

# Surge Protective Devices



Model STC-SS



---

## Safety Information

---

### Important Information

Read these instructions carefully and look at the equipment to become familiar with the device before trying to install, operate, service or maintain it. The following special messages may appear throughout this bulletin or on the equipment to warn of potential hazards or to call attention to information that clarifies or simplifies a procedure.



The addition of either symbol to a “Danger” or “Warning” safety label indicates that an electrical hazard exists which will result in personal injury if the instructions are not followed.



This is the safety alert symbol. It is used to alert you to potential personal injury hazards. Obey all safety messages that follow this symbol to avoid possible injury or death.

### **DANGER**

**DANGER** indicates a hazardous situation which, if not avoided, **will result in** death or serious injury.

### **WARNING**

**WARNING** indicates a hazardous situation which, if not avoided, **could result in** death or serious injury.

### **CAUTION**

**CAUTION** indicates a hazardous situation which, if not avoided, **could result in** minor or moderate injury.

### **NOTICE**

NOTICE is used to address practices not related to physical injury. The safety alert symbol shall not be used with this signal word.

### Please Note

Electrical equipment should be installed, operated, serviced, and maintained only by qualified personnel. No responsibility is assumed by Appleton Grp LLC d/b/a Appleton Group for any consequences arising out of the use of this material.

A qualified person is one who has skills and knowledge related to the construction, installation, and operation of electrical equipment and has received safety training to recognize and avoid the hazards involved.

## Introduction


The SolaHD STCSS640362 suppressors are designed for the water and wastewater industry. These multi-stage hybrid suppressors address overvoltage transients with gas tube and silicon avalanche technology. In addition, sneak and electrical fault currents are mitigated with PTC devices which consist of solid-state resettable fuses. The units are encapsulated in stainless steel pipe nipples making them suitable for use in severe environments.

### **DANGER**

#### **HAZARD OF ELECTRIC SHOCK, EXPLOSION, OR ARC FLASH**

- Apply appropriate personal protective equipment (PPE) and follow safe electrical work practices. See NFPA 70E, NOM-029-STPS or CSA Z462.
- This equipment must only be installed and serviced by qualified electrical personnel.
- Turn off all power supplying this equipment before working on or inside equipment.
- Always use a properly rated voltage sensing device to confirm power is off.
- Replace all devices, doors and covers before turning on power to this equipment.
- This equipment must be effectively grounded per all applicable codes. Use an equipment-grounding conductor to connect this equipment to the power system ground.
- Confirm that the Surge Protective Device voltage rating on the module or nameplate label is not less than the operating voltage.
- Do not place in service on any signal line capable of continuously supplying more than 150mA.

**Failure to follow these instructions will result in death or serious injury.**

 **WARNING:** This product can expose you to chemicals including DINP, which is known to the State of California to cause cancer, and DIDP which is known to the State of California to cause birth defects or other reproductive harm. For more information go to: [www.P65Warnings.ca.gov](http://www.P65Warnings.ca.gov).

### **NOTICE**

#### **HAZARD OF MIS-INSTALLATION**

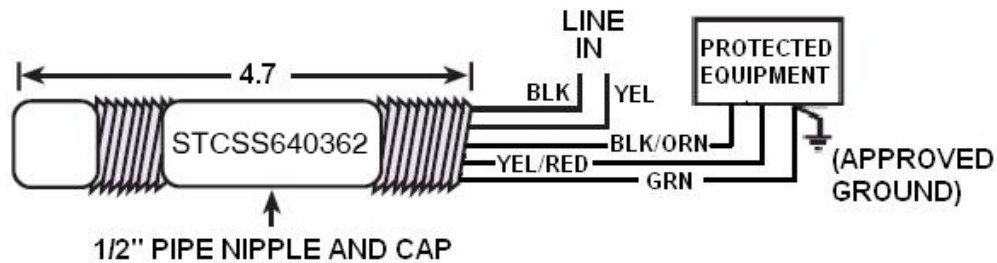
- Only install this protective device in indoor applications and on communication loop circuits which have been isolated from the public switch telephone network (PSTN).
- Do not expose the communication loop to contact with the electric light or power conductors.
- Install the protectors as per the applicable requirements of the National Electric Code, ANSI/NFPA 70.

**Failure to follow these instructions can result in equipment damage.**

## Installation

1. Turn off all power supplying this equipment before working on or inside equipment.
2. Securely install SPD in-line with conduit.
3. Connect load wires to output side of SPD.
4. Connect source wires to input side of SPD.
5. Do not exceed 150mA continuous current.
6. Turn on power and verify operation.

