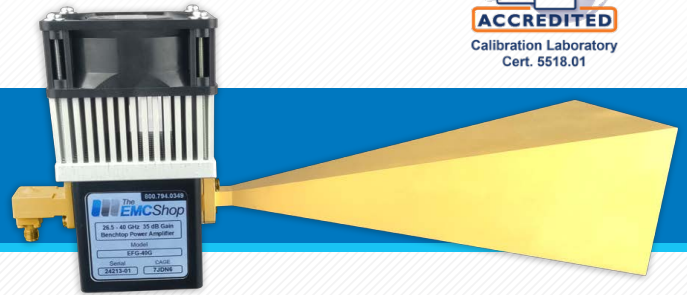


MODEL NUMBER:
EFG-40G

Versatile High-Frequency Field Generation Kit by The EMC Shop



Elevate your high-frequency research and experimentation with the EFG-40G. This advanced kit redefines the possibilities for precision field generation, designed to cater to a wide range of high-frequency applications where low-level, high-frequency fields are essential.

KEY FEATURES:

- **Technical Excellence:** With a gain of 35 dB, the EFG-40G is a solid-state, air-cooled, broadband field generating system that functions as a versatile preamplifier, adaptable for high-frequency field generation.
- **Wide Frequency Range:** Covering the 26.5 GHz to 40 GHz spectrum, it meets the demands of diverse applications with ease.
- **Power and Precision:** Achieve a nominal P1dB of +26 dBm and a Psat of +27 dBm, ensuring precise and reliable field strength control.
- **Adaptable to Your Needs:** The EFG-40G's adaptability extends to various antennae and waveguides, allowing you to customize your field generation setup for your specific requirements.
- **Built for Precision:** Benefit from an input and output return loss of 10 dB, maintaining signal integrity and minimizing loss.
- **Flexibility in Power Supply:** Operate the EFG-40G efficiently with a power supply ranging from 100 VAC to 240 VAC.
- **Tripod-Mountable:** Included is a tripod-mountable amplifier/antenna field generating unit, providing ease of setup and positioning.
- **Over-Temperature Protection:** The EFG-40G is designed with forced-air cooling, ensuring reliable performance even under challenging conditions.

CUSTOMIZED FIELD GENERATION:

The EFG-40G's adaptability extends to its compatibility with various antennae and waveguides, empowering you to tailor your field generation kit precisely to your project's unique needs. Whether you require a specific horn antenna or waveguide, the EFG-40G is your dependable partner in precision field generation.

SPECIFICATIONS

Function	High-Frequency Field Generation Kit
Frequency Range	26.5 GHz to 40 GHz
Gain	35 dB
P1dB	+26 dBm
Psat	+27 dBm
Max Pin	+15 dBm
Input Return Loss	10 dB
Output Return Loss	10 dB
Power Supply	100 VAC - 240 VAC
RF Port	WR-28 Waveguide
Additional Components	Horn Antenna, Waveguide Adapter
Mounting	1/4-20 Thread Camera-Style Mount
Customization Options	Compatible with Various Antennae and Waveguides
Applications	Electromagnetic Field Generation, Research and Development, Laboratory Testing



EXTERNAL SIGNAL GENERATOR COMPATIBILITY:

When used with an external signal generator, the EFG-40G delivers a minimum of 20 V/m or 50 V/m field strength at a distance of 1 meter. This feature enhances versatility and compatibility with existing equipment.

EXTERNAL SIGNAL GENERATOR COMPATIBILITY:

For seamless operation, the AA1000 is recommended for providing DC power, RF signal routing, and fault detection to the EFG-40G, ensuring a reliable and well-integrated field generation system.

In an era of technical excellence and adaptability, the EFG-40G redefines the possibilities for high-frequency field generation. Don't miss out on the future of field generation. Discover the EFG-40G by The EMC Shop and stay at the forefront of high-frequency research and development.

THESE APPLICATIONS HIGHLIGHT THE VERSATILITY AND SIGNIFICANCE OF THE EFG-40G IN VARIOUS TECHNICAL AND RESEARCH-ORIENTED FIELDS.

• **EMC Radiated Susceptibility Testing:** The EFG-40G is suitable for generating precise electromagnetic fields needed in EMC (Electromagnetic Compatibility) radiated susceptibility testing. It ensures that electronic devices can operate without interference from electromagnetic radiation.

Radar Systems Development: Radar systems often require high-frequency field generators for testing and development. The EFG-40G's frequency range and precision make it valuable in radar system research and testing.

Communications Testing: High-frequency field generation is crucial in testing and evaluating communication equipment, ensuring signal integrity and reliability.

