



INSTRUCTION BULLETIN

No. 9008202
Machine: S30/S30 X4/
S30 XP
Published: 11-2010
Rev. 00

NOTE: DO NOT DISCARD the Parts List from the Instruction Bulletin. Place the Parts List in the appropriate place in the machine manual for future reference. Retaining the Parts List will make it easier to reorder individual parts and will save the cost of ordering an entire kit.

NOTE: Numbers in parenthesis () are reference numbers for parts listed in Bill of Materials.

Installation instructions for **kit number 9008199**

SYNOPSIS:

This kit contains the parts needed to install an indoor light kit (flashing light, backup alarm, and backup light) on S30, S30 XP, and S30 X4 machines (serial numbers 002100 and above). Please follow step-by-step instructions.

SPECIAL TOOLS / CONSIDERATIONS: NONE

(Estimated time to complete: 2 hours)

PREPARATION:

1. Empty the hopper. Refer to the Operators Manual for instructions and safety information.



WARNING: Lift arm pinch point. Stay clear of hopper lift arms.

FOR SAFETY: When using machine, make sure adequate clearance is available before raising hopper.

2. Park the machine on a clean level surface, raise the hopper, engage the hopper support, turn off the machine, remove the key, and set the parking brake.



WARNING: Raised hopper may fall. Engage hopper support bar.

FOR SAFETY: Before leaving or servicing machine, stop on level surface, turn off machine, and remove key.

3. Disconnect the battery cables from the battery.



WARNING: Always disconnect battery cables from machine before working on electrical components.

4. Open both rear engine covers, the side cover, and the top cover.

INSTALLATION:

