large areas, the "Continuous mode" of the micro-gloss will display the gloss values in a predefined measurement interval while moving the instrument over the surface.



## Smart functions for any task

Different tasks require different tools. The easy to turn scroll wheel of the glossmeter quickly shows you all needed functions – even without a PC:

The **Basic mode** is your tool to quickly check the gloss of a few samples.

The **Statistic mode** not only shows the average, but all statistical data needed to judge whether the measured difference is significant or how uniform the surface gloss is on your sample. You define what you want to see: mean, standard deviation, range, min/max...

The **Difference mode** allows you to define a reference with Pass/Fail limits and will compare all of the following measurements to the selected reference. The Pass/Fail indication is colorfully shown on the high resolution display – ideal for production control.

The **Continuous mode** is the most efficient way to quickly check the uniformity of a large sample surface. You define the measurement interval and are now ready to continuously measure the gloss by sliding the micro-gloss over the surface. When finished, the average with min – max range are displayed.

## Technical Performance: Unsurpassed in the industry

No matter how harsh your production conditions are or how tight your limits may be, accuracy and reliability of the micro-gloss are proven by thousands of users to guarantee always the highest quality.

The long-term stable LED light source of the glossmeter provides not only highly repeatable results for many years, but also will never burn out. A 10 year warranty on the lamp life is guaranteed.

Due to advanced temperature control, the micro-gloss assures the highest stability of the gloss readings – if you are in the lab or move to a “hot spot” on the line.

Our patented calibration procedure during the production of the glossmeters enables an excellent inter-instrument agreement. No matter how far your customer may be away, if he is one of the thousands of micro-gloss users, he will read the same values as you.

## smart-chart – data analysis software

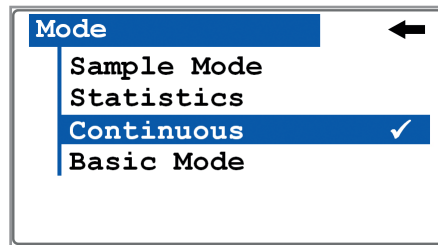
Whatever the task, smart-chart will do it for you. From simple data tables of single test series to trend reports over time – anything is possible.

### smart-lab for ONLINE measurement and memory transfer:

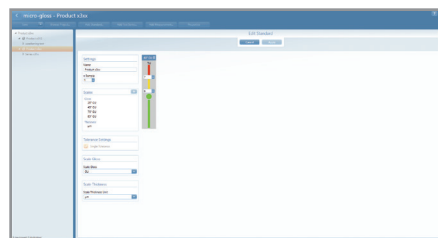
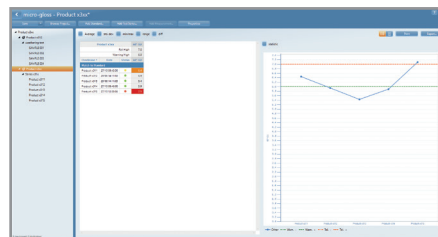
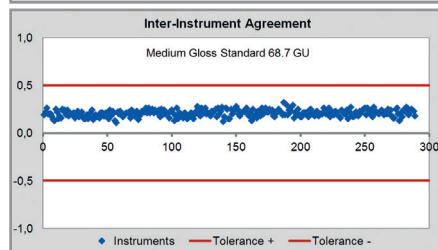
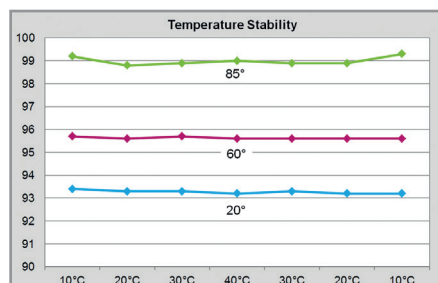
- Data analysis with tables and line graphs
- Data is organized in projects with easy to share xml files

