

INSTRUCTIONS — SCR ELECTRIC VEHICLE CONTROL

1A-BYPASS CONTACTOR CONTROL SYSTEM CURRENT HOLD-OFF, CURRENT DROPOUT, THERMAL HOLD-OFF

1C4484B605 FOR 36-48-VOLT OPERATION IC4484B604 FOR 72-80-VOLT OPERATION

Before any adjustments, servicing, parts replacement or any other act is performed requiring physical contact with the electrical working components or wiring of this equipment, DISCONNECT THE BATTERY AND DISCHARGE CAPACITOR 1C.

FUNCTION

This card will control the 1A contactor in any combination of its control modes:

- (1) 1A CURRENT HOLD-OFF (RH1): This mode will inhibit the closing of the 1A contactor until the SCR current drops to a preset value.
- (2) 1A CURRENT DROPOUT (RH2): This mode will dropout the 1A contactor when the motor current (torque) reaches a preset value.
- (3) 1A THERMAL HOLD-OFF (RH3): This mode will inhibit the closing of the 1A con-

3.75

1.58

Fig. 1

tactor if the SCR panel is in thermal cutback. (Adjust from bottom of card.)

Turning the trimpots fully CW disables the function.

OPERATION AND TUNE-UP

1A CURRENT HOLD-OFF: Connect an ammeter and shunt between battery negative and 1 REC. Turn RH1 fully CCW, RH2 and RH3 fully CW. Jack the drive wheels off the floor. Jumper the brake switch if so equipped.

- (1) Depress the accelerator fully to the floor and operate the brake to get the desired current point.
- (2) Turn RH1 CW until 1A closes. This will always be some value less than full SCR stall. 1A should close at a value less than the set point, but not close above it.



Fig. 2. Typical circuit

The information contained herein is intended to assist truck users and dealers in the servicing of control furnished by the General Electric Company. It does not purport to cover all details or variations in equipment or provide for every possible contingency to be met in connection with installation, operation or maintenance.

Should further information be desired or should particular problems arise which are not covered sufficiently for the purchaser's purposes, the matter should be referred to the truck manufacturer through his normal service channels, not directly to General Electric Company.

1A CURRENT DROPOUT:

- (1) Depress the accelerator fully to the floor and allow 1A to close. With 1A closed, depress the brake until the desired current for dropout is reached.
- (2) Turn RH2 CCW until 1A opens. The control should drop to full SCR stall and 1A should not reclose if current hold-off (RH1) is properly set.

1A THERMAL HOLD-OFF:

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 Turn RH3 full CCW. Disconnect the two leads from the Thermal Protector (T. P.) and connect the proper resistance from Table A to the leads removed from T. P.

TABLE A

Resistance	Speed (SCR Range)
3, 300 Ohm 1/2 W	33%
2, 700 Ohm 1/2 W	46%
2, 200 Ohm 1/2 W	58%
1, 800 Ohm 1/2 W	68%

- (2) Depress the accelerator into 1A switch position. Turn RH1 CW until 1A contactor closes.
- (3) Remove all test equipment and reconnect leads to T. P.

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