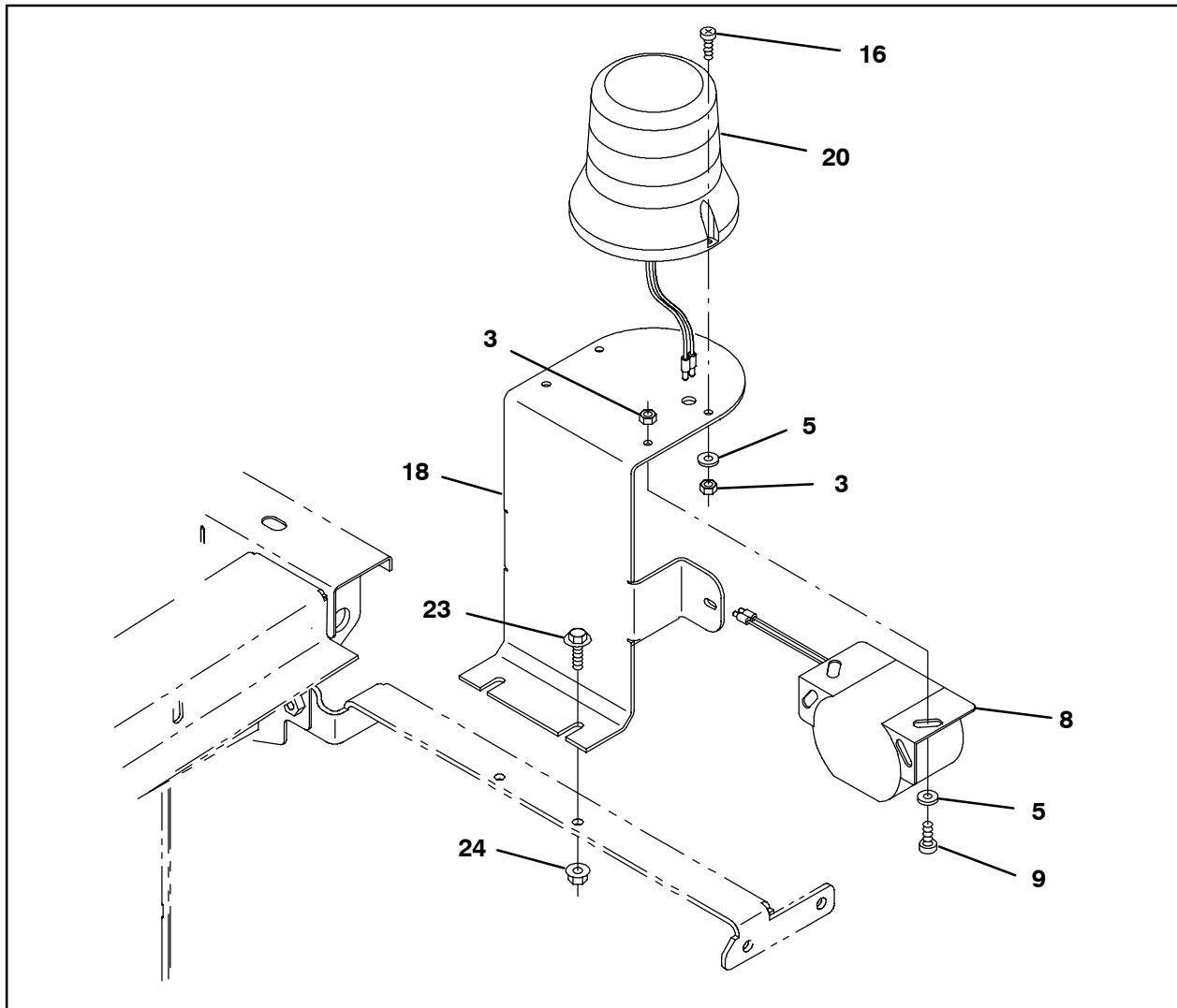


FIG. 1

1. **Machines without overhead guards:** Use two pan screws (16), two washers (5), and two hex nuts (3) to install the light (20) onto the backup alarm bracket (18). Refer to Fig. 1.
2. Use two pan screws (9), two flat washers (5), and two hex nuts (3) to install the backup alarm assembly (8) onto the backup alarm bracket (18). Refer to Fig. 1.
3. Use two SEMS hex screws (23) and two flange hex nuts (24) to install the backup alarm / flashing / strobe light assembly onto the machine. Refer to Fig. 1.
4. Cut 44 mm (1.75 in) notch into seal to allow space for routing the backup harness (1). Refer to Fig. 2.

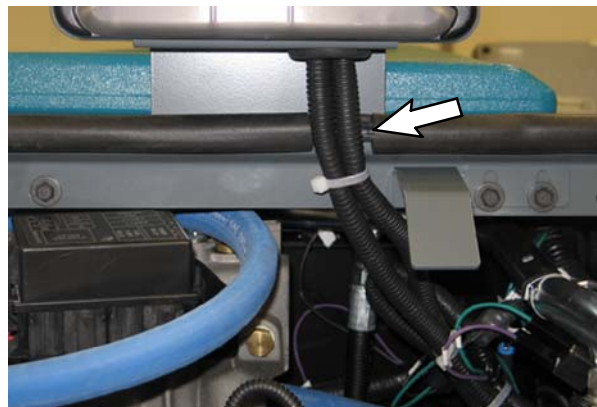


FIG. 2

- Machines with overhead guards:** Use two pan screws (16), two washers (5), and two hex nuts (3) to install the light (20) onto the overhead guard. Refer to Fig. 3.

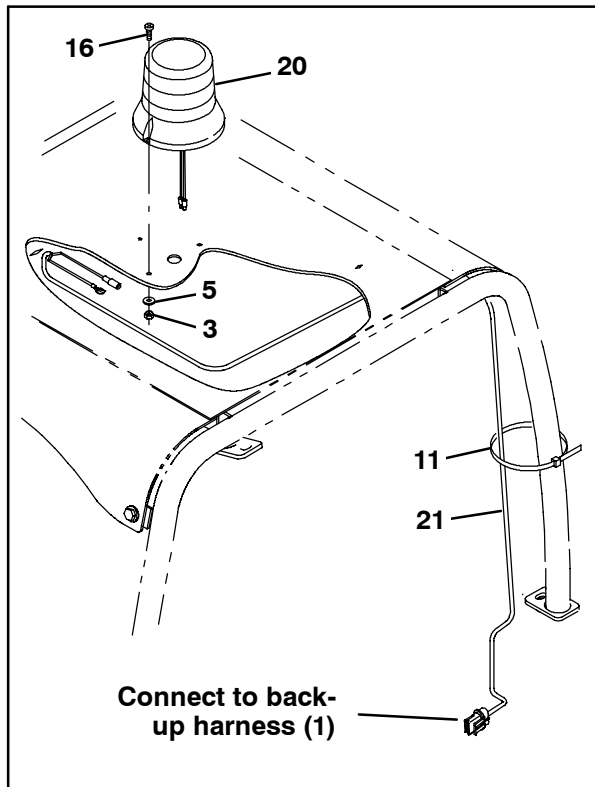


FIG. 3

- Machines with overhead guards:** Connect the overhead light harness (21) to the light (20). Refer to Fig. 5.
- Machines with overhead guards:** Route the overhead light harness (21) down the rear leg of the overhead guard and into the engine compartment. Refer to Fig. 3.
- Machines with overhead guards:** Use cable ties (11) to secure the overhead light harness (21) to the rear leg of the overhead guard. Refer to Fig. 3.
- If necessary, remove the propel pedal from the machine. Set all mounting hardware aside. Refer to Fig. 4.

