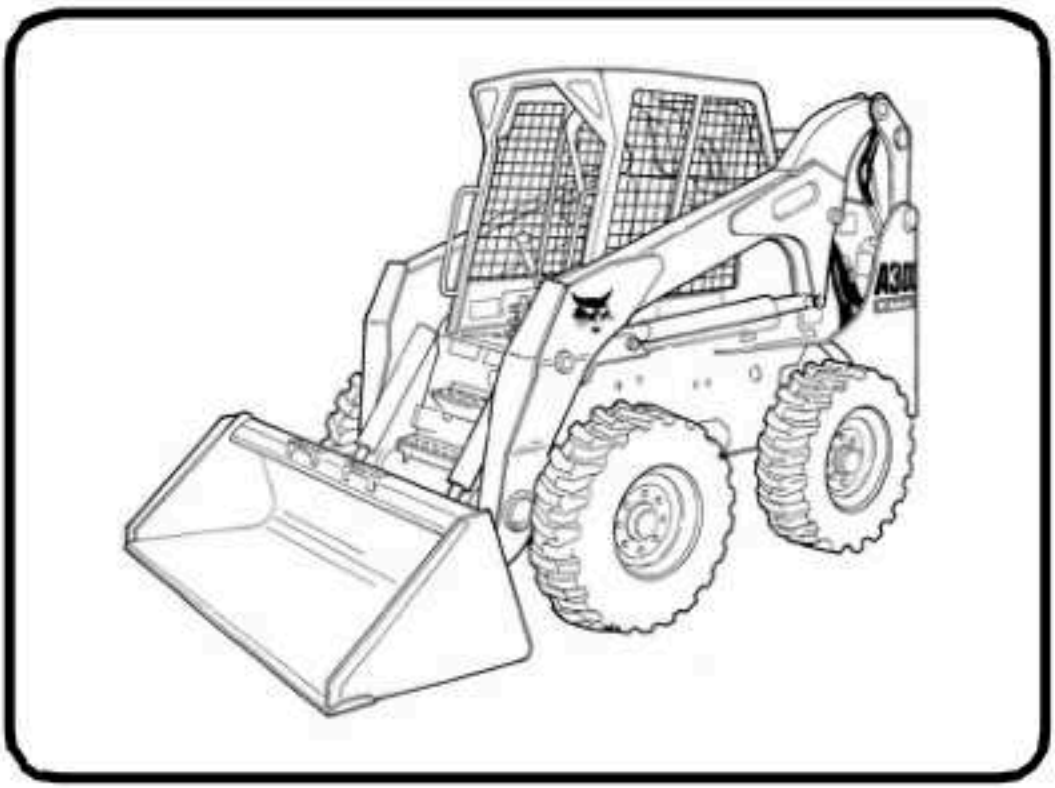
Bobcat®

Service Manual
A300 All-Wheel Steer

S/N A5GW20001 & Above
S/N A5GY20001 & Above



EQUIPPED WITH
BOBCAT INTERLOCK
CONTROL SYSTEM (BICS™)

6987047 (7-08)

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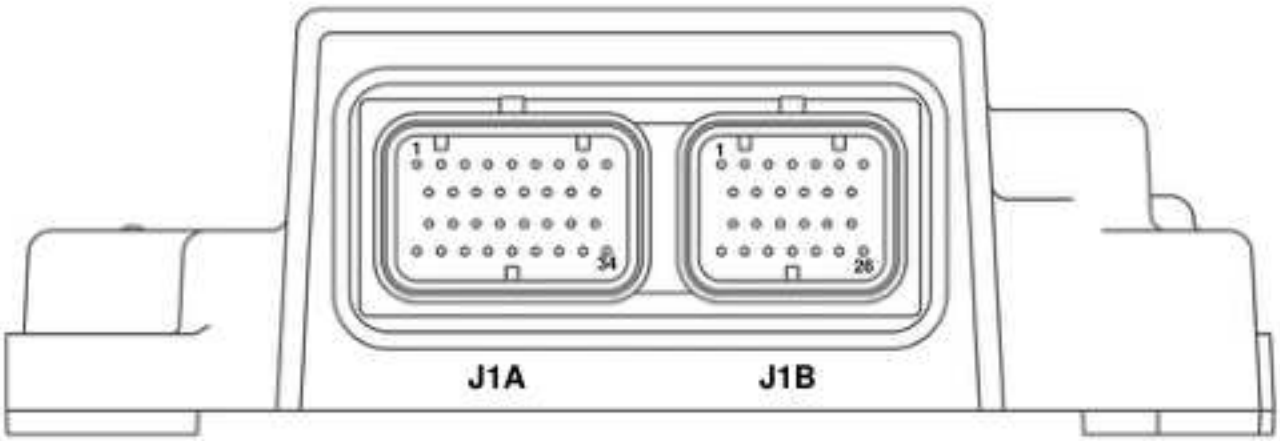
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Connector Identification

