



CEL-FI
by NEXTIVITY™

Cel-Fi™ DUO+ Smart Signal Booster™

Improve voice and data coverage for 3G, 4G and LTE



Network Unit

Coverage Unit

Nextivity's third Generation Cel-Fi system adds substantial capability over our previous versions. The Cel-Fi DUO+ is designed to dramatically improve HD voice and data coverage in up to two bands for 3G and 4G, LTE for consumers while significantly improving network.

Good things do come in small packages: With 3G, 4G, LTE support, Cel-Fi is compatible with the highest data services application available. All new patented echo cancellation algorithms enable Cel-Fi to offer even higher signal levels throughout the coverage area than before.



Pure plug and play: no need for external antennas or cables. It auto-configures itself right out of the box.



FCC compliant: Cel-Fi is the only booster approved by the FCC for 100dB gain – that's up to 1,000 times greater gain than analog boosters.



Robust Link: Improved wireless link between the Network Unit and Coverage Unit.



Advanced technology: Cel-Fi system is powered by two proprietary multi-core processors.



Wider coverage: users get up to 15,000 sq. ft. of coverage, making it ideal for large homes and businesses. Multiple Units of Cel-Fi can be deployed in offices and will not interfere with coverage strength.

Wireless-in/wireless-out: radically different from traditional repeaters, Cel-Fi is the only intelligent booster that's wireless-in/wireless-out. The Network Unit receives the signal from the mobile network (it requires as little as one bar of 3G, 4G, LTE signal), and relays it wirelessly to the Coverage Unit that amplifies it for up to 100 dB of gain.

Fast data speed: for indoor areas with poor reception, Cel-Fi offers data speed improvements.

Easy on mobile phone battery: With Cel-Fi, the power required by mobile phones and user devices to reach distant cell tower is drastically reduced, thus providing battery savings and less charging.

Ease of installation: Cel-Fi is a true "Plug and Play" system that doesn't require the installation of external antennas, bulky coaxial cables, handset registration, or a configuration setup by the user. In fact, Cel-Fi intelligently and automatically senses and adapts to its environment – including changes made by your carrier, or to changes caused by nearby equipment like Wi-Fi, or other Cel-Fi devices.

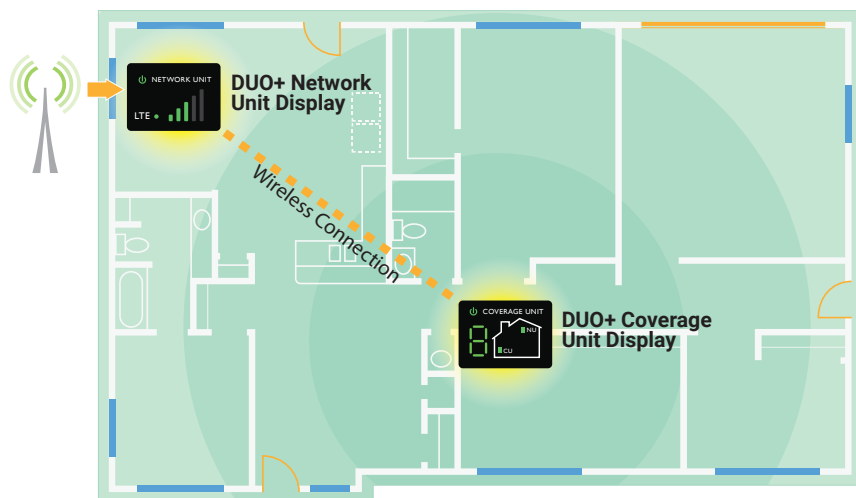
Self adjusting: Cel-Fi's embedded system-on-a-chip technology allows the Cel-Fi DUO+ to automatically evaluate three bands; and boost two, giving you the best available coverage.