- Use two hex nuts (3) and two pan screws (16) to install the snap switch (15) onto the reverse switch bracket (12). Refer to Fig. 4.

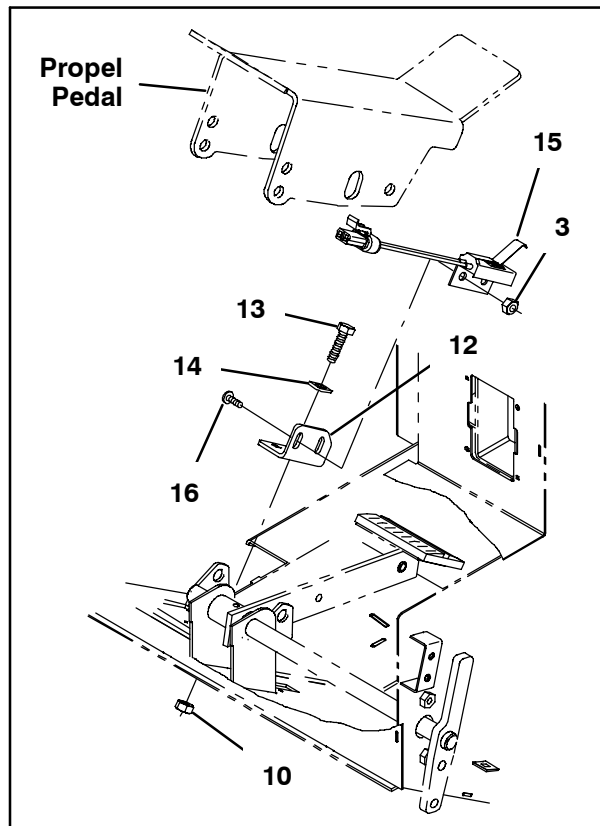


FIG. 4

- Use two hex screws (13), two washers (14), and two hex nuts (10) to install the reverse switch bracket (12) onto the machine. Refer to Fig. 4.
- Route the snap switch (15) cable down through the rubber gasket in the propel pedal access panel. Refer to Fig. 5.

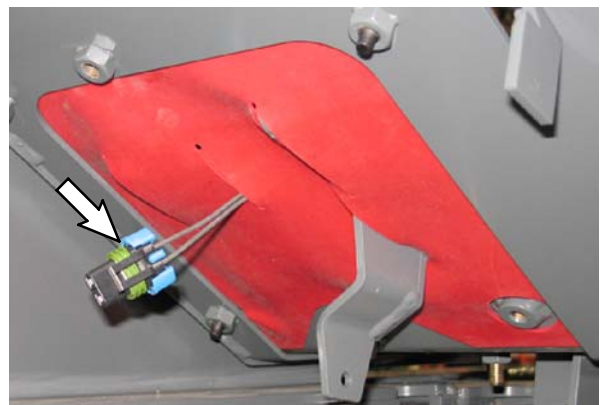


FIG. 5

- Reinstall the propel pedal.

14. Cut the cable ties from the bundled portion of the main wire harness and connect the main harness to the snap switch (15). Refer to the cable labels and Fig. 6 and Fig. 12 for connection locations.

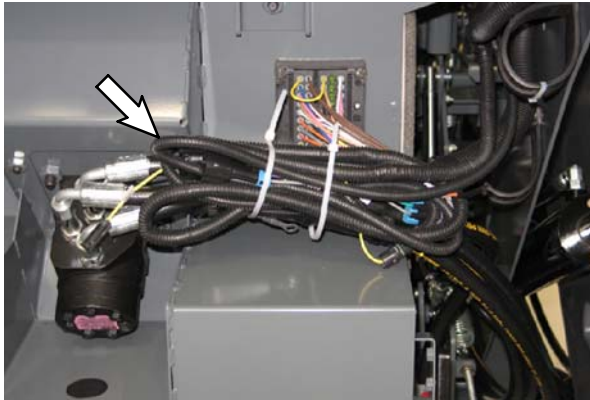


FIG. 6

15. Use two pan screws (7), two washers (5), and two hex nuts (3) to install the flasher (6) onto the engine control bracket. Refer to Fig. 11.