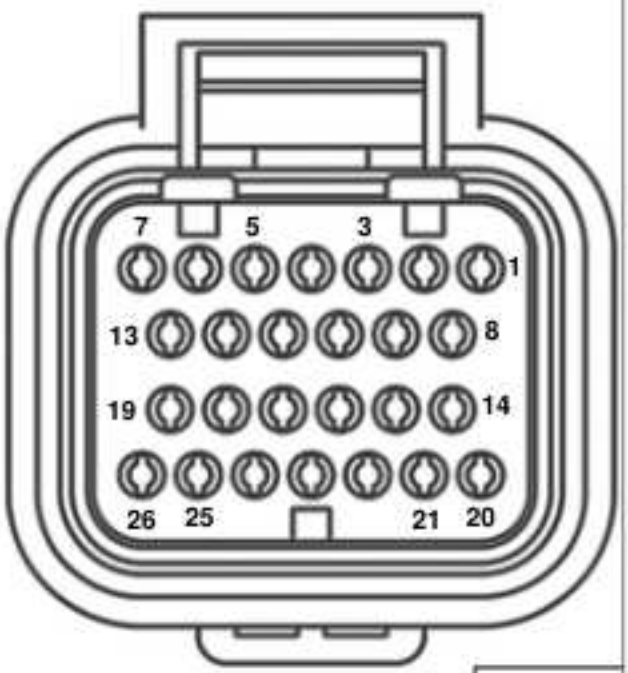
Gateway Controller



Harness Connector View



Harness Connector View



P-76622
P-76623
P-76624

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Specifications (Cont'd)

All dimensions are given in inches. Respective metric dimensions are given in millimeters enclosed by parentheses.

Timing Gear

Timing Gear Backlash	
Crank Gear - Idler Gear	0.00193 - 0.00759 in. (0,049 - 0,193 mm)
Allowable Limit	0.0087 in. (0,22 mm)
Idler Gear - Cam Gear	0.00193 - 0.00744 in. (0,049 - 0,189 mm)
Allowable Limit	0.0087 in. (0,22 mm)
Idle Gear - Injection Pump Gear	0.00119 - 0.00649 in. (0,0300 - 0,165 mm)
Allowable Limit	0.0087 in. (0,22 mm)
Clearance Between Idle Gear Shaft And Idle Gear Bushing	0.0020 - 0.0035 in. (0.050 - 0.091 mm)
Allowable Limit	0.0039 in. (0,10 mm)
Idle Gear Bushing I.D.	1.7727 - 1.7736 in. (45,025 - 45,050 mm)
Idle Gear Shaft O.D.	1.7701 - 1.7706 in. (44,959 - 44,975 mm)
Idle Gear Side Clearance	0.0059 - 0.011 in. (0,15 - 0,30 mm)
Allowable Limit	0.04 in. (0,9 mm)

Cylinder Head

Cylinder Head Surface Flatness - Allowable Limit	0.002 in. (0,05 mm)
Compression Pressure	504 PSI / 250 RPM (34,749 bar / 250 RPM)
Compression Pressure - Allowable Limit	371 PSI / 250 RPM (25,579 bar / 250 RPM)
Compression Ratio	19.0
Variance Among Cylinder - Allowable Limit	10% or less
Firing Order	1-3-4-2

Piston And Piston Ring

Piston Pin Bore I.D.	1.1811 - 1.1816 in. (30,000 - 30,013 mm)
Allowable Limit	1.183 in. (30,05 mm)
Clearance Between Compression Ring 1 and Ring Groove	0.002 - 0.003 in. (0,05 - 0,09 mm)
Allowable Limit	0.0059 in. (0,15 mm)
Clearance Between Compression Ring 2 and Ring Groove	0.00367 - 0.00472 in. (0,0930 - 0,120 mm)
Allowable Limit	0.0079 in. (0,20 mm)
Clearance Between Oil Ring And Ring Groove	0.0008 - 0.0023 in. (0.020 - 0,060 mm)
Allowable Limit	0.0059 in. (0,15 mm)
Ring Gap	
Compression Ring 1	0.012 - 0.017 in. (0,30 - 0,45 mm)
Allowable Limit	0.0492 in. (1,25 mm)
Compression Ring 2	0.012 - 0.017 in. (0,30 - 0,45 mm)
Allowable Limit	0.0492 in. (1,25 mm)
Oil Ring	0.0099 - 0.017 in. (0,25 - 0,45 mm)
Allowable Limit	0.0492 in. (1,25 mm)