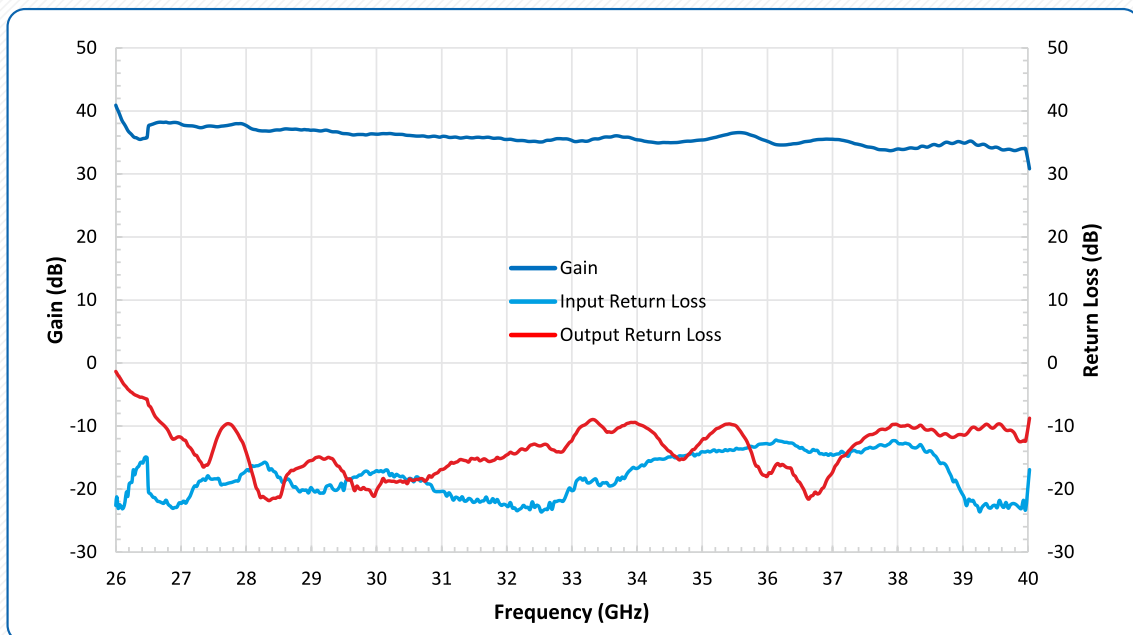
TWT (Traveling Wave Tube) Replacements: The EFG-40G can serve as a modern, solid-state alternative to traditional TWTs, offering improved reliability and performance for various applications.

Laboratory Research and Development: Researchers and engineers in various fields can utilize the EFG-40G for precise field generation in laboratory experiments, helping advance technology and innovation.

