



Satellite Receiver RF Input

Surge Protection

Compliance IEC 61000-4-5:

8/20 µs surge 2 kA

Benefit

SMCJ20A alone: 8/20 µs surge 150 A

SMLJ20A alone: 8/20 µs surge 400 A

SMCJ20A & 2051-09-SM & CC453232:

This solution provides a low height, high current

solution to exposed set-top box applications.

Solution Products



051-09-SM-RPLF



SMCJ20A/SMLJ20A



CC453232-1R0KL

Objective

This solution is designed to offer surge protection to the RF input port from a set-top box to a satellite dish. Lightning strikes or near strikes to the building can damage the delicate RF port and the power supply which is fed to the dish.

Solution

Option 1

1 TVS Diode: SMCJ20A

Option 2

1 TVS Diode: SMLJ20A

Option 3

1 TVS Diode: SMCJ20A 1 GDT: 2051-09-SM-RPLF

1 Wirewound Chip Inductor: CC453232-1R0KL

RF Input CC453232-1ROKL DC Supply TVS Diode = 2051-09-SM-RPLF

The schematic above illustrates the application protection and does not constitute the complete circuit design. Customers should verify actual device performance in their specific applications.

Design Kit



PN-DESIGNKIT-46

BOURNS®

EMEA: Tel +36 88 520 390 Fax +36 88 520 211

Americas: *Tel* +1-951 781-5500

Fax +1-951 781-5700

Asia-Pacific: *Tel* +886-2 256 241 17 *Fax* +886-2 256 241 16

recommendations for typical port threats.

Bourns® PortNote® solutions provide protection

For more information, go to:

www.bourns.com

or email: protection@bourns.com