



Version 25.01

PaintChecker Mobile Quick Start Guide

Setup



Setup

Your PaintChecker Mobile is a portable hand-held instrument for non-contact coating thickness testing of wet, powderous or solid coatings. The photothermal method allows the coating thickness to be measured without touching the surface.

Scope of delivery

- Sensor with connection cable
- Oray glass reference
- Controller
- 4 Charger
- **6** USB power supply
- 6 Two sets of 4 rechargeable batteries
- Shoulder strap
- 8 USB data cable
- USB drive with user manual, OS Manager software, etc.





Safety instructions

Controls and connectors

- Display
- 2 Function keys
- 6 Measuring button
- On/Off button
- Sensor connector
- 6 USB port

Safety instructions

Caution:

The PaintChecker Mobile uses short, intense light pulses (also in the non-visible range) for measurement. Please observe the following safety instructions:

- · Do not look into the sensor
- Do not point the sensor at the skin
- Do not point the sensor at flammable material
- Do not operate a damaged sensor
- Do not use the device in potentially explosive atmosphere (ATEX)

Please also observe the comprehensive safety instructions in the operating instructions for the mobile handheld devices in point 2.

Setup



Battery charging

Your PaintChecker Mobile is powered by rechargeable lithium-ion batteries.

Caution: Do not insert AA batteries, NiCd or NiMH rechargeable batteries of the same size into the controller or charger



- Take the included batteries out of the transport box
- Insert batteries into the charger (observe polarity; always charge all four batteries)
- Connect charger to the USB power supply
- Plug USB power supply into a mains socket
- Charging starts automatically



Once the charger display shows that charging is complete, you can remove the batteries.





Insert batteries

- Pull the controller out of the rubber sleeve
- Unscrew the battery cover on the back
- Insert the batteries (observe polarity)
- Attach the battery cover and screw it down
- Put the rubber sleeve back on

First measurements



The PaintChecker Mobile consists of a hand sensor and a controller, connected to each other by a cable:

- Take controller and sensor out of the case
- Plug the sensor cable into the controller
- The red dots on sensor plug and controller socket have to match



Power up and align sensor

- Press and hold the On/Off button until the diplay shows the measurement view
- The top display line indicates the measuring profile (application; figure left: IR Cured) and the battery status



- Activate the sensor by pressing the measuring button once
- The three light spots of the sight appear
- Align the measuring distance so that the three spots meet in the centre





Navigation

In measurement view, you can switch to the menu by pressing the Back button. The Back button toggles between Measurement view and menu.



Your PaintChecker Mobile is operated via a menu system and three function keys:

- 1. Select a menu item (\bigtriangledown)
- 2. Confirm selection (OK)
- 3. Return to the parent menu (Back)

The function is shown in the display above the respective key.



Taking a measurement

- Press the measuring button on controller or sensor to start the measurement
- Do not shake the sensor, keep the measuring distance aligned
- A beep indicates that the measurement is complete
- The display shows the coating thickness measurement result

Menu operations





Detisense Instrument settings Langue Units Precision mode Sound V OK Back

Statistical analysis

All measurements are recorded in a batch and statistically evaluated. The display shows the number of measurements taken (#) and the statistical key figures. You can scroll through the statistics parameters with the select button:

- σ: Standard deviation of the measurements
- T: Maximum value
- $\frac{1}{2}$: Minimum value
- x: Mean value

You can reset the batch and statistics by selecting *New Batch* in the Menu (see below).

Set language

- Switch to Menu
- Select *Instrument Settings* and confirm with OK
- Select Language and confirm with OK
- Select a language from the list and confirm with OK







Change application

Depending on the measuring task (e.g. freshly applied or baked powder coating), you need to select a suitable measurement profile, the so-called application:

- Switch to Menu
- Select *Measure settings* and confirm with OK
- Select Application and confirm with OK
- Select Load and confirm with OK
- Select an application from the list and confirm with OK

After returning to measurement view, the selected application is displayed in the head line.



Change measuring unit

You can choose to display the measured coating thickness in 1/1000 millimetres (μ m, microns) or 1/1000 inch (mils):

- Switch to Menu
- Select *Instrument Settings* and confirm with OK
- Select Units and confirm with OK
- Select microns or mils and confirm with OK

Menu operations







Turn sound on/off

By factory default, the PaintChecker Mobile acknowledges each measurement with a beep. You can turn the sound off in Instrument Settings:

- Switch to Menu
- Select *Instrument Settings* and confirm with OK
- Select Sound and confirm with OK
- Select On or Off and confirm with OK

Self-test

You can check proper operation of the PaintChecker Mobile using the included gray glass reference:

- Switch to Menu
- Select *Instrument Settings* and confirm with OK
- Select *Check instrument* and confirm with OK
- Place the sensor firmly on the gray glass reference and start the test by pressing OK twice

If both *Power* and *Test Function* are indicated as OK, the self-test has passed





Factory reset

A factory reset deletes all batches and userinstalled applications and returns all Paint-Checker Mobile settings to their factory defaults:

- Switch to Menu
- Select *Instrument Settings* and confirm with OK
- Select Factory reset and confirm with OK
- Start the Factory reset with OK





Power off

To turn off the PaintChecker Mobile, press and hold the On/Off button until the display goes blank.



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