

No. 340106

Machine: 8200 / 8210 Published: 7-98/01 System: OPTIONS

NOTE: DO NOT DISCARD the Parts List from the Instruction Bulletin. Place the Parts List in the appropriate place in your machine manual for future reference. Retaining the Parts List will make it easier to reorder individual parts and will save you 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 365068.

SYNOPSIS / PROBLEM:

This kit contains the parts needed to install a severe environment optional lights kit on the model 8200 / 8210 sweeper/scrubber.

Please follow step-by-step instructions.

SPECIAL TOOLS / CONSIDERATIONS: The hopper should be completely emptied of debris before installing this kit. If full, dump the hopper prior to installation. (Estimated time to complete: 1 hour).

INSTALLATION OF AIR FILTER INDICATOR: (Refer to FIG. 1)

1. Start the machine and raise the hopper all the way.

NOTE: Be sure the hopper debris has been dumped before opening the hopper door.

- 2. Open the hopper door fully.
- 3. Engage the hopper prop rod.



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

4. Turn the engine off

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

5. Open the engine cover.

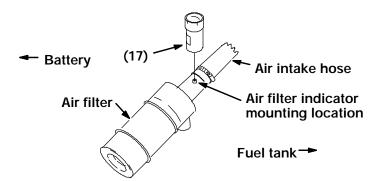


FIG. 1 - Installation of Air Filter Indicator on Engine Air Filter

6. Screw the air filter indicator into the nipple on the backside of the filter. (Refer to FIG. 1)

INSTALLATION AND WIRING OF HYDRAULIC SENDING UNIT: (Refer to FIG. 2)

1. Disconnect battery cables from machine.



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

2. Locate the hydraulic oil filter assembly (underneath the battery tray).

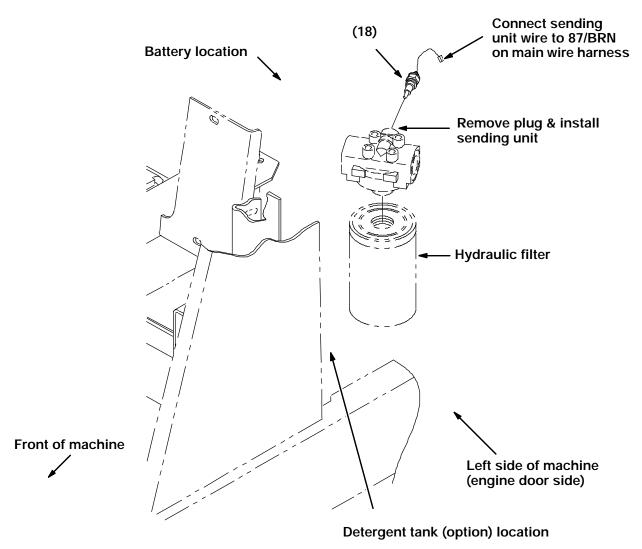


FIG. 2 - Installation of Filter Sender on Hydraulic Filter Assembly

- 3. Remove the plug from the back side of the filter element and install the sending unit (18). (Refer to FIG. 2)
- 4. Connect the sending unit wire to the main wire harness wire 87/BRN. (Refer to FIG. 2)

NOTE: The main harness runs behind the hydraulic filter assembly.

INSTALLATION OF HOPPER PRESSURE SWITCH & DOOR CLOSED SWITCHES: (Refer to FIG. 3)

1. Install the hopper pressure switch (1) into the pre-drilled holes in the hopper plate using the hardware (7) and (8) provided. (Refer to FIG. 3)

NOTE: Install the cable clamp with the top pressure switch mounting screw. (Refer to FIG. 3)

- 2. Install the brass fitting (2) and breather fitting (3) onto the hopper pressure switch. (Refer to FIG. 3)
- 3. Install the vacuum hose (5) onto the brass fitting and route it through the hopper assembly as shown in **FIG 3**.
- 4. Install the grommet (4) over the switch wires, then secure the grommet into the pressure switch. (Refer to FIG. 3)
- 5. Route the pressure switch wires through the cable clamp and then through the vacuum hose hole in the rear hopper plate. (*Refer to FIG. 3*)
- 6. Connect the hopper pressure switch wires to 83/GRN on the main wire harness, which runs behind the rear hopper plate. (*Refer to FIG. 3*)
- 7. Install the hopper plate bracket (11) onto the hopper plate with the hardware (12) and (13) provided. (Refer to FIG. 3)
- 8. Install the hopper door bracket (10) into the pre-drilled holes in the hopper door with the hardware (12) and (13) provided. (*Refer to FIG. 3*)
- 9. Install the hopper door closed switch (14) into the hopper plate bracket installed in *Step 7* with the hardware (15) and (16) provided. (*Refer to FIG. 3*)
- 10. Connect the hooper door closed switch wires to wire 81/ORA hanging down from the main harness. (Refer to FIG. 3)

NOTE: Wire 81/ORA may need to be unbundled from the main harness.

