

December 6, 2018

Mr. Stuart Beck
Director of Certification
Nemko North America, Inc.

Dear Mr. Tidwell,

There are four minor variants of the CommScope UAP. The differences between these variants are summarized in the table below and described in some detail following the table.

Model Number	Name	Description
UAP	ION-E UAP, 380-2700 MHz	Original remote antenna unit. Four 75MHz BW transceivers, internal antenna
UAP-X	ION-E UAP, EXTERNAL ANTENNA (UAP-X)	Identical to 7642133-01, except an external antenna is used.
UAP-N25	ION-E UAP, 25MHz SAW (UAP-N25)	Identical to 7642133-01, except one of the RX paths uses a 25MHz BW IF SAW filter instead of a 75MHz BW SAW filter.
UAP-XN25	ION-E UAP, EXT ANTENNA, 25 MHz SAW (UAP-XN25)	Identical to 7642133-01, except one of the RX paths uses a 25MHz BW IF SAW filter instead of a 75MHz BW SAW filter, and an external antenna can be used.

ION-E UAP, 380-2700 MHz – This is the original remote antenna unit. It has four transceivers that can be tuned to various mobile communications bands. Each transceiver can provide 75MHz of TX and RX bandwidth. This unit has a built-in, internal antenna.

ION-E UAP, EXTERNAL ANTENNA (UAP-X). The UAP and UAP-X, are identical, except that the UAP-X removes the internal TX/RX antenna and its feed network, and instead provides 50 ohm connections to the same points in the TX and RX chain where the internal antenna feed network connected. The TX/RX circuits are identical and all active components are identical in both the UAP and UAP-X. Both use the same PCB.

The non-radiated measurements for the UAP are measured using a test connector on the PCB that bypasses the internal antenna, and this test connector is electrically at the same location as the connector on the UAP-X used to connect an external antenna, so performance will be essentially identical (the external antenna connector is connected to the test connector by about 3" of copper).

ION-E UAP, 25MHz SAW (UAP-N25) - The UAP and UAP-N25, are identical, except that the UAP-N25 uses a narrower 25MHz IF SAW filter in one of the RX paths (instead of 75MHz) to provide better rejection of nearby TX signals. The TX paths are identical in both the UAP and UAP-N25

ION-E UAP-XN25, EXT ANTENNA, 25 MHZ SAW - The UAP-X and UAP-XN25, are identical, except that the UAP-N25 uses a narrower 25MHz IF SAW filter in one of the RX paths (instead of 75MHz) to provide better rejection of nearby TX signals. The TX paths are identical in both the UAP-X and UAP-N25

7642133-01 ION-E UAP, 380-2700 MHz Label



7724746-00 ION-E UAP, EXTERNAL ANTENNA (UAP-X) Label



7768763-00 ION-E UAP, 25MHz SAW (UAP-N25) Label



7777908-00 ION-E UAP, EXT ANTENNA, 25 MHZ SAW (UAP-XN25) Label



Sincerely,

Van Hanson

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