



CEL-FI CONNECT C41

Self-Install Smart Signal Repeater

DATA SHEET (Rev B)

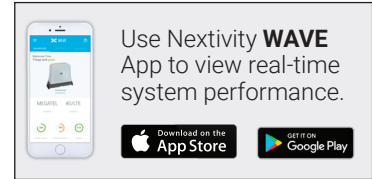
KIT NUMBERS:
C41-9B-00C
C41-JB-00C
C41-KB-00C



The Cel-Fi CONNECT C41 solves the problem of poor cellular coverage by making it easy for businesses and homeowners to improve their 3G, 4G, or 5G in-building reception. Combining plug-and-play operation with industry-leading performance, CONNECT C41 is designed to be set up and boost cellular signal within minutes. In addition to delivering signal gain up to 100 dB, the system is network safe, operator approved, and supports 5G NR operation.

Key Features

- Deploy the unit anywhere in the network, with full frequency coverage
- Latest 4th generation Nextivity proprietary IntelliBoost chip delivers channelized coverage for specific mobile network operators signals
- Up to 2,100 ft² (200 m²) coverage area
- Support for 3G, 4G, 5G and dynamic spectrum sharing (DSS)
- Ease of installation with plug-and-play operation



SPECIFICATIONS	
Frequency Bands	1/3/5/7/8/20/28L/40
Relay Channel Bandwidths	5/10/15/20 MHz
Networks	3G/4G/5G
Network Protocols	WCDMA/LTE/NR
Network Selection	Automatically best available. (WAVE App for manual setting)
Duplex Modes	FDD & TDD
# of Relay Bands	2
Relay Bandwidth	20 + 20 MHz max.
Output Downlink Power (All Bands)	0 dBm max.
Output Uplink Power (Bands 1/3/5/7/40)	22 dBm max.
Output Uplink Power (Bands 8/20/28L)	20 dBm max.
System Gain	100 dB max.
Coverage Area	2100 ft ² (200 m ²) typ.
Enterprise-Grade Echo Cancellation	30 dB min.
Noise Figure	7 dB max.

FREQUENCY BANDS	BANDS		MAX. RELAY BW (MHZ)
	DOWNLINK (MHZ)	UPLINK (MHZ)	
1	2110-2170	1920-1980	20
3	1805-1880	1710-1785	
5	869-894	824-849	
7	2620-2690	2500-2570	
8	925-960	880-915	15
20	791-821	832-862	20
28L	758-788	703-733	
40	2300-2390		

INTERFACE	
Donor RF Connector	SMA (f)
Server RF Connector	SMA(f)
DC Input	5.5 x 2.5 mm (f) Barrel
Device Setup	Bluetooth for WAVE APP
Power & System Status	Bi-color LED (Green/Red)
Factory Debug only	USB 2.0 Micro-B
Product Settings & SW Updates	WAVE App for iOS 11.0 or later
	WAVE APP for Android
	WAVE Portal for Desktop

COMPLIANCE	
3GPP	TS 25.143 Rel 13 3GPP TS 36.143 Rel 13
CE	Compliant RED 2014/53/EU. Certificate No. NB01 080937 0029
RoHS3	EN 63000: 2018
OFCOM	VTS 2102
ACMA/RCM	AS/NZS CISPR, 32:2013
Bluetooth	LE Ver 4.2

POWER SUPPLY	
Power Consumption	30 W max.
Power Supply Plug Options	Type C (EU) or Type I (AUS) or Type G (UK)
Power Supply Cable	18 AWG
Power Supply Cable Length	6 ft (3 m)

