

144/430 MHz, Gooseneck Antenna, SMA Male Connector

FMANOM1148



Features

- 144/430 MHz Operating Frequency
- Flexible Gooseneck
- SMA Male Connector
- 1.5:1 VSWR
- 10 Watt Max Input Power
- Typical 3 dBi Gain

Applications

- Unmanned Vehicles
- Manpack Radio Systems
- Secure Communications
- Surveillance Systems
- Mobile Systems

Description

The FMANOM1148 from Fairview Microwave is an omnidirectional gooseneck antenna that features a flexible gooseneck mounting base. This flexible antenna can be bent and repositioned at any angle, allowing users to optimize signal reception and transmission in any environment. Our dual-band gooseneck antenna with vertical polarization can operate at frequencies ranging from 144 to 430 MHz.

Fairview Microwave's FMANOM1148 gooseneck antenna has an impedance of 50 Ohms and a maximum input power of 10 Watts. This omnidirectional antenna is designed to withstand temperatures ranging from -40 to 80 degrees C. Our vertical polarized antenna has an overall length of 12.4 inches, a width of 1.5 inches, and a weight of 0.33 lbs. This gooseneck antenna is lightweight and compact, making it easy to transport and deploy in the field.

This vertically polarized antenna has a maximum input VSWR of 1.5:1. Our dual-band gooseneck antenna with an SMA male connector has a band 1 gain of 3.5 dBi and a band 2 gain of 5.5 dBi. This FMANOM1148 antenna comes with a black TPE radome that offers a protective covering without compromising the antenna system's performance.

Configuration

Design	Gooseneck
Band Type	Dual
Radiation Pattern	Omni Directional
Polarization	Vertical
Connector Type	SMA Male

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	144		430	MHz
Input VSWR			1.5:1	
Impedance		50		Ohms
Input Power			10	Watts

Specifications by Band

Description	Band 1	Band 2	Band 3	Band 4	Band 5	Units
Center Frequency	144	430				MHz
Gain	3.5	5.5				dBi

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Mechanical Specifications

Radome Material	TPE
Size	
Length	13 in [330.2 mm]
Width	1.5 in [38.1 mm]
Height	1.5 in [38.1 mm]
Weight	0.5 lbs [226.8 g]

Environmental Specifications

Temperature	
Operating Range	-40 to +80 deg C

Compliance Certifications (see [product page](#) for current document)

Plotted and Other Data

Notes:

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Typical Radiation Pattern

Appendix

Electrical Downtilt: Angle in the antenna's elevation pattern in which the maximum gain occurs.

Gain: Antenna's average gain.

Front to Back Ratio @ 180°±30°: Average difference between the antenna's maximum gain and the maximum gain in the antenna's back lobe over ±30° angles.

Cross-polarization Ratio (dB): Typical difference between the co-polarization and cross-polarization gain across the sector's 3 dB Beam Width.

Dedicated to serving the needs of the Wireless Internet Service Provider (WISP) market, KP Performance Antennas offers purpose built products that reliably perform in the field. KP Performance Antennas product line consists of Yagi, Grid, Omni, Dish and other style antennas that operate in the 900 MHz, 2.4 GHz, 3 GHz, and 5 GHz frequencies.

144/430 MHz, Gooseneck Antenna, SMA Male Connector from Fairview Microwave is in-stock and available to ship same-day. All of our RF/microwave products are available off-the-shelf from our ISO 9001:2008 certified facilities in Lewisville, Texas. Fairview Microwave is RF on-demand.