INSTALLATION AND WIRING OF INSTRUMENT PANEL LAMPS: (Refer to FIG. 4)

- 1. Install the instrument panel lamps (9) behind the instrument panel. (Refer to FIG. 4)
- 2. Wire each lamp according to the instructions in **FIG 4.**.
- 3. Reconnect the machine battery cables.
- 4. Close the engine cover.
- 5. Disengage the hopper prop rod and return it to the storage position.
- 6. Start the engine.
- NOTE: When starting engine look to see that the newly installed lamps on the instrument panel flash briefly during the machine's self diagnostic test. If one of the lights does not flash, check the wiring connections and retest until all lights flash during engine start-up.
 - 7. Lower the hopper

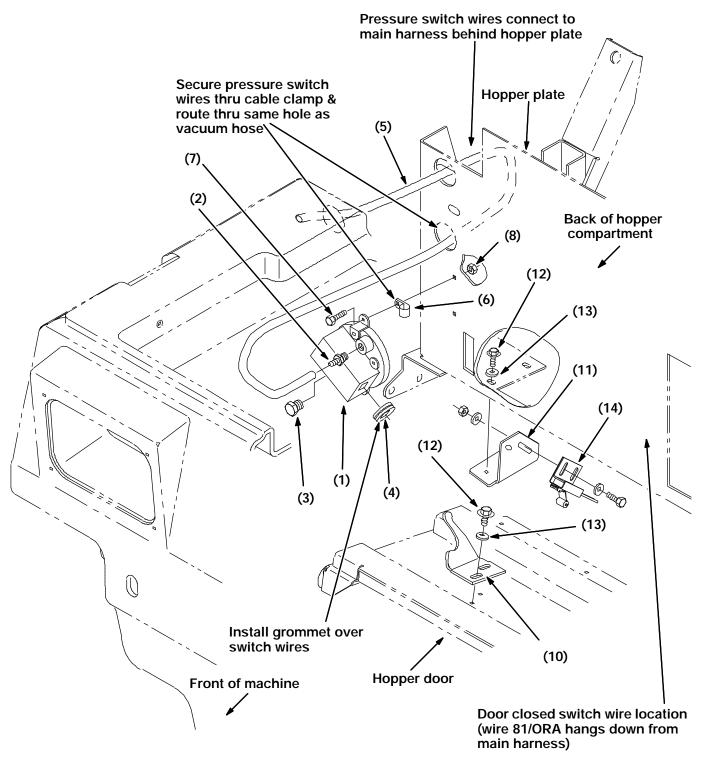


FIG. 3 - Installation of Hopper Pressure Switch & Door Closed Switch

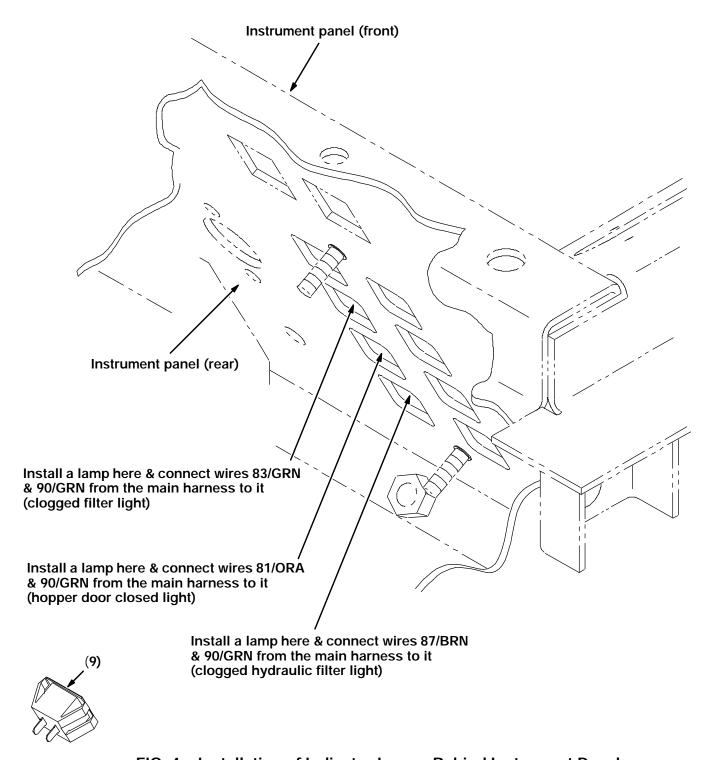


FIG. 4 - Installation of Indicator Lamps Behind Instrument Panel

BILL OF MATERIALS FOR KIT NUMBER 365068

Ref.	TENNANT Part No.	Description	Qty.
1	34868	Switch, pressure	1
2	40607	Fitting, brass, str	1
3	82739	Fitting, breather	1
4	10632-4	Grommet, rubber	2
5	39780-2	Hose, vacuum 0.16 ID X 54.0 LG	1
6	46236	Clamp, cable	1
7	09206	Screw, hex M4 x 0.7	2
8	02850	Nut, HEXLOCNYLYN, M4 x 0.7	2
9	361075	Lamp, Indicator 12 Volt	3
10	365272	Bracket	1
11	365273	Bracket	1
12	74455	Screw, HEXFMG, M06-1.0 X 12	4
13	01684	Washer, Flat, 0.25 SS	4
14	59965	Switch, Roller	1
15	09244	Screw, hex M5 x 0.8 16	2
16	06549	Nut, HEXLOCNYLYN M5 x 0.8	2
17	03026	Indicator, Air Filter	1
18	65222	Sender, Filter, Hydraulic	1

TENNANT COMPANY

P. O. Box 1452 Minneapolis, MN 55440-1452