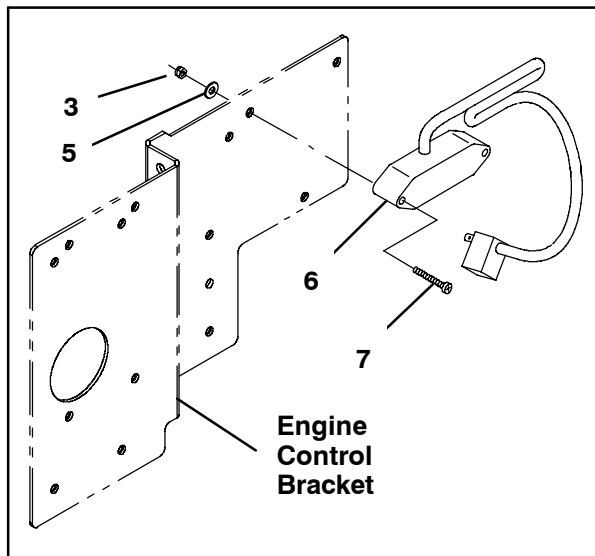


FIG. 7

16. **Machines with overhead guards:** Connect the overhead light harness (21) to the main wire harness. Refer to the cable labels and Fig. 8 and Fig. 12 for connection locations.

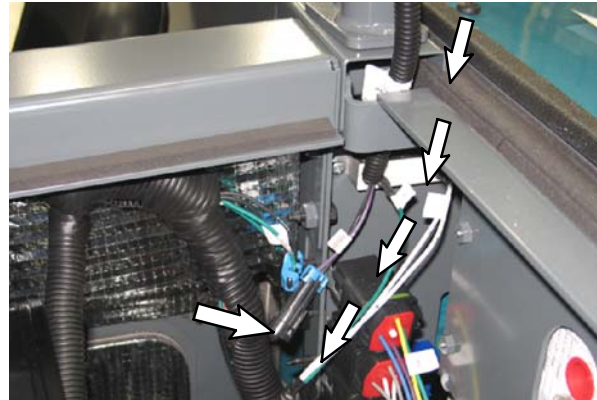


FIG. 8

17. **Machines without overhead guards:** Connect the backup harness (1) to the two main wire harness connectors located near the engine control bracket. Refer to the labels on each harness and Fig. 12 for connection locations.

Machines with overhead guards: Connect the backup harness (1) to the main wire harness connector located near the engine control bracket. Refer to the labels on each harness and Fig. 9 for connection locations.

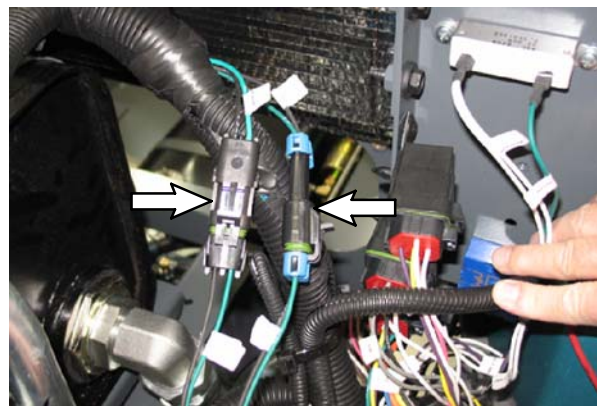


FIG. 9

18. Connect the backup harness (1) to the flasher (6). Refer to the cable labels and Fig. 7 and Fig. 12 for connection locations.

19. Neatly bundle any excess backup harness (1) lead connected to the flasher (6) and secure the bundle with a cable tie (11). Refer to Fig. 15.



FIG. 10

20. Route the backup harness (1), through the cable clamp (22) and to the area where the flashing light / alarm assembly is installed.
21. Install both grommets (19) and (22) into the light bracket (17). Refer to Fig. 11.

22. Hold the light bracket (17) up to the backup alarm bracket (18) and route the wires from the flashing / strobe (20) and backup alarm assembly (8) down through the smaller hole in the light bracket. Refer to Fig. 11.

23. Route the backup harness (1) through the larger hole in the light bracket (21) and connect the backup harness to the flashing / strobe light (2), backup alarm (8), and backup light (2). Refer to Fig. 11 and Fig. 12.