### smart-process for a STANDARDIZED QC:

- Sampling process with predefined measurement procedures in Organizers
- Comprehensive data analysis with easy filtering and statistical analysis



| COUNTRY | VINYL 06  |      |      |
|---------|-----------|------|------|
|         | n = 12/99 |      |      |
| 75°     | $\bar{x}$ | min  | max  |
|         | 48.9      | 45.3 | 51.6 |



## Standards

ASTM D2457  
ASTM D3679  
Tappi T480



|                                       |                                               |
|---------------------------------------|-----------------------------------------------|
| <b>Catalog Number</b>                 | <b>4568</b>                                   |
| <b>Short Description</b>              | <b>micro-gloss 75°</b>                        |
| <b>Geometry</b>                       | 75°                                           |
| <b>Application</b>                    | Paper, Vinyl Siding                           |
| <b>Measuring Area</b>                 | 7 x 24 mm                                     |
| <b>Measuring Area</b>                 | 0.3 x 0.95 in                                 |
| <b>Measuring Range</b>                | 0 - 140 GU                                    |
| <b>Repeatability Gloss 0-20</b>       | 0.2 GU                                        |
| <b>Repeatability Gloss 20-100</b>     | 0.2 GU                                        |
| <b>Repeatability Gloss 100-2000</b>   | 0.20%                                         |
| <b>Reproducibility Gloss 0-20</b>     | 0.5 GU                                        |
| <b>Reproducibility Gloss 20-100</b>   | 0.5 GU                                        |
| <b>Reproducibility Gloss 100-2000</b> | 0.50%                                         |
| <b>Spectral sensitivity</b>           | CIE standard observer for illuminant CIE-C    |
| <b>Measuring time</b>                 | 0.5 seconds / geometry                        |
| <b>Memory</b>                         | 999 readings with date and time               |
| <b>Languages</b>                      | DE, EN, ES, FR, IT, PL, PT, RU, TR, ZH        |
| <b>Interface</b>                      | USB                                           |
| <b>Power supply</b>                   | one 1.5V AA Alkaline Battery, or via USB-port |
| <b>Battery Capacity</b>               | 4,000 readings                                |
| <b>Dimensions: L x W x H</b>          | 15.5 x 4.8 x 7.3 cm                           |
| <b>Dimensions: L x W x H</b>          | 6.1 x 1.9 x 2.9 in                            |
| <b>Weight</b>                         | 0.4 kg                                        |
| <b>Weight</b>                         | 0.9 lb                                        |
| <b>Operating temperature</b>          | 15 - 40 °C                                    |
| <b>Operating temperature</b>          | 60 - 104 °F                                   |
| <b>Relative humidity</b>              | up to 85 %, non-condensing                    |

### Delivery Content

Glossmeter, Calibration holder, USB-cable micro-gloss (4405), Software with 2 licenses for download: smart-lab Gloss (4866) or smart-process Gloss (4867), Battery, Traceable certificate, Manual, Carrying case

### System Requirements

Operating system: Windows® 10 1607 or later  
Hardware: i5 2.5 GHz; i9 recommended, or equivalent (x86 & x64 architecture only)  
Memory: 16 GB RAM, 32 GB recommended  
Free hard-disk capacity: 4 GB during installation  
Monitor resolution: 1920 x 1080 pixel; 4K recommended  
Interface: free USB-port

| Catalog Number | Short Description                 | Delivery Content                                                                           |
|----------------|-----------------------------------|--------------------------------------------------------------------------------------------|
| 4457           | Calibration Holder 75°            |                                                                                            |
| 4459           | Checking Standard micro-gloss 75° | Checking standards in aluminum guide<br>High gloss standard<br>Semi gloss standard for 75° |
| 4866           | smart-lab Gloss                   | 2 licensees for download <a href="http://www.byk.com">www.byk.com</a>                      |
| 4867           | smart-process Gloss               | Software with 2 licenses for Download                                                      |
| 4405           | USB-Cable micro-gloss             |                                                                                            |