

Selecting the proper connector for your power sensor

LadyBug has carefully selected the highest performance connectors for its power sensors. Customers may select one of several connector types. This allows the sensor to be placed directly on the customer DUT reducing uncertainty. Connectors are installed and the VSWR verified at the beginning of the manufacturing process. Field replacement is not recommended and voids the warranty because it could degrade the VSWR and calibration.

Connector compatibility

We have carefully chosen small form connector types to provide the best service for customers. Our standard and optional small form factor connectors are 3.5mm, SMA and 2.92mm. All three types are rated for mating with each other and match performance is similar to the lesser connector, and in some cases actually exceeds it.

Our SMA connectors are high performance *Super SMA* connectors. These connectors have a long lifetime with a connects/disconnects rating similar to that of 3.5 mm connectors.

Read more about connector quality and compatibility here:

[SMA / 3.5 mm / 2.92 mm Connector Intermateability](#)

Available connectors

Generally, in the RF & microwave test instrument industry, a source will be fitted with a female connector and a sensor will be fitted with a male connector. Our standard connectors and recommendations for general use follow this guideline and are detailed in Table 1.

Sensor Maximum Frequency	Standard / Recommended Connector	Notes
18.6 GHz	Type-N male	
26.5 GHz	3.5 mm male	Compatible with SMA
40 GHz	2.92 mm male	Compatible with 3.5 mm & SMA

Table 1 Standard Recommended Connectors

Power sensors users may need a different connector for various reasons, for example, a user that intends to attach a cable to the sensor might prefer a female connector.

Sensor Maximum Frequency	Available Optional Connector	Notes
18.6 GHz	3.5 mm male, SMA male, SMA female, Type-N female	
26.5 GHz	3.5 mm male, SMA male, SMA female	

Table 2 Optional Connectors

Standard and Optional Connectors

LadyBug utilizes the highest quality connectors available. Our connectors are rated for thousands of connects & disconnects.

Available connectors by sensor model

Table 3 below indicates the standard connector for each sensor and the available optional connector and its ordering code.

Sensor	Standard Connector	Available Connectors
LB5908A, LB5908L, LB5912A, LB5918A, LB5918L	Type-N male	Type-N female, SMA male & female, 3.5mm male
LB5926A, LB5926L	3.5mm male	SMA male & female
LB5940A, LB5940L	2.92 male	N/A
LB478A, LB479A, LB480A	No Standard	Type-N male & female, SMA male & female, 3.5mm male
LB680A*	No Standard	Type-N male & female, SMA male & female, 3.5mm male
*If ordered with Type-N, frequency is limited to 18.6 GHz, others 20 GHz.		