24. Use two pan screws (4), two flat washers (5), and two hex nuts (10) to install the backup light (2) and light bracket (17) onto the backup alarm bracket (18). Refer to Fig. 11.

25. Reconnect the battery cables to the battery.

26. Start the machine, disengage the hopper support, and lower the hopper.



WARNING: Lift arm pinch point. Stay clear of hopper lift arms.

27. Test the machine to ensure all newly installed components function.

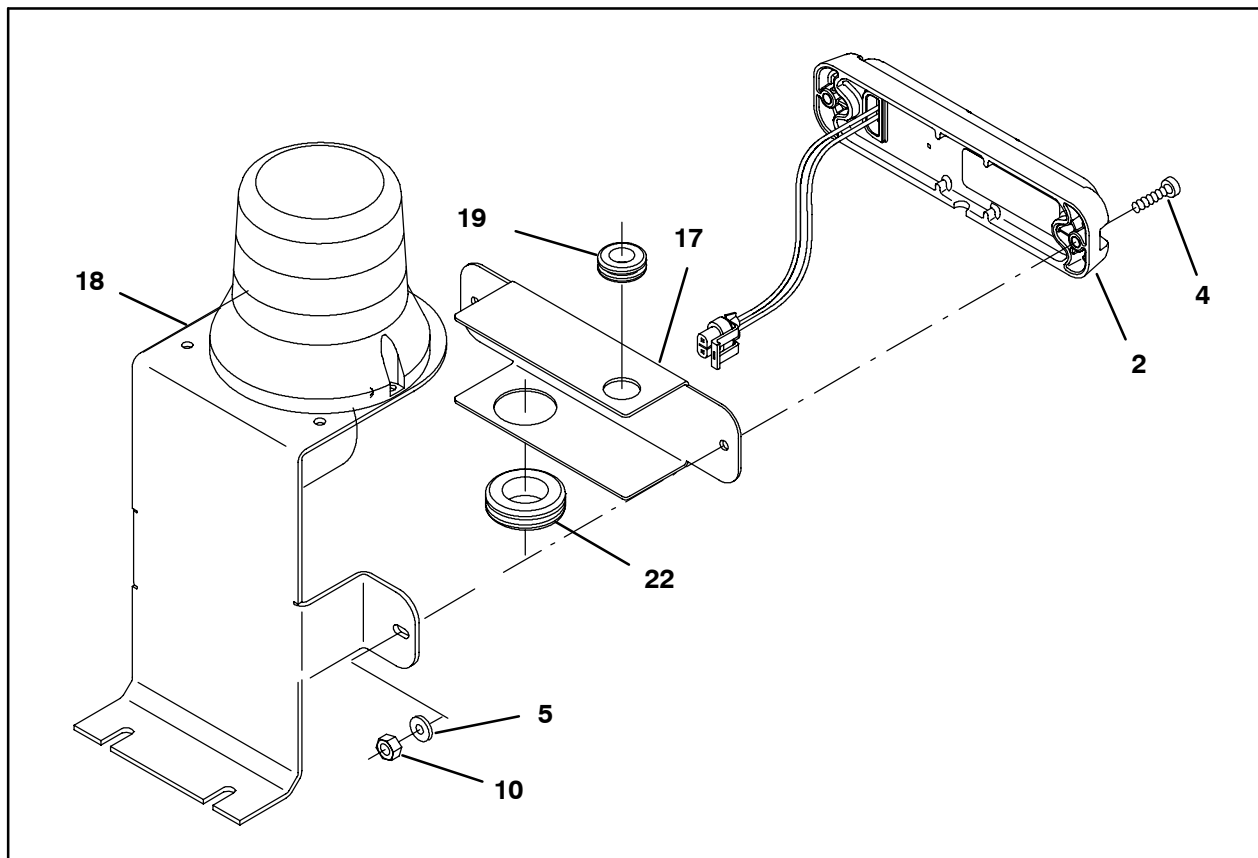