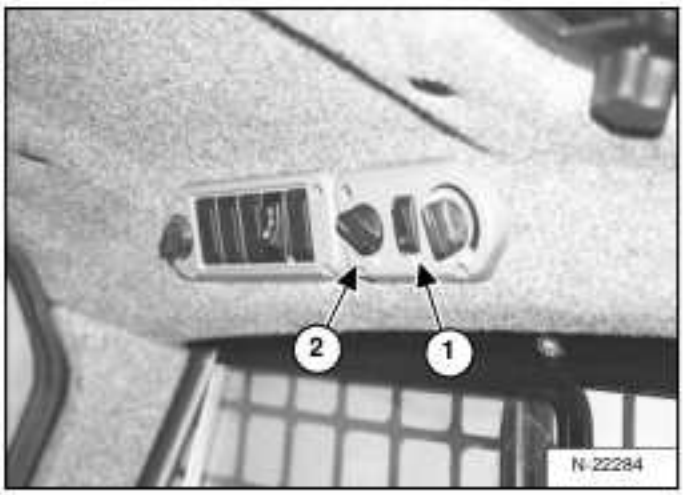
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Electrical System

Check to see if the compressor clutch is engaging.

With an operator in the loader seat and the cab door open, turn the loader key switch to RUN (Standard Panel) OR press the RUN/ENTER Button (Deluxe Panel), without starting the loader.

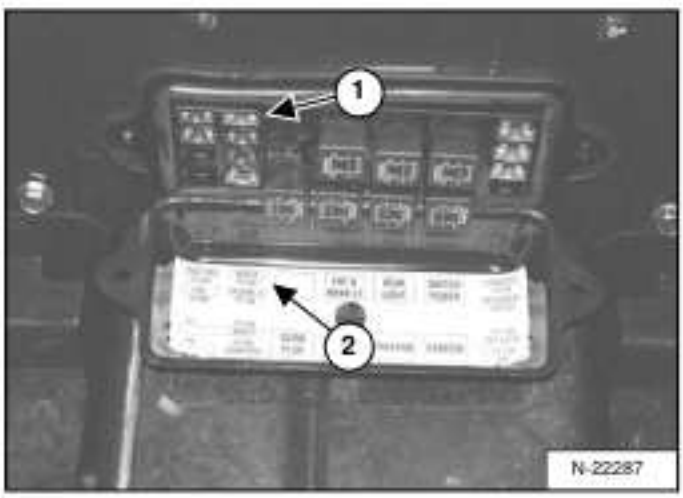
Figure 80-30-4



Push the A/C switch (Item 1) to the ON position. Turn the blower switch (Item 2) **[Figure 80-30-4]** to the first ON position.

The compressor clutch should make a click sound, which indicates the clutch is engaging.

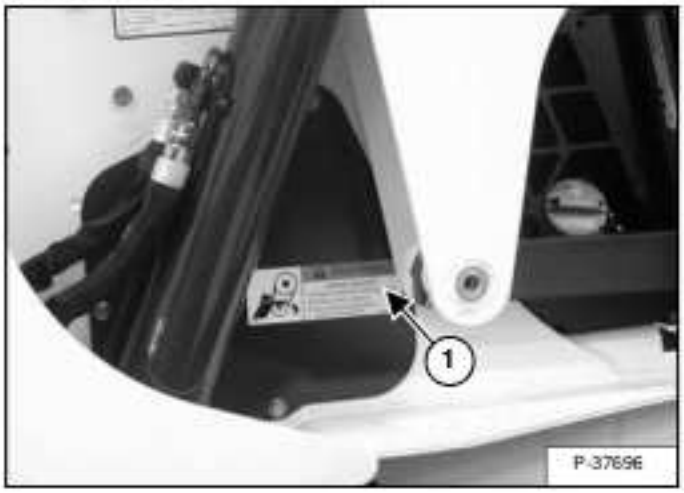
Figure 80-30-5



If the compressor clutch does not engage, check the loader fuse (Item 1) **[Figure 80-30-5]** located on the control panel in the loader cab.

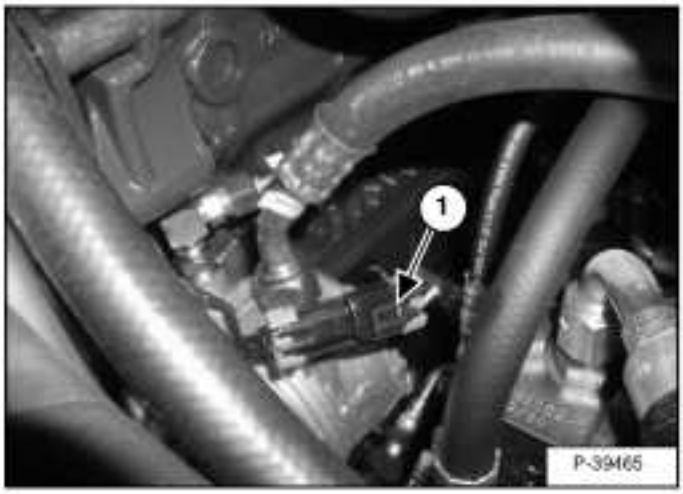
Replace the fuse if burned out.

