PASTERNACK
an INFINITE brand

Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector



Antenna Kits Technical Data Sheet PEANKIT1003

Features

- 900 MHz to 928 MHz
- Increased Proof-of-Coverage
- N-Male to RP-SMA Male Low loss CA-400 series coax cable (LMR-400 equivalent)
- Lightweight fiberglass radome
- Integral lightning surge protector with multi-strike capability and replaceable gas tube
- Extruded aluminum mounting bracket
- COAX-SEAL® Hand Moldable Weatherproofing Tape

Applications

- Helium Network (HNT) Mining
- 900 MHz ISM band
- US915, AU915, AS923, KR920
- M2M, LPWAN, LoRA, LoRaWAN, IoT, LongFi
- Industrial & Environmental Monitoring
- Smart Metering Applications
- Inventory Tracking
- Non Line of Sight (NLOS)

Description

The PEANKIT1003 Helium Hotspot Antenna Upgrade kit from Pasternack was designed with the serious Helium HNT Miner in mind. PEANKIT1003 provides your LongFi radio with the proper components to get the most out of your hotspot with optimized range and increased Proof-of-Coverage over OEM components.
The PEANKIT1003 achieves enhanced performance by utilizing Pasternack's 900 MHz lightweight, low-profile, high-performance Omni-directional antennas designed for the 900 MHz ISM band. These LoRa, LoRaWAN antennas feature all-weather UV-stable fiberglass radome for durability and aesthetics. The PEANKIT1003 comes with a 3 dBi Omni Antenna that operates from 900 MHz to 928 MHz frequency range.
Combined with our Low Loss 400 series cable with integrated Lightning Protector, the 400 cable features equal performance and mechanical characteristics to cables from CommScope®, Times Microwave Systems®, Belden® and Andrew®. This 20 ft Low Loss cable comes terminated with an N Male in-line gas discharge tube suppressor, to the antenna, and an RP-SMA Male connector compatible with the leading Hotspot miners on the market. The PEANKIT1003 from Pasternack brings industry proven components direct to the Helium enthusiast, ship worldwide the same day as with our other available RF parts.

Configuration

Design	Omni
Band Type	Single
Radiation Pattern	Omni Directional
Polarization	Vertical
Cable Type	400 Series
Cable Length	240 in [609.6 cm]
Connector Type	N Female
Number of Ports	1
Lightning Protection	Lightning Protector

Electrical Specifications

Description	Minimum	Typical	Maximum	Units
Frequency Range	900		928	MHz
Input VSWR		1.6:1		
Impedance		50		Ohms
Gain		3		dBi
Horizontal (Azimuth) Beam Width		Omnidirectional		

Click the following link (or enter part number in "SEARCH" on website) to obtain additional part information including price, inventory and certifications: Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector PEANKIT1003

Pasternack Enterprises, Inc. • P.O. Box 16759, Irvine, CA 92623
Phone: (866) 727-8376 or (949) 261-1920 • **Fax:** (949) 261-7451
Sales@Pasternack.com • Techsupport@Pasternack.com

© 2020 Pasternack Enterprises All Rights Reserved

PASTERNACK
an INFINITE brand

Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector



Antenna Kits Technical Data Sheet PEANKIT1003

Vertical (Elevation) Beam Width	44		Degrees
Input Power		50	Watts

Cable Assembly

Cable Type	400 Series
Impedance	50 Ohms
Connector 1	N Male
Connector 2	SMA Plug Reverse Polarity

Mechanical Specifications

Radome Material	Fiberglass

Size

Overall Length	21 in [533.4 mm]
Width	10 in [254 mm]
Height	3 in [76.2 mm]
Mounting Mast Diameter	2 in [50.80 mm]
Weight	4 lbs [1.81 kg]

Environmental Specifications

Temperature

Operating Range	-40 to +60 deg C
Wind Loading	130 MPH [209.21 KPH]

Compliance Certifications (see product page for current document)

Plotted and Other Data

Notes:

Click the following link (or enter part number in “SEARCH” on website) to obtain additional part information including price, inventory and certifications: Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector PEANKIT1003

Pasternack Enterprises, Inc. • P.O. Box 16759, Irvine, CA 92623
Phone: (866) 727-8376 or (949) 261-1920 • **Fax:** (949) 261-7451
Sales@Pasternack.com • Techsupport@Pasternack.com

© 2020 Pasternack Enterprises All Rights Reserved

PASTERNACK
an INFINITE brand

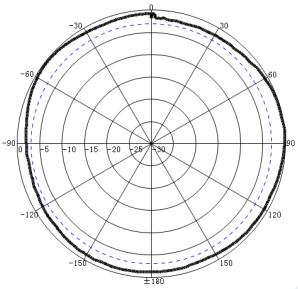
Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector



