



A-Series[®] II Panelboards

AD/AE/AQ Type P & N Power Panel SG Three-Phase Circuit Breaker Kits

Introduction

These instructions describe the installation of SG three-phase circuit breaker kit into an A-Series[®] II panelboard. These kits are for use in panelboards ordered with Un-Specified Space.

The catalog number for three-pole kit is ASPP6SG3S

Part List for ASPP6SG3S Table 1.

ITEM #	DESCRIPTION	PART #	QTY
1	STRAP FOR B PHASE	315A7046P8	1
2	STRAP FOR A PHASE	315A7046P7	1
3	STRAP FOR C PHASE	315A7046P9	1
4	(SPOOL)	315A7036P22	3
5	(SCREW-SPOOL)	315A7037P5	3
6	(WASHER-SPOOL)	75A105503P111	3
7	(SCREW-BUS)	315A7034P7	3
8	3P BRACKET	139C5500P83	1
9	SCREW, BKT TO RAIL	N667P16008B6	2
10	XMAS TREE	315A7077P1	3
11	FILLER PLATE, SG/TFG	139C5503P103	1
12	SCREWS , #10-32 X 3/8	N722P16006B6	4
13	BRACKET INSULATION	10086929P11	1
14	INSULATOR B	10086929P5	1
15	INSULATOR A	10086929P7	1
16	INSULATOR C	10086929P6	1
17	BREAKER MOUNTING SCREWS	N37P16060B6	2
19	SPRING LOCK WASHER #12	N405P40B6	2

Installation

WARNING: Before attempting to install one of these kits, remove all power from the panelboard.

Use the following procedure to install a SG circuit breaker kit. Call-out numbers in the illustrations and numbers in brackets in the text refer to the Item Numbers in Table 1. Installation of a three-pole kit is illustrated in Fig.no.1 or Fig.no.2.

1. Remove the interior assembly from its packaging and verify that all parts are present, as given in the parts list.
2. Remove the 8 screws (600A and 800A panels) securing the dead front to panelboard interior. Lift off the dead front and place it and the screws aside.
3. Remove the circuit breaker kit from its packaging and verify that all parts are present, as given in the packing list.

4. Locate the holes on the B and C phase main busbar over which C phase of breaker mounting strap will crossover the main busbar after assembly of the breaker in horizontal position as shown in the Fig.no.1 or Fig.no.2. Put xmas [10] tree over the two aligned holes of B and C phase.
5. Similarly locate the holes of A phase main busbar over which B phase of breaker mounting strap will crossover the main busbar after assembly of the breaker in horizontal position as shown in the Fig.no.1 or Fig.no.2. Put xmas [10] tree over the aligned hole of A phase.
6. Refer Fig.no.1 to mount the breaker on left side of interior. First mount the strap for A phase [2] adjacent to crossbar [18] and insert the screw [7] through slot provided for A phase to clamp it with main busbar. Similarly mount B phase [1] strap to B phase main busbar but adjacent to A phase branch base, and C phase [3] strap to C phase main busbar but adjacent to B phase branch base. All the phase straps [1], [2], and [3] should be clamped with main bus using screws [7] with 60 in-lb maximum torque.