FIG. 11

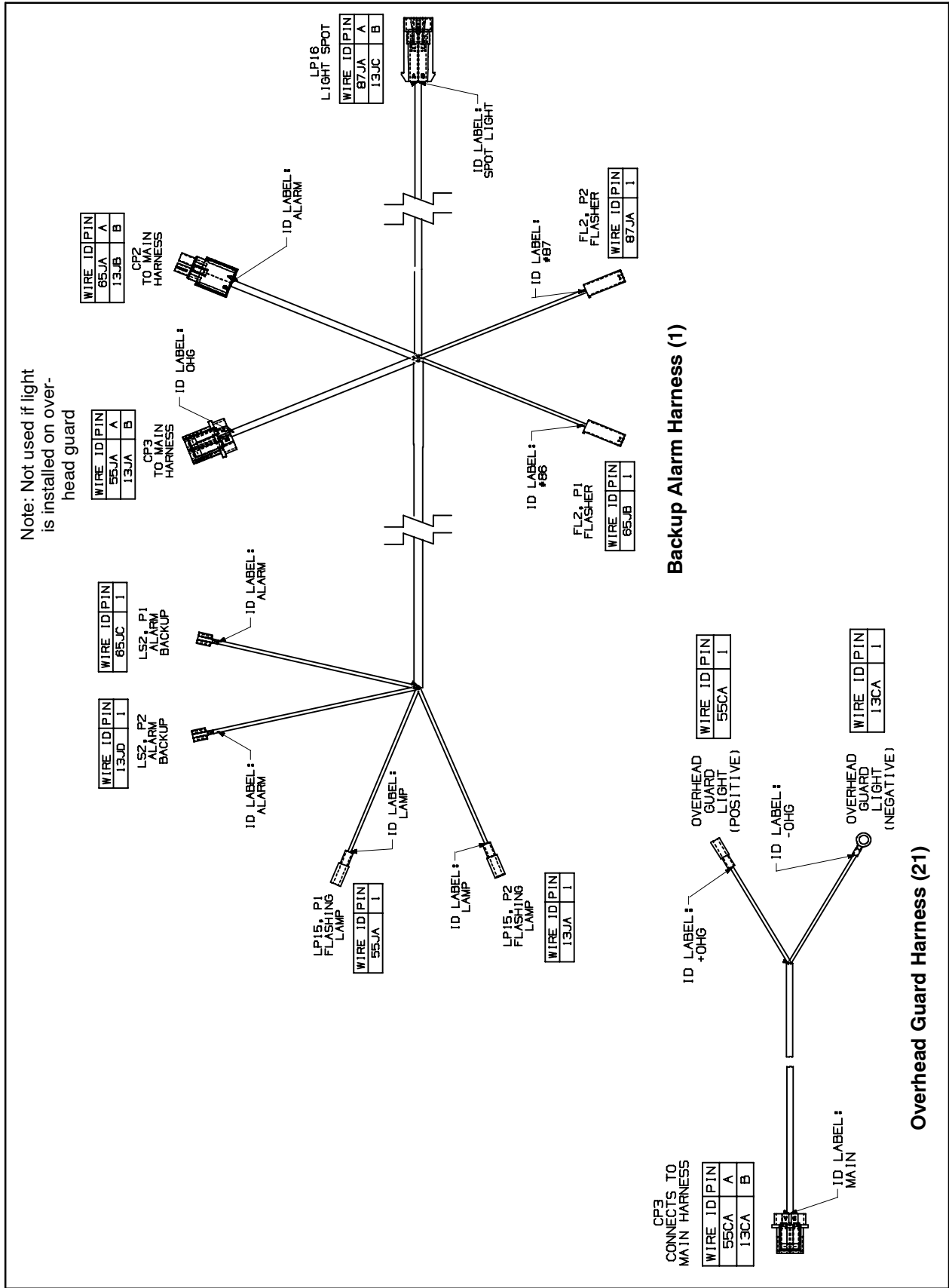


FIG. 12

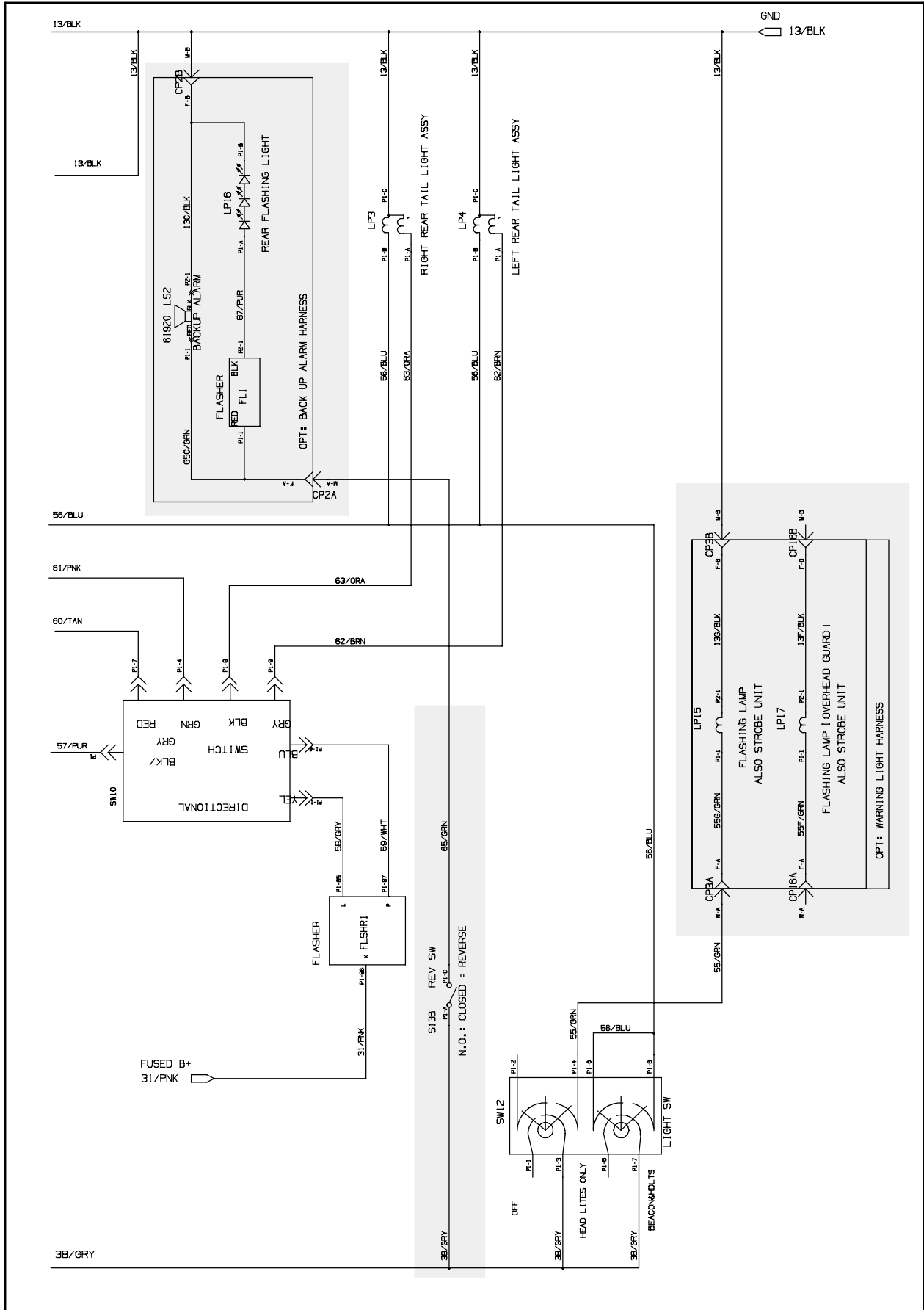


FIG. 13

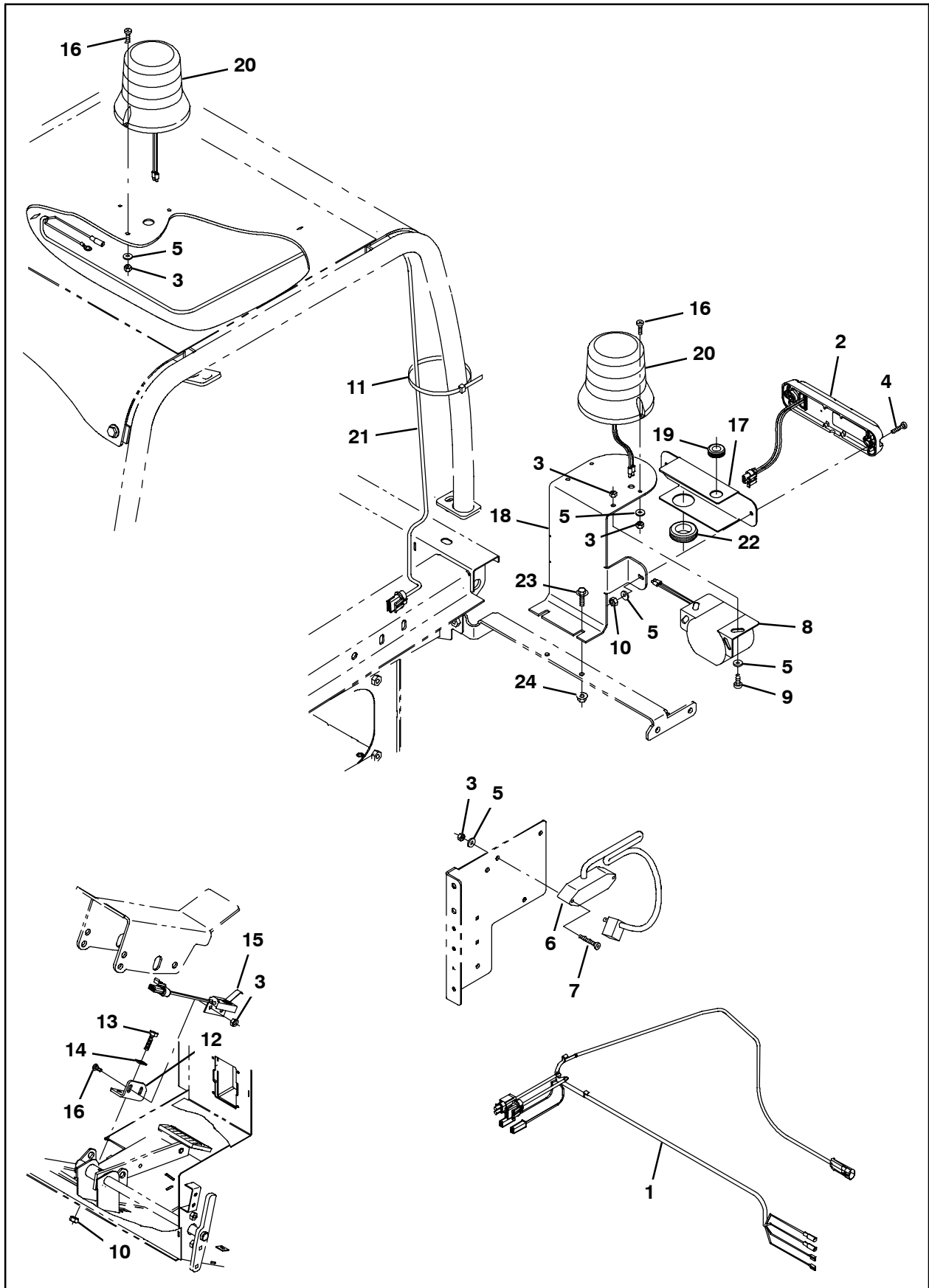


FIG. 14

Bill of Materials for Light Kit, Inside, CI [S30] - 9008199

Ref.	Tennant Part No.	Description	Qty.
▽	9008199	Light Kit, Inside, CI [S30]	1
▲	1 1034191	Harness, Backup, Rev [S30]	1
▲	2 1036173	Light, Led, White, 12-24VDC	1
▲	3 06549	Nut, Hex, Lock, M5 X 0.80, NI	8