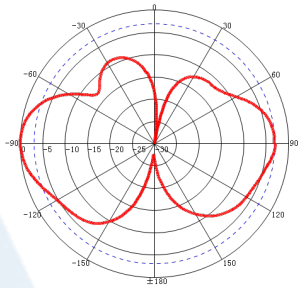
Antenna Kits Technical Data Sheet

PEANKIT1003

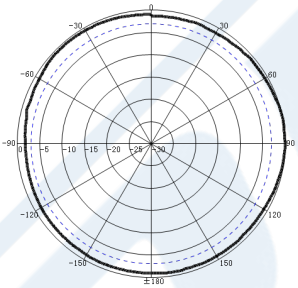
H-Plane: 902MHz



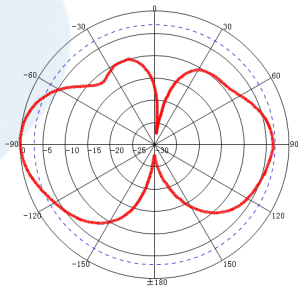
V-Plane: 902MHz



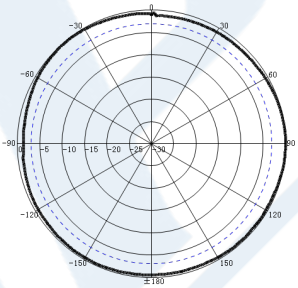
H-Plane: 915MHz



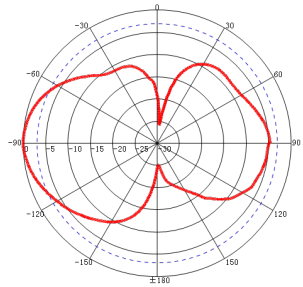
V-Plane: 915MHz



H-Plane: 928MHz



V-Plane: 928MHz



Click the following link (or enter part number in “SEARCH” on website) to obtain additional part information including price, inventory and certifications: Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector PEANKIT1003

Pasternack Enterprises, Inc. • P.O. Box 16759, Irvine, CA 92623
Phone: (866) 727-8376 or (949) 261-1920 • **Fax:** (949) 261-7451
Sales@Pasternack.com • Techsupport@Pasternack.com

© 2020 Pasternack Enterprises All Rights Reserved

PASTERNACK
an INFINITE brand

Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector



Antenna Kits Technical Data Sheet

PEANKIT1003

Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector from Pasternack Enterprises has same day shipment for domestic and International orders. Our RF, microwave and millimeter wave products maintain a 99.4% availability and are part of the broadest selection in the industry.

Click the following link (or enter part number in “SEARCH” on website) to obtain additional part information including price, inventory and certifications: Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector PEANKIT1003

URL: https://www.pasternack.com/antenna-kit-3dbi-900mhz-omni-w-n-male-to-rp-sma-male-20ft-low-loss-400-cable-and-lightning-protector-peankit1003-p.aspx

The information contained in this document is accurate to the best of our knowledge and representative of the part described herein. It may be necessary to make modifications to the part and/or the documentation of the part, in order to implement improvements. Pasternack reserves the right to make such changes as required. Unless otherwise stated, all specifications are nominal. Pasternack does not make any representation or warranty regarding the suitability of the part described herein for any particular purpose, and Pasternack does not assume any liability arising out of the use of any part or documentation.

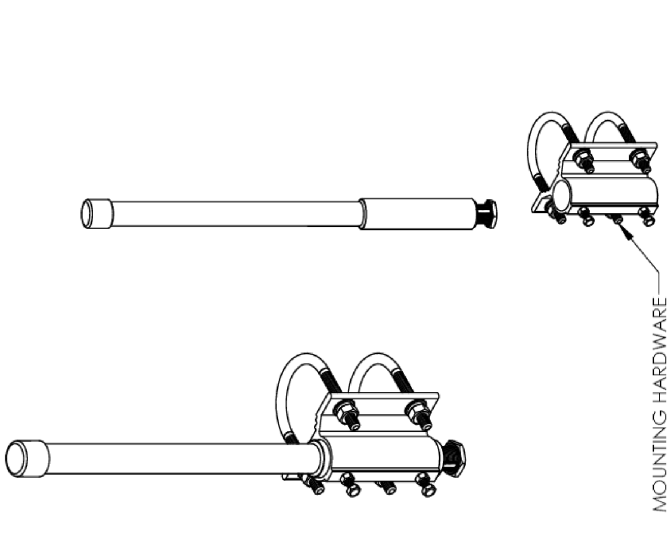
Pasternack Enterprises, Inc. • P.O. Box 16759, Irvine, CA 92623
Phone: (866) 727-8376 or (949) 261-1920 • **Fax:** (949) 261-7451
Sales@Pasternack.com • Techsupport@Pasternack.com

