OneReach FAQ's

Can the OneReach System be used with a powered Ethernet switch?
The OneReach System provides endspan power injection per the IEEE 802.3af and 802.3at specifications. Therefore, it will work with both powered and non-powered switches. In this instance, the powered switch is acting only as a switch, and will not provide power to the device. The OneReach Power Injection (PI) module is still needed.

What is the maximum distance to my powered device (IP camera, access point, etc.)
The maximum distance to the Remote PoE Port (RPP) is 3280 feet for PoE. From here, an additional 328 feet of UTP cable can be installed to the device. Therefore, the maximum distance to the device is 3608 feet.

What cable is needed to connect the RPP to the powered device?
A 4-pair category cable or patch cord, terminated with RJ45 connectors, is needed. If the RPP is located in an outdoor environment, an OSP-rated cable such as LANmark-6 OSP (Part Number 10139885) should be used. Per the Direct Attach warranty program, a plug can be attached onto this horizontal cable.

Is there a Single-mode option?
OneReach uses OM3 multimode and 12 AWG copper; single-mode would not offer any distance increase, as the DC power transmission distance limit negates any distance benefits of single-mode fiber.

Is there a PoE+ option?
Yes, components are available that are compliant to IEEE 802.3at, commonly referred to as PoE+.

Is there a 10/100/1000 Mbps option?
Yes, all of the devices offer 10/100/1000BASE-T. The "tri-speed" option is available for all power options (PoE, PoE+, and HPoE). Fiber transmissions speeds occur either at 100BASE-FX or 1000BASE-SX, depending on the part numbers selected.

Does the system provide SNMP support?
No, the components in the OneReach system are unmanaged devices providing media conversion from fiber to copper Ethernet.

How do I handle surge suppression on the copper conductors?
The OneReach system uses transient voltage suppression in the PI and the RPP devices. Both devices meet IEC 1000-4-5 for surge suppression. Berk-Tek strongly recommends the use of available add-on surge protection on both ends of the hybrid cable and on the remote end copper ports for applications in lightning prone areas.

Does the system support auto-sensing?
On the copper side of the PI and RPP devices, Ethernet connectivity is automatically detected. Also on the copper side, both the PI and RPP auto-negotiate connection speed and full/half duplex. On the fiber side, the optical link is either 100BASE-FX or 1000BASE-SX, where link will be automatically detected.

Are OneReach parts RoHS compliant?
Yes, all OneReach parts are RoHS compliant.

Can I install bulk cable and install connectors in the field?
Yes. A copper pigtail is available with an M8 connector terminated to black and white conductors (Single-Port or MPO 4-Port Remotes) or black, white, blue, and yellow conductors (4-Port PoE+ Remotes). This pigtail uses a push-on connector for field connection; no crimping tools are needed. Along with the use of field terminating LC connectors, this method will allow for the field termination on 1-port cables. MPO pigtails are available for field termination.

What is the warranty?
The OneReach system comes with a manufacturer's 1-year limited warranty. For OASIS/COASIS installations, the cable can come with a 15-year warranty.