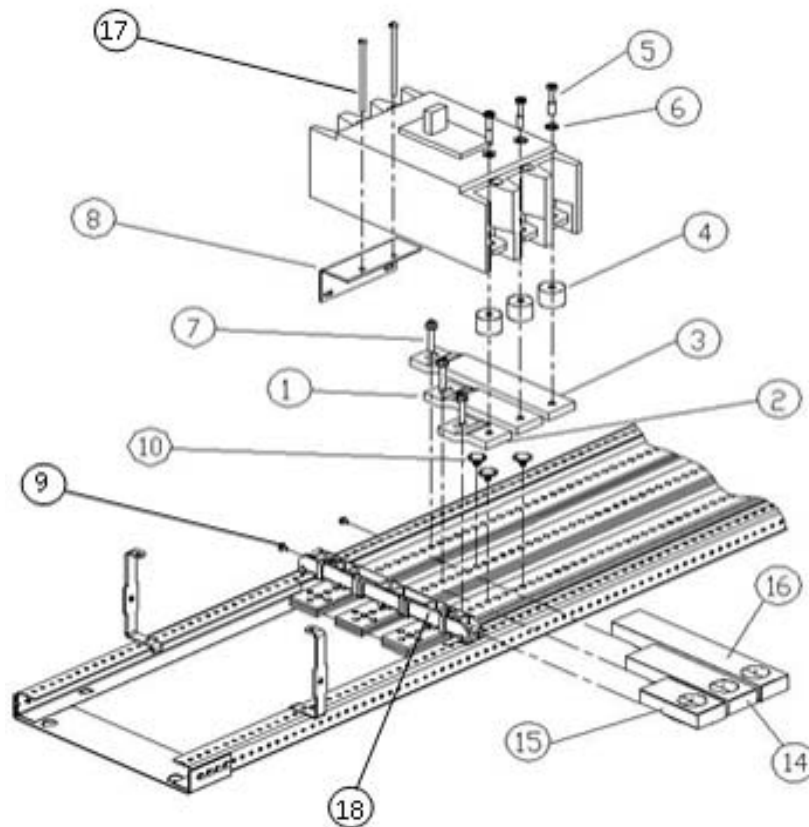


Figure 1. Installation of a SG circuit breaker kit on left side of interior, catalog number ASPP6SG3S, into an A series® II panelboard.

7. Refer Fig.no.2 to mount the breaker on right side of interior. First mount the strap for A phase [2] adjacent to cross bar [18] and insert the screw [7] through slot provided for A phase to clamp it with main busbar. Similarly mount B phase [1] strap to B phase main busbar but adjacent to A phase branch base, and C phase

[3] strap to C phase main busbar but adjacent to B phase branch base. All the phase [1],[2], and [3] straps should be clamped with main bus using screws [7] with 60 in-lb maximum torque.

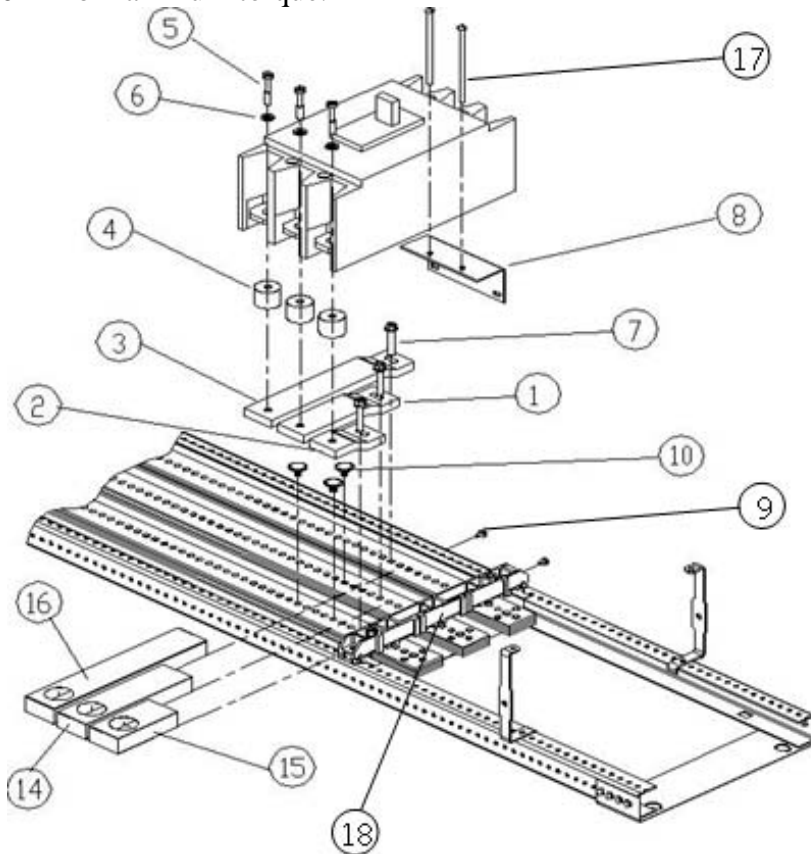


Figure 2. Installation of a SG circuit breaker kit on right side of interior, catalog number ASPP6SG3S, into an A-Series® II panelboard.