▲	4 06935	Screw, Pan, Phl, M5 X 0.80 X 25, 4.8	2
▲	5 19066	Washer, Flat, 10	8
▲	6 1036985	Flasher, 12-80VDC, 2a	1
▲	7 06938	Screw, Pan, Phl, M5 X 0.80 X 40, 4.8	2
▲	8 83161	Alarm Assy, Backup, 12-24VDC 82-107dba	1
▲	9 09145	Screw, Pan, Phl, M6 X 1.00 X 16, 4.8	2
▲	10 07785	Nut, Hex, Std, M6 X 1.00, SS	4
▲	11 49266	Tie, Cable, Nyl, 07.3l .19w 1.8 Max D	4
▲	12 1036995	Bracket, Switch, Reverse	1
▲	13 08716	Screw, Hex, M6 X 1.00 X 20, SS	2
▲	14 32483	Washer, Flat, 0.25, SAE	2
▲	15 1039735	Switch, Snap, 15a NO	1
▲	16 06933	Screw, Pan, Phl, M5 X 0.80 X 16, 4.8	4
▲	17 1061203	Bracket, Light	1
▲	18 1061140	Bracket, Alarm, Backup	1
▲	19 10632-9	Grommet, Rbr, 0.63id, F/0.8h, .12 Matl	1
▲	20 1017248	Light, Flash, Amb, 12-48VDC	1
▲	21 1030973	Harness, OHG [S30]	1
▲	22 10632-14	Grommet, Rbr, 1.00id, F/1.4h, .12 Matl	1
▲	23 1036892	Screw, Hex, M6 X 1.00 X 25, 9.8, SEMS	2
▲	24 07790	Nut, Hex, Flng, M6 X 1.00	2

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