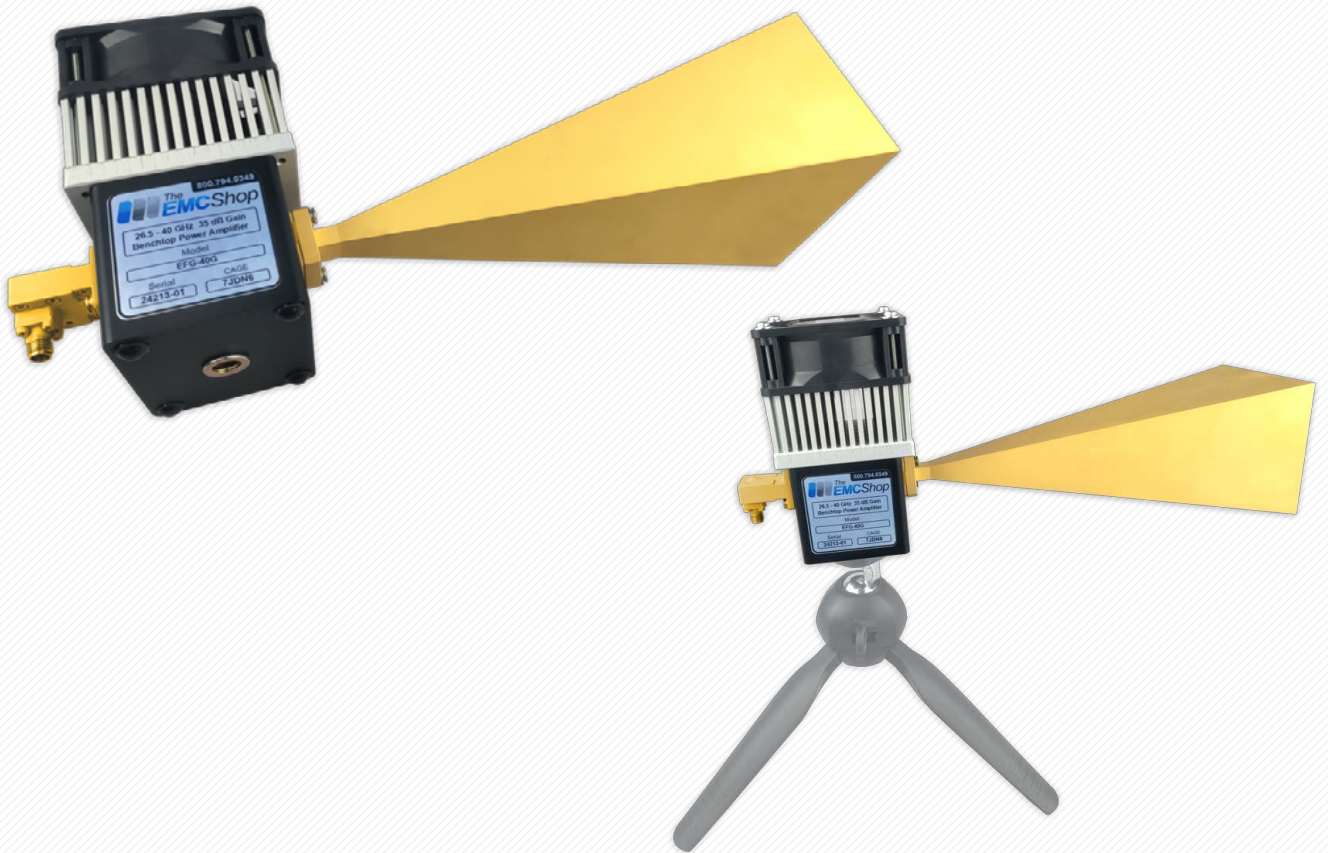
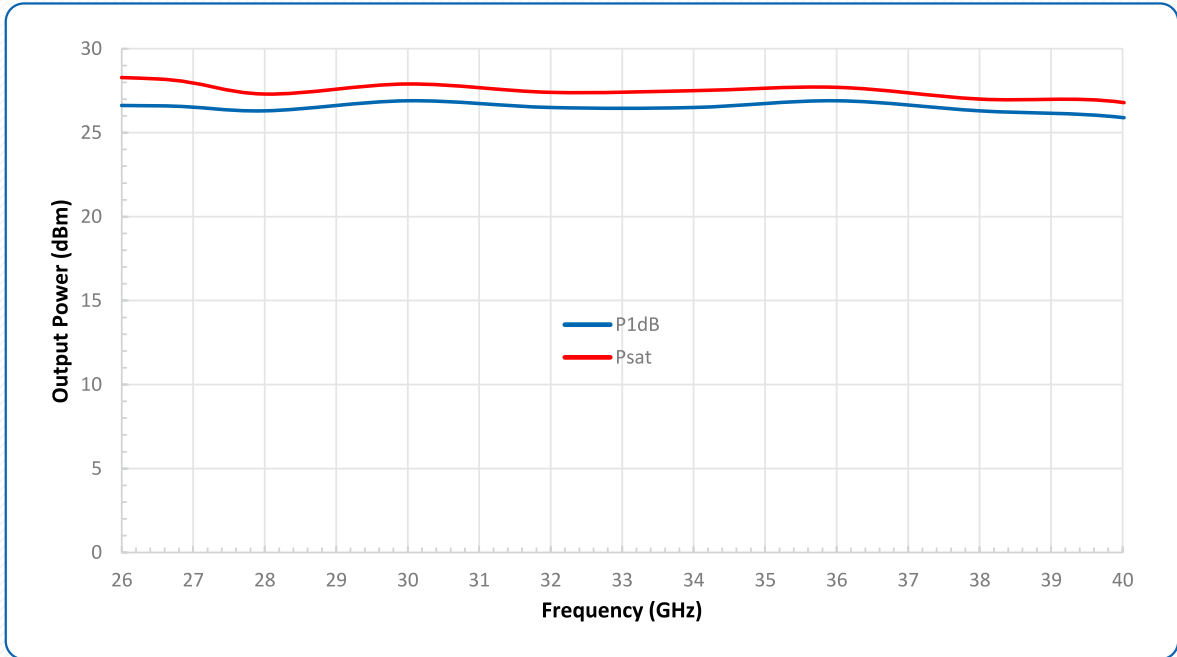
Pre-Compliance EMC Testing: As a versatile field generator, the EFG-40G aids in pre-compliance EMC testing, allowing manufacturers to identify and resolve electromagnetic interference issues before formal compliance testing.

High-Frequency Signal Amplification: The EFG-40G, functioning as a preamplifier, can be used to amplify high-frequency signals in a controlled and reliable manner for research purposes.

TYPICAL GAIN AND RETURN LOSS VS. FREQUENCY



TYPICAL OUTPUT P_{1dB} AND P_{SAT} VS. FREQUENCY



 The
EMCShop



WWW.THEEMCSHOP.COM



SALES@THEEMCSHOP.COM



844.423.7435