



TEMPERATURE SENSOR

Smart Buildings

Temperature and humidity data are two of the basic information elements in a smart building solution. The information can be used as the basis for individual invoicing of actual energy consumption for heating, optimizing heating/cooling and also give the property owner a possibility to supervise the humidity to avoid building damages.

Full end-to-end solution

The OY1100 temperature sensor from OnYield is a part of a full end-to-end system with sensor hardware, application and web portal. The application and data are easily integrated into your management system.

Hardware based security

Security is corner stone in IoT, especially for sensors in industrial or commercial solutions. The hardware based security architecture provides secure boot, encrypted firmware and safe key storage, making sure correct data is feed into your business systems without risk of information leakage or fraud. With LoRa networks there is no need to add insecure elements behind the company firewall.

Easy installation

The sensor is easily installed in apartments, attics and basements. The battery lasts for 10 years of maintenance-free operation. The design is made to blend into most environments with the discrete but still distinct design.

Sensor features

The OY1100 measures accurately the temperature and humidity and transmits the information over the LoRaWAN network.

Benefits with our solution

- Full end-to-end solution
- Hardware based security solution
- Accurate measurements of temperature and humidity
- Best in class performance and coverage resulting from world-leading radio competence.
- Simple to use.
- Robust design that works in almost all environments
- More than 10 years of maintenance-free life length.
- Flexible business models

About OnYield

OnYield is a full end-to-end solution provider including studies, design and manufacturing. These solutions cover M2M, IoT, fixed and wireless communication.

TECHNICAL SPECIFICATIONS

OY1100

Measurement accuracy

Temperature	-20 to +60 ± 1 °C
Humidity	0-100% ± 5%

Connectivity

LoRaWAN	
Frequency bands	868 MHz
Provisioning	OTA & personalization

Security

Algorithms	AES-128, HASH
Hardware based	Yes
Features	Secure boot & firmware Data encryption Authentication

Firmware

Secure firmware over the air	Hardware prepared
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Power consumption

Battery life length	> 10 years
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Size & Weight

Size:	65 x 75 x 28 mm
Weight:	58 g

Environmental data, quality and reliability

Operating temperature	-20°C to +65°C
Humidity	0 - 100 %
RoHS compliant	Yes

CERTIFICATIONS

CE, LoRaWAN