8. Slide the insulator for A phase [15], B phase [14], C phase [16] cover over the respective A, B, & C phase strap such that all the three insulators cut out made for contact with the spool surface are in one line as shown in Fig.no.1 or Fig.no.2.
9. Mount bracket [8] on the interior rail with two screws [9] at the location defined in Fig.no.1 and Fig.no.2 with 27-36 in-lb force.
10. Place the conical washer [6] over the three ¼-28 x 1 ³⁄₈ screws [5] and insert the screws through the holes in the top of the circuit breaker terminals. Secure the three spools [4] to the underside of the breaker terminals with the screws [5]. Take care to assemble the screws to the spools as shown in Fig.no.1 or Fig.no.2, with the tapped end of the spool toward the breaker terminal.
11. Tighten the three ¼-28 X 1 ³⁄₈ screws [5] to 50-70 lb-in.
12. Place the breaker over the straps [1], [2], and [3] such that screws [5] align with strap holes as shown in Fig.no.1 and Fig.no.2. Put two screw [17] with spring lock washer #12 [19] in the breaker as shown in Fig.no.1 and Fig.no.2. Tighten these screws to bracket [8] with 18-22 lb-in torque.
13. Remove the four screws [12] of existing filler plate from dead front where the pro-stock SG breaker needs to be installed, as illustrated in Fig.no.3.

