

Wireless Sensor Network Accessories

NI WSN Accessories **NEW!**

- Mounting kits
- Outdoor enclosures
- Power supplies
- Connectivity accessories



Mounting Kits

Product	Description
NI WSN-3280	NI WSN node panel mount bracket with spring-loaded screw-locking mechanism and integrated strain relief
NI WSN-3281	NI WSN node magnetic panel mount bracket with spring-loaded screw-locking mechanism and integrated strain relief
NI WSN-3282	NI WSN DIN-rail-mounting kit for nodes or gateway (includes four screws)
NI WSN-3283	NI WSN panel mount plate for nodes or gateway (recommended for gateway) with four keyholes for mounting to wall in multiple orientations (includes four screws)

Table 1. NI Wireless Sensor Network Mounting Kits

NI wireless sensor network (WSN) mounting kits feature options to panel mount and DIN-rail mount WSN measurement nodes and gateways. The WSN measurement nodes have three built-in keyholes for mounting without the need for additional accessories. You can also use these keyholes to quickly secure the node to the NI WSN-3280 and WSN-3281 panel mount brackets, which attach to the desired surface via screw holes or magnet, respectively. The magnetic panel mount kit provides easy setup and takedown on virtually any metal surface. For high shock and vibration applications, NI recommends a panel mounting configuration rather than DIN-rail.

You can panel mount the NI WSN-9791 Ethernet gateway on its own using two integrated, half-circle screw holes or using the NI WSN-3283 panel mount plate, which provides four keyholes to mount the gateway in multiple orientations.

The NI WSN-3282 DIN-rail mount, which works for both nodes and gateways, connects to any standard 35 mm DIN-rail. The node and gateway feature a four-hole screw pattern to accommodate the DIN-rail mount and WSN-3283 panel mount plate.



Figure 1. From Left to Right: NI WSN-3280 (front), WSN-3281 (rear), WSN-3282, and WSN-3283

Outdoor Enclosures

Product	Description
NI WSN-3291	IP64 outdoor enclosure for NI WSN measurement nodes
NI WSN-3292	Set of replacement I/O glands: two glands, four inserts, two plugs
NI WSN-3293	Additional I/O gland inserts (set of 5)

Table 2. NI Wireless Sensor Network Outdoor Enclosure and Accessories

The NI WSN-3291 is an outdoor, weatherproof enclosure for NI WSN measurement nodes. The enclosure features two I/O glands for routing power or sensor cables and is shipped with four I/O gland inserts and two I/O gland plugs so you can customize the glands for your application. The WSN-3291 offers an IP64 (Ingress Protection) rating to protect NI WSN measurement nodes for long-term, outdoor deployment. The enclosure is also shipped with an external antenna and internal mounting plate featuring a locking mechanism to secure the node inside the enclosure. Mountable using M6 or quarter-inch screws, the enclosure features 82 by 204 mm mounting dimensions.

The NI WSN-3292 is a set of replacement I/O glands that includes the same hardware shipped with the enclosure: two I/O glands, four inserts, and two

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plugs. The NI WSN-3293 contains four additional sizes of I/O gland inserts: 2-, 4-, 6-, and 10-hole inserts and one plug.



Figure 2. NI WSN-3291 Outdoor Enclosure with NI WSN Measurement Node (not included)

Power Supplies

These power supplies deliver external power to the NI WSN gateway or measurement nodes. Requiring a 100 to 240 VAC, 47 to 63 Hz, and 0.4 A input, the desktop power supply provides 12 VDC and up to 1.25 A, delivering up to 15 W to the device. The desktop supply is rated for 0 to 70 °C operating temperatures, and the power connector is a 3.5 mm, two-position MINI-COMBICON connector. You must purchase region-specific power cords for the desktop supply separately.

The PS-5 is a DIN-rail-mountable, 24 VDC power supply that you can use to deliver power to the NI WSN gateway or measurement nodes, but NI recommends it for the gateway. The PS-5 supply delivers up to 5 A of current and is rated for operation from -25 to 60 °C. You can wire two PS-5 supplies in parallel to deliver up to 10 A. NI recommends the PS-5 for industrial installations.



Figure 3. Desktop and PS-5 Power Supplies for NI Wireless Sensor Networks

Connectivity Accessories

NI WSN measurement nodes are shipped with a built-in, two-position MINI-COMBICON power connector and an 18-position, side-entry, screw-terminal I/O connector. The NI WSN-3284 kit contains two extra 18-position screw-terminal connectors and labels for the NI WSN-3202 analog input node, including one top-entry connector and one side-entry connector. (The NI WSN-3285 kit contains one top-entry connector and one side-entry connector, with labels for the NI WSN-3212 thermocouple input node.) You can also obtain four extra two-position power connectors to use with NI WSN Ethernet gateways or measurement nodes.

In addition, NI offers a power connector backshell kit that contains a strain relief attachment for the two-position power connector on the Ethernet gateway and measurement nodes. This attachment clips on the MINI-COMBICON connector and includes a zip tie to hold the power cable in place.



Figure 4. NI Wireless Sensor Network 18-Position Screw-Terminal Connectors and Power Connector Backshell Kit

Wireless Sensor Network Accessories

Ordering Information

NI WSN Starter Kit (Americas).....	781080-01
NI WSN Starter Kit (Europe/Asia).....	781080-11

Ethernet Gateway

NI WSN-9791 (Americas).....	780996-01
NI WSN-9791 (Europe/Asia).....	780996-11

Programmable Measurement Nodes

NI WSN-3202 (Americas).....	780997-02
NI WSN-3202 (Europe/Asia).....	780997-12
NI WSN-3212 (Americas).....	780998-02
NI WSN-3212 (Europe/Asia).....	780998-12

Nonprogrammable Measurement Nodes

NI WSN-3202 (Americas).....	780997-01
NI WSN-3202 (Europe/Asia).....	780997-11
NI WSN-3212 (Americas).....	780998-01
NI WSN-3212 (Europe/Asia).....	780998-11

Power Accessories

Desktop supply.....	780703-01
U.S. power cord.....	763000-01
PS-5 industrial supply.....	778805-90

Mounting Accessories

NI WSN-3280.....	780999-01
NI WSN-3281.....	781073-01
NI WSN-3282.....	781074-01
NI WSN-3283.....	781075-01

Connectivity Accessories

NI WSN-3284.....	781076-01
NI WSN-3285.....	781077-01
Power connectors.....	780702-01
Power connector backshell kit.....	196375-01

Outdoor Enclosure and Accessories

NI WSN-3291.....	780994-01
NI WSN-3292.....	195712-01
NI WSN-3293.....	195738-01

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