

Description

The CP-421SE is a small customer premises equipment (CPE) splitter designed to expedite the service delivery and improve the performance of digital subscriber line (DSL) services. This CPE splitter filters all telephone sets, facsimile machines, answering machines, etc. which are connected to the unit's Swedish standard TE socket. Our DSL splitter design electronically isolates the high-speed DSL data stream from the voice band plain old telephone service (POTS). This design effectively blocks the xDSL and other radio frequencies up to 30 Megahertz.

Features

- Isolate telephone equipment impedances from the xDSL house wiring
- Attenuate xDSL signals to phone equipment to prevent conversion to voice band signals
- Excellent DSL band attenuation that protects voice band equipment and prevents intermodulation distortion from degrading data rates
- Minimize voice band interference, transmission, signaling and supervision
- Compatible with all major xDSL standards including ADSL, VDSL2, V.90 and Metallic Loop Testing
- Meets Skanova Network's Specification No. 304/1056-KDUA 101 110 Rev. D
- Designed to meet or exceed most ETSI TR 101 728 V 1.1.2 specifications
- CE Certified



The CP-421SE DSL Splitter

Applications

The CP-421SE splitter is used as the first (primary) connection to the main TE socket in the subscribers' premises. It isolates all voice-band equipment devices, including corded/cordless telephones, answering machines, fax machines, 56Kb/s and lower rate modems, automatic dialers, and recorder connectors that are plugged into the secondary sockets throughout the residence or plugged into the CPE-421SE TE socket. The CP-421SE splitter may also be used to isolate the telephone network jack connected to a digital cable and/or satellite television set-top box.

The CP-421SE splitter is one of many filter and splitter products manufactured by Pulse.

Z-BLOCKER® CP-421SE Filter Specifications

DC Resistance to Earth @ 100Vdc	> 20 MΩ
DC Resistance from "wire-A to wire-B" @ 100Vdc	> 5 MΩ
DC Series Resistance from POTS port to Line port	< 50Ω
DC Feeding Current	0 to 80 mA
Voltage Drop at 25Hz and 50Hz	< 2 Vrms
Insertion Loss @ 1 kHz	<1 dB
Insertion Loss Distortion; delta between 1 kHz and 200 Hz < f < 4 kHz levels	<1 dB
Impedance @ 25 Hz and 50 Hz for line port and phone port	> 40 kΩ
Impedance (Return Loss), 300 to 3400Hz, line & phone ports (ZSL & ZR)	> 14 dB
Impedance (Return Loss), 3400 to 4000Hz, line & phone ports (ZSL & ZR)	> 12 dB
Longitudinal Conversion Loss	
50 Hz to 600 Hz	> 40 dB
600 Hz to 3400 Hz	> 46 dB
3400 Hz to 4000 Hz	> 40 dB
4000 Hz to 10 MHz	> 40 dB
Isolation (Insertion Loss)	
32 kHz to 150 kHz*	> 45 dB
150 kHz to 1.1 MHz	> 55 dB
Noise	
300 Hz to 4000 Hz	< -75 BVp
26 kHz to 1.1 MHz	< -70 dBm
Intermodulation, second and third order harmonics	> 60 dB
Group Delay Distortion	
200 Hz to 600 Hz	< 250 μS
600 Hz to 3200 Hz	< 200 μS
3200 Hz t 4000 Hz	< 250 μS
Metering Insertion Loss	
12 kHz*	< 6 dB
16 kHz	< 3 dB
Common Mode Impedance	
100 kHz	1 kΩ
200 kHz	2.5 kΩ
400 kHz	6.8 kΩ
800 kHz	45 kΩ
1000 kHz	13.6 kΩ
1100 kHz	10.3 kΩ

Dimension (Length x Width x Height) = 78mm x 62mm x 30mm or 53 mm including pins

The CP-421SE CPE Splitter for Sweden meets or exceeds ETSI TR 101 728 V1.1.2 specifications, except where indicated (*). CE Mark certified