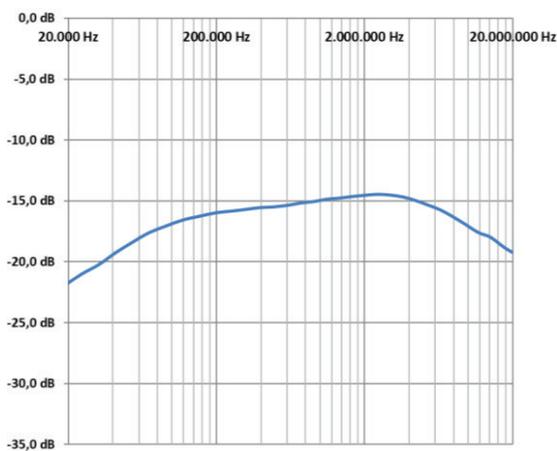


# COMBINED VOLTAGE DIVIDER & INDUCTIVE PD SENSOR



## DESCRIPTION

This new type of partial discharge sensor is specially designed for use in Link Boxes. PD testing (offline and online measurements) in cable joints and termination now available by using these sensors mounted in earthing/cross bonding link boxes.

This sensor also can be used as voltage divider for measurement of induced voltages in bonding system of high voltage cable systems. It can be also used to provide synchronization signals for PD measuring devices.

Also, it can be used for counting number of lightning impulses passing through sheath voltage limiters inside link boxes so condition monitoring of SVL is possible.

Two BNC outputs are available on the base of insulator which are voltage divider output and PD sensor output. So, signals are ready-to-use for measuring systems, counters or monitoring systems.

This system can get signals from a terminal box mounted on lid of link boxes or alternatively from a separate terminal box.

This product also contains a high frequency current transformer (HFCT) to pick up PD signals from high voltage cable screen. Specially designed ferrite core and primary and secondary windings provides a high performance partial discharge sensor for range of 40-800 kHz.

New product has some advantages rather than other HFCT's mounting inside link boxes including compact size, no effect on lightning performance of link box, no need to extra accessories for mounting and being low cost.

This product has been tested to evaluate its electrical and mechanical performance. It can withstand AC, DC and lightning overvoltages which may face during its operation in link box. It can also withstand electromagnetic forces during short circuit currents in link boxes.

## SPECIFICATION

Voltage divider nominal ratio (@50Hz)	477
Capacitor type	Ceramic
AC voltage withstand	28 kVrms
DC voltage withstand	25 kVrms
Lightning voltage withstand	60 kVpeak
Insulation resistance @5kdc (20°C)	2.5 TΩ
Operation temperature range	-20°C:90°C
Overall dimension	Height:90 mm, Ø 107mm
Tightening torque	70 N.m (M12/M12)
Max bending force	5 kN
weight	900 gr
Output connectors	BNC