


## Technical Information

<b>Power supply</b>	5,8A/h - 3,6 V type "C" lithium internal battery
<b>Battery life (*)</b>	Up to 5years (samples every 60 minutes and radio signal quality at least sufficient)
<b>Measures acquired (3 input channels)</b>	<ul style="list-style-type: none"> <li>• Horizontal axis rotation, parallel to surface</li> <li>• Outdoor temperature</li> </ul>
<b>Sampling interval (*)</b>	Selectable from one minute to 24 hours (60 minutes default)
<b>Datalogger capacity</b>	64,000 samples (for each channel)
<b>Working temperature</b>	<ul style="list-style-type: none"> <li>• Operative: -30°C ÷ +60°C</li> <li>• Warehousing: -40°C ÷ +70°C</li> </ul>
<b>Radio frequency</b>	ISM 868MHz
<b>Radio coverage</b> 	Up to 6Km in line of sight (can be extended using <a href="#">WR12</a> battery powered routers)
<b>Sealing</b>	<ul style="list-style-type: none"> <li>• Datalogger: IP65</li> <li>• Transducers: IP68</li> </ul>
<b>Dimensions</b>	<ul style="list-style-type: none"> <li>• Datalogger: 90x160x50mm</li> <li>• Transducers: 140x55x32mm (with 116mm fixing pace and ±4° gross correction)</li> </ul>
<b>Weight</b>	<ul style="list-style-type: none"> <li>• Datalogger: 325g</li> <li>• Transducers: 440g</li> </ul>
<b>Case material</b>	<ul style="list-style-type: none"> <li>• Datalogger: ABS</li> <li>• Transducers: Galvanized iron bracket covered with polybutadiene resin</li> </ul>
<b>Mounting</b>	<ul style="list-style-type: none"> <li>• Datalogger: Fix on 4 points</li> <li>• Transducers: Fix on 2 points with ±4° gross correction</li> </ul>
<b>Connections</b>	Wireless, USB, 2m cable lenght for each transducer



### Wireless Smart Datalogger.

The **WSD12T-IIDR** is a **datalogger** provided with vertical mounting transducers with 3 input channels to acquire inclination an temperature, with storage functionality of samples acquired.

The radio module High Reliability (unique 868MHz radio technology. implementing frequency hopping on 11 channels) based on **WINECAP™ LuPo** protocol (Long Range) provides an excellent radio range, low battery consumption and the certainty of data recovery in any situation (black out/ signal obstacles).

With a backup memory onboard may store the last 64,000 samples per channel even if the wireless link is down. Samples can be downloaded using a USB connection.

Using the configuration software the sampling interval may be set and two thresholds per channel can be activated.

May be interfaced with:

- all the **basestations** of [MWDG](#) product line
- all the **basestations** of [MWLI](#) product line

If necessary, radio coverage may be extended up to 16 times using [WR12 routers](#) (battery powered repeaters with battery life up to 7 years) between the datalogger and the **basestation**.

## Inclination

<b>Transducer type</b>	Uniaxial - MEMS technology - 1°÷15° Dual Range Automatic Autoscale
<b>Measure range</b>	±1°/±15°
<b>Measure accuracy</b>	± 0.5% of sample
<b>Measure resolution</b>	0.001° (±1° range) - 0.01° (±15° range)
<b>Mechanical zero adjustment</b>	±4°
<b>Cross-axis sensitivity</b>	4% maximum
<b>Temperature variation sensibility</b>	±0.013%/°C Temperature balance
<b>Shock resistance</b>	20,000g
<b>Measure axis</b>	Abscissa

## Outdoor Temperature

<b>Transducer type</b>	NTC10KΩ
<b>Measure range</b>	-30°C ÷ +60°C
<b>Measure accuracy</b>	<ul style="list-style-type: none"> <li>• ± 0.5°C Range -30°C ÷ 0°C</li> <li>• ± 0.2°C Range 0°C ÷ +60°C</li> </ul>
<b>Measure resolution</b>	0.01°C

\* battery life may be influenced by fieldwork conditions, sampling interval and system configuration. - refer to User Manual.

The features shown may be subject to change without notice.