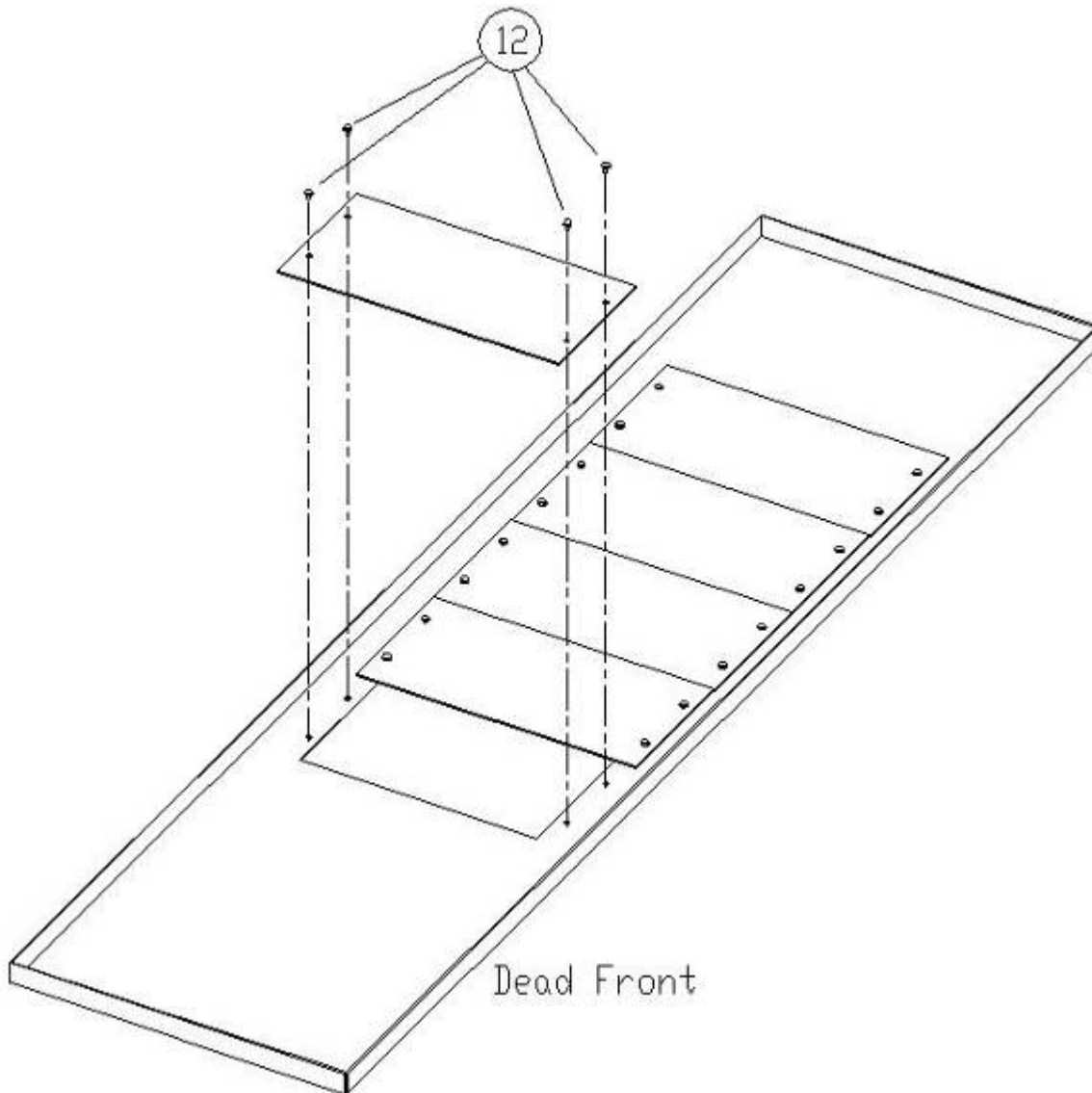


Figure 3. Removing the shield inserts from the shield for SG breaker installation in A-Series® II panelboard.

14. To install branch breaker (kit ASPP6SG3S), place the new filler plate [11] over the dead front so that the four same-size holes line up with the threaded holes of the dead front, as illustrated in Fig.no.4. Fasten filler plate to the dead front with four #10-32 x $\frac{3}{8}$ screws [12] tightened to 27-36 lb-in.
15. Reattach the dead front to the interior with the 8 screws removed in step 2. Tighten the screws to 27-36 lb-in.
16. If SG breaker has to be installed immediate after cross bar as shown in Figure 5 then gap between the breaker and crossbar has to be 0.002 inch.

