

General Specifications

Specifications

The specifications in [Table 3-1](#) are performance standards or limits against which the noise source may be tested. These specifications for the noise source when used with a Noise Figure Analyzer are ONLY valid if the analyzer has been allowed to meet its specified warm up time of 60 minutes.

ENR expanded uncertainty analysis and supplemental characteristics are not specifications but are typical characteristics included as additional information.

Table 3-1 346A/B/C specifications

Specification	346A	346B	346C
Frequency range	10 MHz to 18 GHz	10 MHz to 18 GHz	10 MHz to 26.5 GHz
Operating temperature	0 °C to 55 °C	0 °C to 55 °C	0 °C to 55 °C
Excess Noise Ratio (ENR) range ^[a]	4.5 to 6.5 dB	14 to 16 dB	12 to 17 dB
Maximum Standing Wave Ratio (SWR) [for source ON/OFF states]	<1.3:1 (0.01 to 0.03 GHz) <1.15:1 (0.03 to 5.0 GHz) <1.25:1 (5.0 to 18.0 GHz)	<1.3:1 (0.01 to 0.03 GHz) <1.15:1 (0.03 to 5.0 GHz) <1.25:1 (5.0 to 18.0 GHz)	<1.25:1 (0.01 to 18.0 GHz) <1.35:1 (18.0 to 26.5 GHz)
Reflection Coefficient (Rho) (r) [for source ON/OFF states] ^[b]	0.13 (0.01 to 0.03 GHz) 0.07 (0.03 to 5.0 GHz) 0.11 (5.0 to 18.0 GHz)	0.13 (0.01 to 0.03 GHz) 0.07 (0.03 to 5.0 GHz) 0.11 (5.0 to 18.0 GHz)	0.11 (0.01 to 18.0 GHz) 0.15 (18.0 to 26.5 GHz)
Impedance	50 Ω nominal	50 Ω nominal	50 Ω nominal
Maximum reverse power	1 watt	1 watt	1 watt
Power required	28 \pm 1 V (60 mA peak, 30 mA average for source ON)	28 \pm 1 V (60 mA peak, 30 mA average for source ON)	28 \pm 1 V (45 mA)
Connectors ^[c]	Output: APC-3.5 (male) standard ^[d] Input: Bias: BNC (f)	Output: APC-3.5 (male) standard ^[d] Input: Bias: BNC (f)	Output: APC-3.5 (male) standard ^[d] Input: Bias: BNC (f)