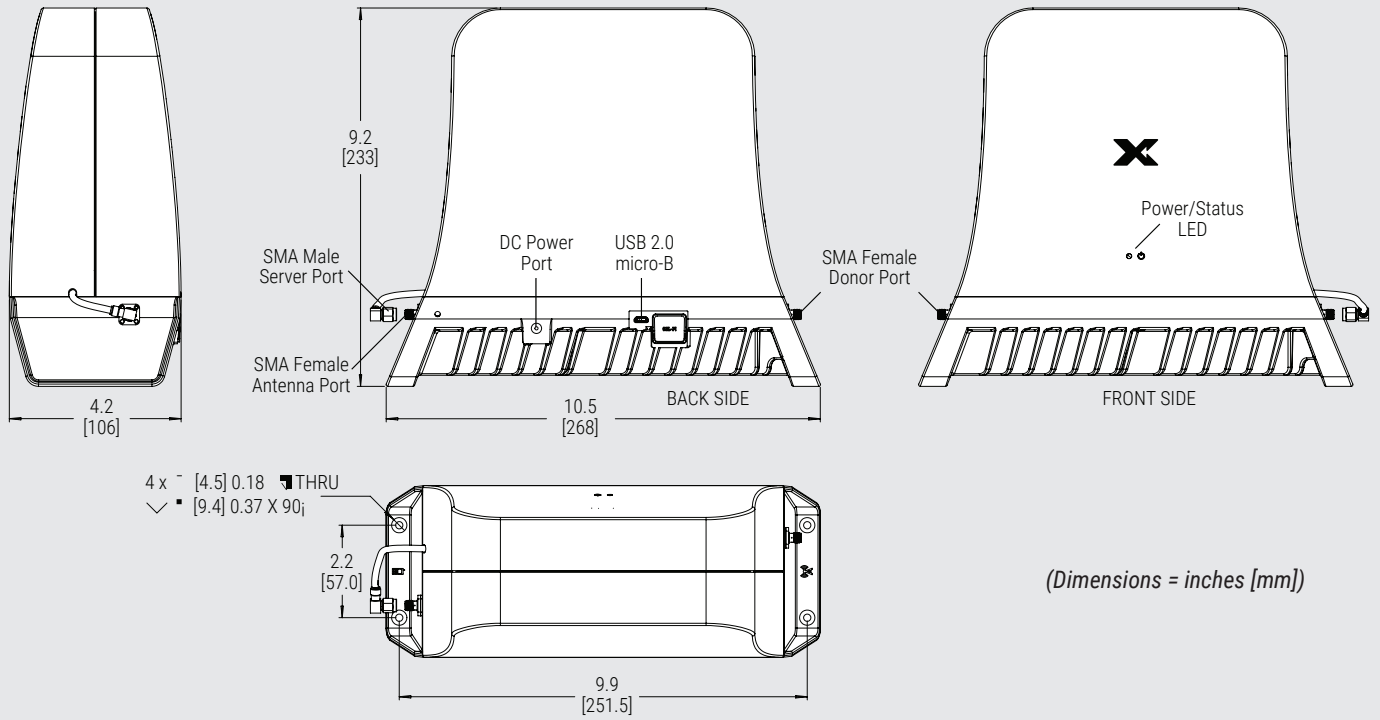
MAIN & DONOR ANTENNA			
Service Bands	600, 700, 800, 850, 900	1700, 1800, 1900, 2000, 2100, 2300, 2500, 2600	3300, 3500, 3600, 3700
Return Loss (dB) Typ.	-9.5		
Gain (dBi) Typ.	5.5	8.0	7.0
Impedance (Ω) Nom.	50		
Polarization	Linear/Vertical		
Radiation Pattern	Directional		
Front to Back Ratio (dB) Min.	9	15	11
Horizontal Beam width (°)	85	65	50
Vertical Beam width	74	60	45
Input Power (W) Max.	50		
Lightning Protection	DC Ground		
Connector	SMA Male		
Antenna Cable	RG58		
Donor Antenna Cable Length (ft (m))	9.8 (3)		
Housing Material	PC/ABS UV Stable		
Housing Color	White (RAL9003)		
Donor Antenna Dimensions (in (mm))	7.4 x 6.9 x 3.0 (187 x 176 x 77)		
Donor Antenna Cable Length (ft (m))	9.8 (3)		
Donor Antenna Weight (lbs. (kg))	1.5 (0.67)		

ENVIRONMENTAL	
Operating Temperature	0 to 40 °C
Storage Temperature	-35 to 70 °C
Heat Dissipation	Passive Convection
Surface Temperature	44 °C max. at ambient
Non-condensing Humidity	0 to 95%
Ingress Protection Rating	IP20 Indoor Only

