Dustlight

Mini

elma instruments

Elma Instruments A/S
Ryttermarken 2
DK-3520 Farum
T: +45 7022 1000
info@elma.dk
www.elma.dk

Elma Instruments AS
Garver Ytteborgsvei 83
N-0977 Oslo
T: +47 22 10 42 70
firma@elma-instruments.no
www.elma-instruments.no

Elma Instruments AB
Pepparvägen 27
S-123 56 Farsta
T: +46 (0)8-447 57 70
info@elma.se
www.elma.se

The Dustlight is a hand-held particulate matter analyser for use in trade and industry. It measures respirable dust, the PM10 fraction of inhalable dust, as well as PM1 and PM2.5. The Dustlight has illuminated areas that are clearly visible from all sides and change colour when critical values are exceeded. This is based on the workplace limit values from TRGS 900, specifically the general dust limit for respirable dust. The illuminated areas change colour from yellow to red when the dust concentration exceeds the general dust limit value of 1250 µg/m^3. The threshold for changing from green to yellow can be configured via the app; the default setting is 10% of the dust limit value.

The Dustlight has a display that shows the currently measured value and the average layer value. In addition, the measured dust concentration is stored on the device so that the progression over time can also be shown on the display. The Dustlight also features the modular Klick-Fast mounting system. This allows the device to be attached to various fastening modules, such as a belt clip, a chest strap, a wristband with a Velcro fastener or a patch on work clothing.

Measurements with the Dustlight are indicative measurements; they cannot be used as proof of compliance with occupational exposure limits. In terms of prevention, the Dustlight warns users if the dust concentration in the ambient air rises unnoticed to a critical level.

In terms of measurement technology it can be used to continuously monitor the effectiveness of protective measures. By observing the temporal progression of the dust concentration, qualitative statements about the release behaviour of various work processes or the localisation of dust sources are also conceivable applications.

The Dustlight can be connected to our free app via Bluetooth. The app can be used to clearly display and analyse the data stored on the device.

Model	Dustlight Mini	
Case	Housing in ABS with protective layer in TPU	
Sensor Type	Photometric (laser-based)	
Measurement range	Concentration: 0 - 10 000 µg/m³ Resolution: 1 µg/m³ Particle sizes: 0.3-10 µm	
Operation	Modular Click Fast fastening system on the back of the device for attachment to belt clip, Velcro fastener/patches on clothing, carrying strap.	
Temperature	-20°C to 50°C (storage - 20 to + 40 °C)	
Humidity	0 - 80 % RH, non-condensing	
Dimensions	69mm x 69mm x 32.5mm	
Weight	149g	
Alert Display	LED display with good visibility, LCD colour display, acoustic signal, app notifications	
Accuracy PM1 and PM2.5 *	0-100 µg/m³:	± 5 µg/m³ AND ± 5 %
	100-5,000 µg/m³:	± 10 %
Accuracy Respirable dust and the PM10 fraction of inhalable dust *	0-100 µg/m³:	± 25 µg/m³
	100-5,000 µg/m³:	± 25 %
Measuring interval	Depending on the selected mode from every second to e very 60 seconds, after start 30s until the first stable meas ured value	
Limit values	General respirable dust limit from TRGS 900 for red warning light (limit at 1250 µg/m³), yellow light at 10% of this limit. Dust limits can be configured via free Dustlight app.	
Battery/Runtime	Lithium-ion battery, 1700 mAh, runtime depends on operating mode and usage: Continuous: up to 7 hours Standard: up to 20 hours Eco: up to 40 hours	

*The sensor accuracy was determined by an external institute using the "Grimm Model 11-D" *measuring device and* "Arizona A1" test dust. Test report available on request.

Dustlight

More information:
latest@senkoeurope.com
+44 191 829 9930