Figure 1: Typical Application



## General Technical Specifications

Operating Voltage	28 VDC
Maximum Operating Current	150 mA
Clamping Voltage (L-G)	36 VDC
Clamping Voltage (L-L)	72 VDC
Peak Surge Current	10 kA (8x20 $\mu$ s)
SPD Technology	GDT, SAD, w/series PTC
Frequency Range	0 to 20 MHZ
Insertion Loss	< 0.1 dB at 20 MHz
Series Resistance (per Conductor)	5 Ohm (typical)
Capacitance (Zero Volts Bias)	(L-G) 1200 pf (typical) (L-L) 600 pf (typical)
Operating Temperature	-40°C to +85°C
Life Cycle	400 @ 500 Amps (10x1000 $\mu$ s)
Weight (lb. / kg.)	0.35 lbs. [0.16 kg.]
Certifications	UL 497B
Limited warranty	5 years

## Ordering Information

MODEL	APPLICATION
<b>STCSS640362</b> (Former Model SS64-036-2)	1/2" Metal Conduit Capped

## Technical Support

Website: [www.solahd.com](http://www.solahd.com)

Technical Support E-Mail: [solahd.technicalservices@emerson.com](mailto:solahd.technicalservices@emerson.com)

Toll-Free: (800) 377-4384

USA: (847) 268-6651

## Warranty

Please see the "Terms & Conditions of Sale" document.

While every precaution has been taken to ensure accuracy and completeness in this manual, Appleton Grp LLC d/b/a Appleton Group assumes no responsibility, and disclaims all liability for damages resulting from use of this information or for any errors or omissions.



The Emerson logo is a trademark and service mark of Emerson Electric Co.  
Appleton Grp LLC d/b/a Appleton Group. SolaHD is a registered trademark of Appleton Grp LLC.  
All other marks are the property of their respective owners. © 2020 Emerson Electric Co. All rights reserved.

**United States  
(Headquarters)**

Appleton Grp LLC  
9377 W. Higgins Road  
Rosemont, IL 60018  
United States  
T +1 800 621 1506

**Europe**

ATX SAS  
Espace Industriel Nord  
35, rue André Durouchez,  
CS 98017  
80084 Amiens Cedex 2  
France  
T +33 3 2254 1390

**Canada**

EGS Electrical Group Canada  
Ltd.  
99 Union Street  
Elmira ON, N3B 3L7  
Canada  
T +1 888 765 2226

**Asia Pacific**

EGS Private Ltd.  
Block 4008, Ang Mo Kio  
Ave 10,  
#04-16 TechPlace 1,  
Singapore 569625  
T +65 6556 1100

**Latin America**

EGS Comercializadora  
Mexico S de RL de CV  
Calle 10 N°145 Piso 3  
Col. San Pedro de los Pinos  
Del. Álvaro Obregon  
Ciudad de México. 01180  
T +52 55 5809 5049

**Australia Sales Office**

Bayswater, Victoria  
T +61 3 9721 0348

**China Sales Office**

Shanghai  
T +86 21 3338 7000

**Middle East Sales Office**

Dammam, Saudi Arabia  
T +966 13 510 3702

**Chile Sales Office**

Las Condes  
T +56 2928 4819

**India Sales Office**

Chennai  
T +91 44 3919 7300

**Korea Sales Office**

Seoul  
T +82 2 3483 1555

PN# 9635\_r-



## X-ON Electronics

Largest Supplier of Electrical and Electronic Components

*Click to view similar products for [Surge Suppressors](#) category:*

*Click to view products by [Solahd](#) manufacturer:*

Other Similar products are found below :

[0804000](#) [0804001](#) [0804003](#) [0804004](#) [0804005](#) [0804006](#) [0804007](#) [0804008](#) [0804009](#) [0804010](#) [0804011](#) [0804012](#) [0804013](#) [0804014](#)  
[0804024](#) [0804025](#) [0804026](#) [0804027](#) [0804029](#) [0804030](#) [0804034](#) [0804035](#) [0804036](#) [0804037](#) [0804038](#) [0804039](#) [0804040](#) [0804041](#)  
[0804042](#) [0804043](#) [0804047](#) [0804048](#) [0804049](#) [0804050](#) [0804099](#) [0804100](#) [0804101](#) [0804102](#) [0804103](#) [0804104](#) [0804105](#) [0804106](#)  
[0804107](#) [0804108](#) [0804110](#) [0804111](#) [0804113](#) [0804114](#) [0804115](#) [0804116](#)