

SCREED HEATING ELEMENT TESTING PROCEDURE

A SCREED'S ABILITY TO HEAT ASPHALT IS CRUCIAL. IF A SCREED IS NOT HEATING PROPERLY IT WILL NOT BE ABLE TO PRODUCE AN ACCEPTABLE MAT. AN OPERATOR SHOULD KEEP AN EYE OUT FOR FAULT CODES THAT MAY APPEAR IN THE GSC GENERATOR CONTROLLER. ANOTHER INDICATION THAT A HEATING ELEMENT IS NOT HEATING PROPERLY IS A POOR MAT OR, MORE LIKELY, A BROKEN MAT. THE FOLLOWING IS A PROCEDURE THAT CAN BE USED TO TEST A SCREED HEATING ELEMENT THAT IS NOT OPERATING PROPERLY.

- 1) BEFORE PERFORMING A PROCEDURE ON ANY PIECE OF EQUIPMENT, BE SURE THAT ALL STEPS ARE TAKEN TO ENSURE SAFETY. MAKE SURE THAT EVERYONE INVOLVED IS A TRAINED PROFESSIONAL AND THAT THEY ARE WEARING ALL THE APPROPRIATE SAFETY EQUIPMENT.
- 2) MAKE SURE THE PAVER IS IN STOP POSITION AND THAT THE PARKING BRAKE IS ENGAGED.
- 3) EXTEND SCREED TO ACCESS ALL HEATING ELEMENTS. (FIGURE 1)

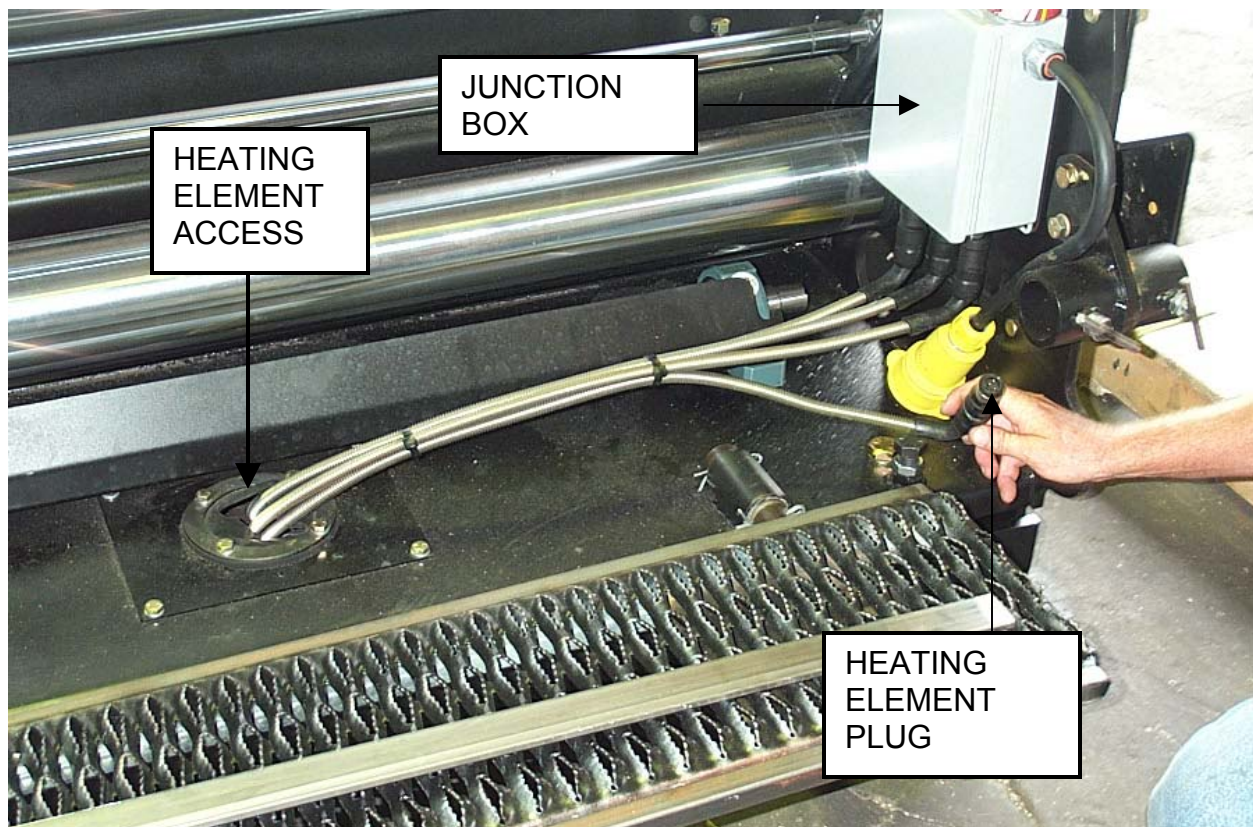


FIGURE 1

SCREED HEATING ELEMENT TESTING PROCEDURE

- 4) TURN IGNITION TO THE OFF POSITION.
- 5) DETERMINE WHICH HEATING ELEMENT IS IN QUESTION.

CAUTION! SCREED AND HEATING ELEMENTS MAY BE HOT!

- 6) FOLLOW THE STAINLESS STEEL WIRE LOOM GOING FROM THE FAULTY HEATING ELEMENT TO THE JUNCTION BOX. (SEE FIGURE 1) DISCONNECT THE LOOM FROM THE JUNCTION BOX.
- 7) USING A MULTIMETER SET TO OHM'S OF RESISTANCE, TOUCH THE BLACK AND RED METER PROBES TO THE TWO SHORT PINS INSIDE THE PLUG AND OBSERVE THE OHM'S READOUT. (SEE FIGURE 2) REFER TO THE OHM'S CHART AT THE END OF THIS PROCEDURE TO DETERMINE THE CORRECT READING.



FIGURE 2

SCREED HEATING ELEMENT TESTING PROCEDURE

- 8) MAKE ANY NECESSARY CHANGES OR ADJUSTMENTS.
- 9) RECHECK THE OHMS AS WAS DONE IN STEP 7.
- 10) RECONNECT ALL WIRING AND CLOSE ALL ELECTRICAL BOXES.
- 11) RESTART THE MACHINE AND START HEATING SCREED TO CHECK FOR PROPER OPERATION.

THE FOLLOWING IS A CHART THAT CAN BE REFERENCED WHEN CHECKING THE RESISTANCE (OHMS) BETWEEN THE 2 POWER LEADS OF A HEATING ELEMENT.

DIFFERENT ELEMENTS IN USE

POWER (watts at 208 vac)	RESISTANCE (OHMS)	LENGTH (INCHES)
300	134 OHMS	12 IN.
600	71 OHMS	24 IN.
1500	27 OHMS	46 IN.
1500	29 OHMS	58 IN.

RESISTANCE VALUES FOR BLADE TYPE CARLSON ELEMENTS

POWER	RESISTANCE (OHMS)
1500w	36-42 OHMS
1700w	33.8 OHMS
2000w	28.8 OHMS
3000w	19.0 OHMS

OIL TUBE WITH INTERNAL ELEMENT

POWER	RESISTANCE (OHMS)
1500w	36-42 OHMS