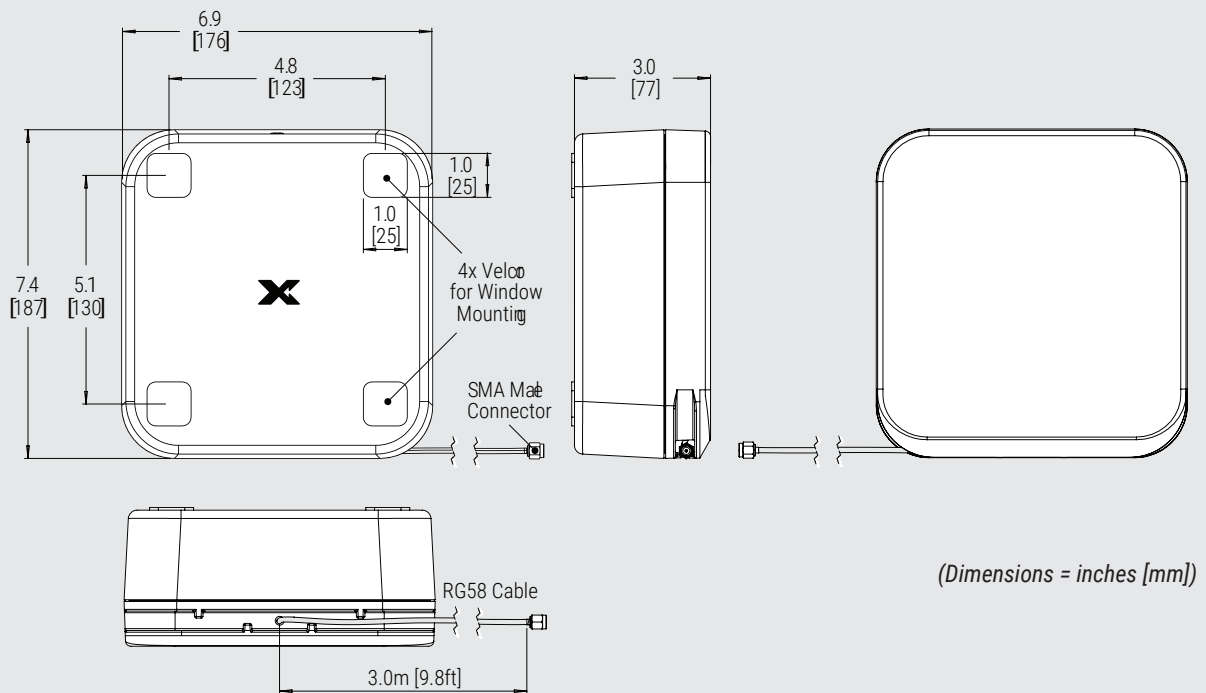
MECHANICAL & PACKAGING	
Box Contents	Main Unit with Integrated Server Antenna
	1x Donor Antenna (A52-FV3-300)
	1x AC/DC Wall Adapter
	4x Mounting Screws
	4x Drywall Anchors
	Quick Installation Guide
Main Unit Dimensions	10.5 x 9.2 x 4.2 in (268 x 233 x 106 mm)
Main Unit Weight	5.1 lbs (2.3 kg)
Kit Shipping Dimensions	11.6 x 11.1 x 9.1 in (295 x 283 x 231 mm)
Kit Shipping Weight	7.1 lbs (3.2 kg)

ORDERING INFORMATION			
KIT#	C41-9B-00C	C41-JB-00C	C41-KB-00C
Regions	EMEA	APAC	EMEA
Frequency Bands	1/3/7/8/20	1/3/5/7/8/28L/40	3/8/20
Dual Relay Bands	1 3 7	1 3	3

CEL-FI CONNECT C41 MAIN UNIT OUTLINE



DONOR ANTENNA OUTLINE



Copyright © 2022 by Nextivity, Inc. U.S. All rights reserved. The Nextivity and Cel-Fi logos are registered trademarks of Nextivity Inc. All other trademarks or registered trademarks listed belong to their respective owners. Designed by Nextivity in California. data_connect-c41_22-1025