© 2020 Pasternack Enterprises All Rights Reserved

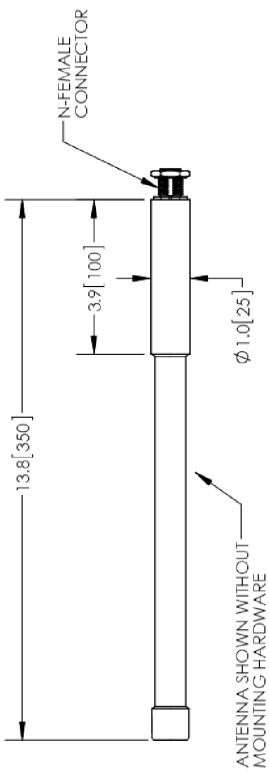
PEANKIT1003 CAD Drawing

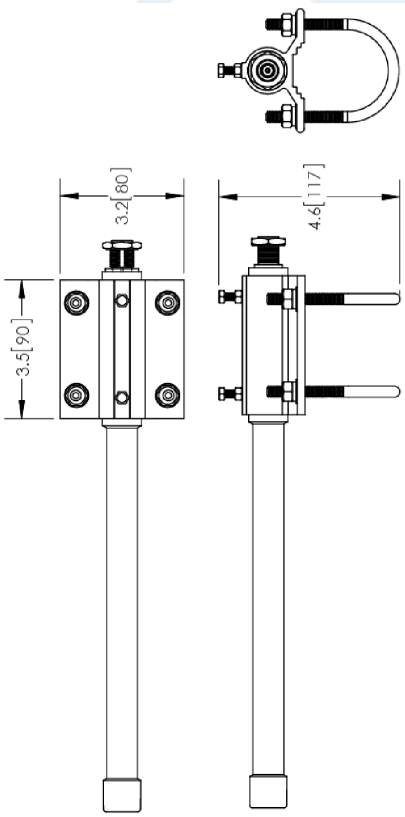
Helium Hotspot Antenna Upgrade Kit, 3dBi 900MHz Omni w/ N Male to RP-SMA Plug, 20ft Low Loss 400 Cable and Lightning Protector

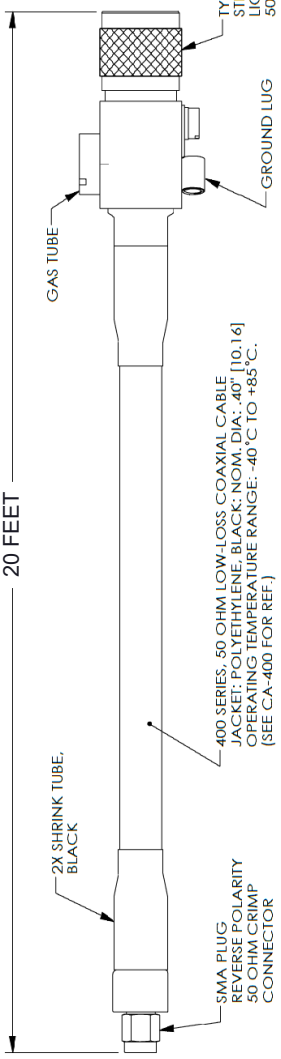
REVISIONS			
REV.	DESCRIPTION	DATE	APPROVED
A	INITIAL RELEASE	4/6/2022	K. HIETPAS











THIRD-ANGLE PROJECTION

THE INFORMATION AND DESIGN IN THIS DOCUMENT IS THE PROPERTY OF PASTERNACK CORPORATION ALL RIGHTS RESERVED.

PASTERNACK® an INFINITE brand

Pasternack Enterprises, Inc.
P.O.Box 16759, Irvine, CA 92623.
Phone: 1.949.261.1920 | 1.866.727.8376
Fax: 1.949.261.7451
Website: www.pasternack.com
E-mail: sales@pasternack.com

SHEET	OF	SCALE	REV
1	1	N/A	A

SIZE	CAGE CODE	DRAWN BY	ITEM NO.
A	53919	K.DANG	PEANKIT1003

UNLESS OTHERWISE SPECIFIED LEADING DIMENSIONS ARE INCHES DIMENSIONS IN [ ] ARE MILLIMETERS

TOLERANCES:

X = ± .2	[5.08]	FRACTIONS	± 1/32
.XX = ± .02	[.51]	ANGLES	± 1°
.XXX = ± .005	[.13]		

CABLE LENGTH (L) TOLERANCES:

L ≤ 12	[305] = +1 [25] / -0
12 [305] < L ≤ 60	[1524] = +2 [51] / -0
60 [1524] < L ≤ 120	[3048] = +4 [102] / -0
120 [3048] < L ≤ 300	[7620] = +6 [152] / -0
300 [7620] < L	= +5%L / -0

ALL DIMENSIONS SHOWN ARE FOR REFERENCE ONLY.

THESE COMMODITIES, TECHNOLOGY OR SOFTWARE WERE EXPORTED FROM THE UNITED STATES IN ACCORDANCE WITH THE EXPORT ADMINISTRATION REGULATIONS. DIVERSION CONTRARY TO U.S. LAW PROHIBITED.

T-Rev.D

© 2020 Pasternack Enterprises All Rights Reserved