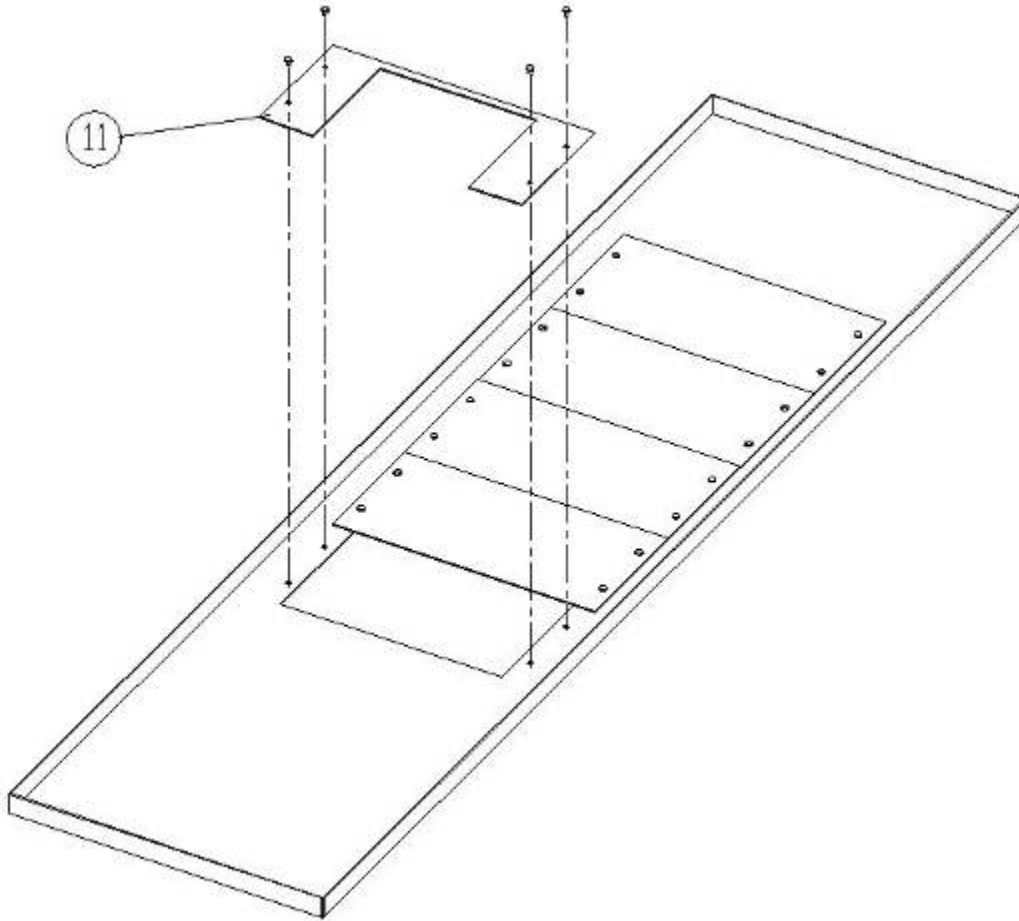


Figure 4. Attaching the shield insert to the shield for SG breaker installation in A-Series® II panelboards.

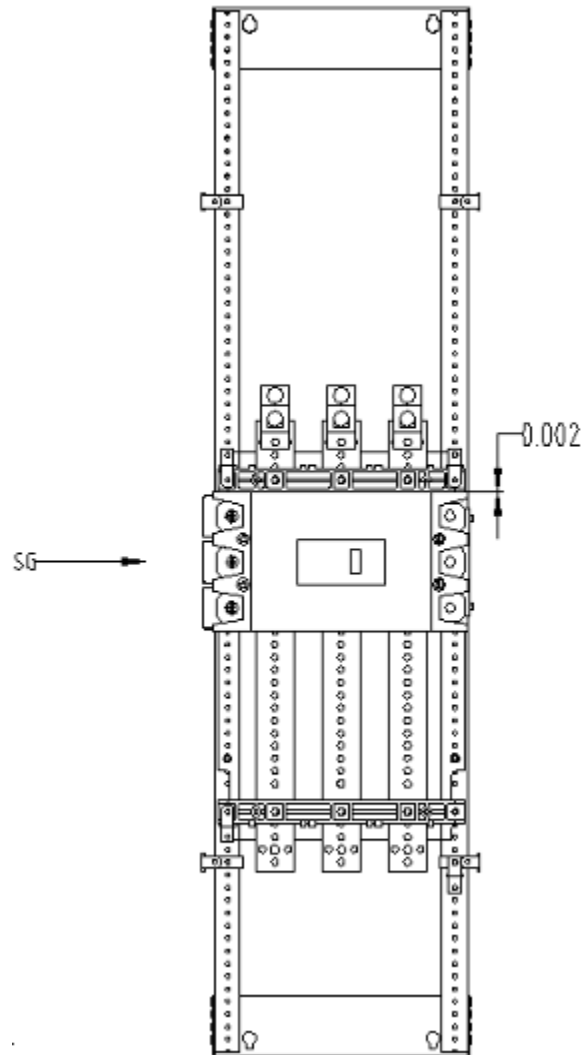


Figure 5. Distance between Crossbar and SG breaker

These instructions do not cover all details or variations in equipment nor do they provide for every possible contingency that may be met in connection with installation, operation, or maintenance. Should further information be desired or should particular problems arise that are not covered sufficiently for the purchaser's purposes, the matter should be referred to the GE Company.



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