Cel-Fi Safe

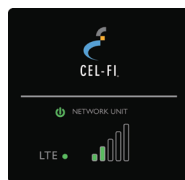
Cel-Fi Features

- Fully wireless, plug-and-play quad-band architecture supporting 3G, 4G, LTE, with up to 100dB of gain in each band simultaneously.
- Patented 2-unit, 3-hop system allows flexible placement for optimal coverage.
- Processor running advanced digital echo cancellation and channel select filtering algorithm.
- Software-based optimization of integrated antenna coverage pattern which maximizes system gain and provides improved coverage and signal quality.
- Automatic Gain Control (AGC) continuously monitors system path loss and transmit power to deliver maximum gain.
- Intuitive LCD User Interface (UI) allows quick and easy installation by end-user.

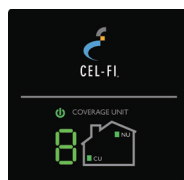


Network-Safe Features

- Securely provisioned operation with ciphered software which only operates on authorized Operator's network.
- Network-Safe software prevents uplink system gain from exceeding path loss, and eliminates unnecessary rise in base station noise level.
- Uplink Muting Mode automatically shuts down uplink cellular transmissions when no active user equipment is detected.
- Embedded software ensures optimal performance and prevents out-of-specification operation.
- Maintains end-to-end cellular communication encryption without additional risk of vulnerability.
- Peaceful coexistence with adjacent Cel-Fi systems, 802.11a/b/g/n.



DUO+ Network Unit Display



DUO+ Coverage Unit Display

Processor

- Nextivity's IntelliBoost Baseband Processor III

High-Level Specifications

- Support for 3GPP LTE Release 10 Features
- 5GHz link compliant with FCC Part 15 and EN 301 893
- Max EIRP for Multiple carriers: 16dBm downlink & 22dBm uplink
- Support for bands 2, 12, and 66 (alternatively band 4).
- Auto-Configuring "All band scanning" feature to self adjust as Network channels change
- Up to 100dB system gain

Specifications

NETWORK UNIT

| | |
|-----------------|----------------------|
| 179MM (7.05") H | 110MM (4.33") D |
| 155MM (6.10") W | Weight: .54kg (19oz) |

COVERAGE UNIT

| | |
|-----------------|----------------------|
| 160MM (6.30") H | 79MM (3.11") D |
| 164MM (6.46") W | Weight: .45kg (16oz) |

ENVIRONMENTAL

- Operating temperature: 0° to 40°C
- Storage temperature: -25° to 60°C
- Relative humidity: 5 to 95%, noncondensing
- Operating altitude: 3,050m
- RoHS (2002/95/EC) six of six compliant
- WEEE (2002/96/EC)
- 3GPP COMPLIANCE

POWER

- 12 VDC via external supply (2 included)
- External supply: 100 to 240 VAC, 47 – 63Hz
- Power consumption less than 15W per unit

CERTIFICATIONS

- FCC Part 27
- FCC Part 24
- FCC Part 20
- FCC Part 15

FCC REQUIREMENTS

This is a **CONSUMER** device.

BEFORE USE, you **MUST REGISTER THIS DEVICE** with your wireless provider and have your provider's consent. Most wireless providers consent to the use of signal boosters. Some providers may not consent to the use of this device on their network. If you are unsure, contact your provider.

You **MUST** operate this device with approved antennas and cables as specified by the manufacturer. Antennas **MUST** be installed at least 20 cm (8 inches) from any person.

You **MUST** cease operating this device immediately if requested by the **FCC** or a licensed wireless service provider.

WARNING: E911 location information may not be provided or may be inaccurate for calls served by using this device.

When used with any mobile device utilizing the 1710-1755 MHz band, the FCC limits booster equipment placement to a maximum of 10 meters above ground level. Installation of this equipment which does not comply with federal requirements may subject the owner to FCC enforcement action.

This device complies with part 15 of the FCC Rules. Operation is subject to the following two conditions: (1) This device may not cause harmful interference, and (2) this device must accept any interference received, including interference that may cause undesired operation.

NOTE: This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and receiver.
- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help

COMPLIANCE CONTACT: In the event of regulatory compliance issue, please contact Nextivity Inc. directly. Contact information is available at www.nextivityinc.com.

PATENTS: This product is covered by Nextivity, Inc., US patents and patents pending. Please refer to Cel-Fi.com for details.

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