Figure 80-30-6



Remove the right side access cover (Item 1) **[Figure 80-30-6]**.

Figure 80-30-7



Disconnect the loader harness (Item 1) **[Figure 80-30-7]** from the compressor clutch wire.

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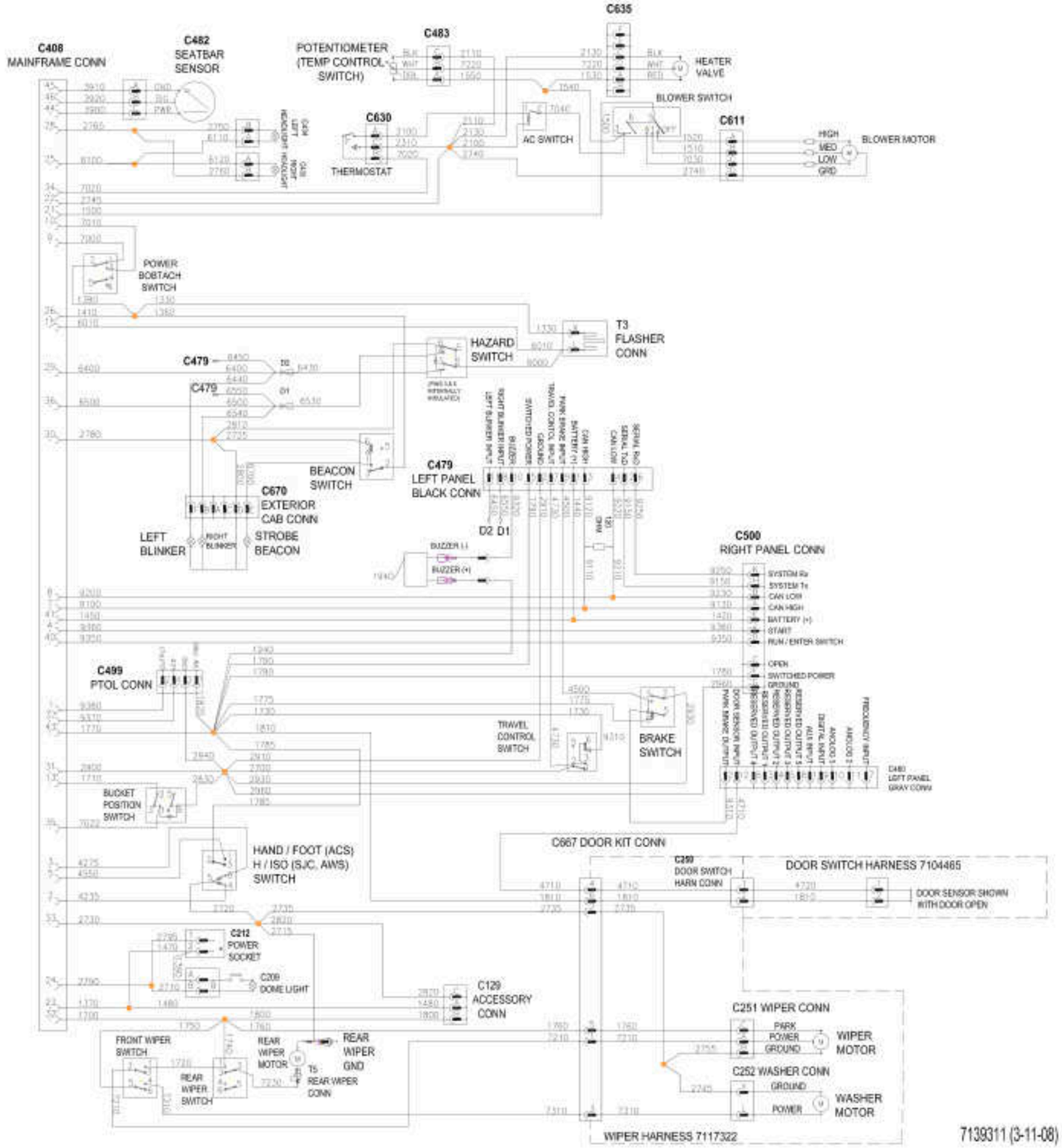
WIRING SCHEMATIC
(DELUXE CAB)
A300 (S/N A5GW20001 AND ABOVE)
(S/N A5GY20001 AND ABOVE)

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