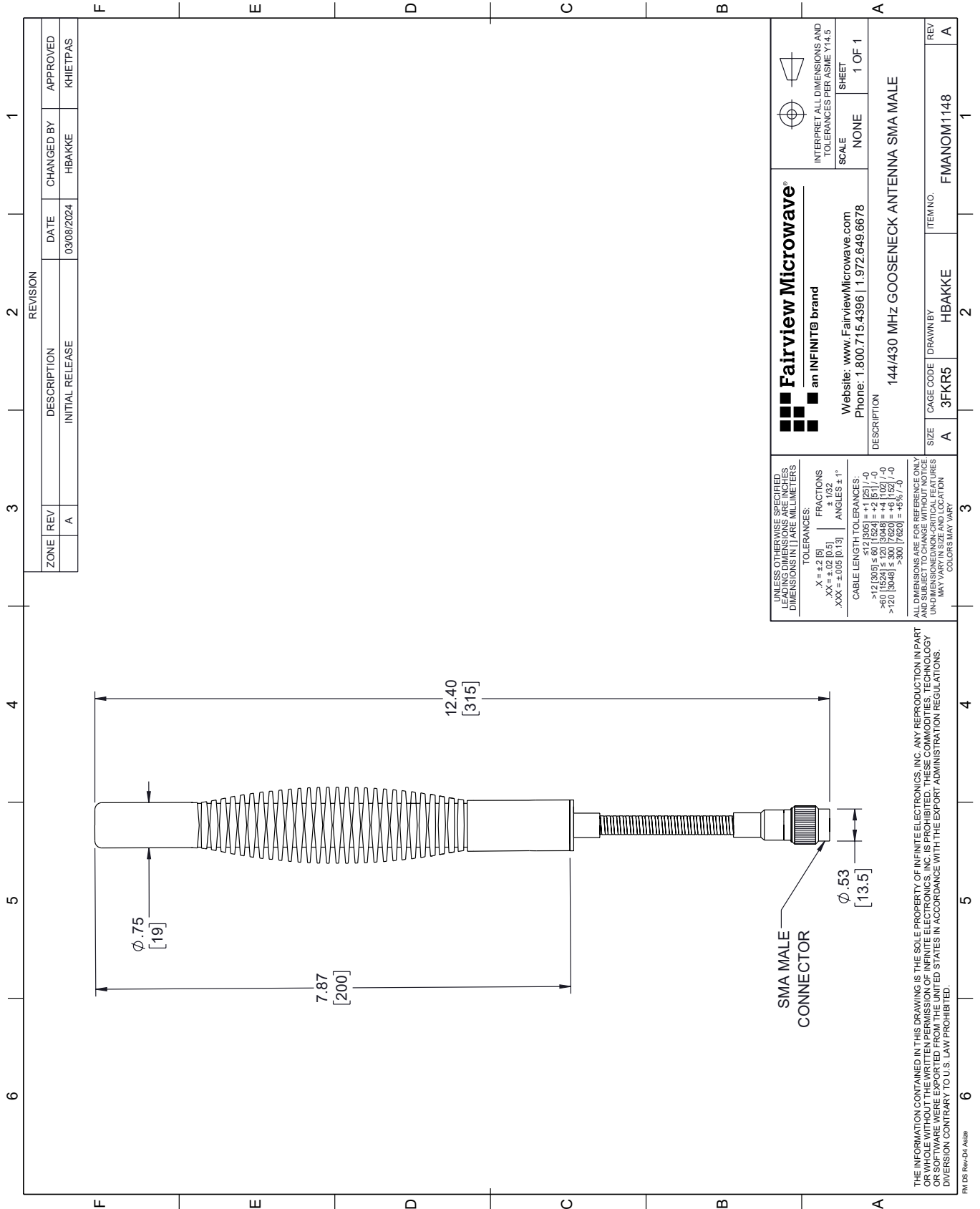
For additional information on this product, please click the following link: [144/430 MHz, Gooseneck Antenna, SMA Male Connector FMANOM1148](#)

URL: <https://www.fairviewmicrowave.com/dualband-gooseneck-antenna-144-430-mhz-sma-connector-fmanom1148-p.aspx>

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FMANOM1148 CAD Drawing

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ZONE		REV	DESCRIPTION	DATE	CHANGED BY	APPROVED
		A	INITIAL RELEASE	03/08/2024	HBAKKE	KHETTPAS

REVISION	
DESCRIPTION	DATE
INITIAL RELEASE	03/08/2024

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UNLESS OTHERWISE SPECIFIED, LEADING DIMENSIONS ARE IN INCHES AND UNLEADING DIMENSIONS ARE IN MILLIMETERS.

TOLERANCES:
 .X = ±.2 [5] FRACTIONS ± 1/32
 .XX = ±.02 [0.5] ANGLES ± 1°
 .XXX = ±.005 [0.13]

CABLE LENGTH TOLERANCES:
 <12 [305] ≤ 60 [1524] = ±1 [25] / -0
 >60 [1524] ≤ 120 [3048] = ±4 [102] / -0
 >120 [3048] ≤ 300 [7620] = ±5% / -0

ALL DIMENSIONS ARE FOR REFERENCE ONLY. UNLESS OTHERWISE SPECIFIED, DIMENSIONS MAY VARY IN SIZE AND LOCATION. COLORS MAY VARY.

INTERPRET ALL DIMENSIONS AND TOLERANCES PER ASME Y14.5

SCALE: NONE
SHEET: 1 OF 1

DESCRIPTION: 144/430 MHz GOOSENECK ANTENNA SMA MALE

SIZE	A	CAGE CODE	3FKR5	DRAWN BY	HBAKKE	ITEM NO.	FMANOM1148
REV	A						

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