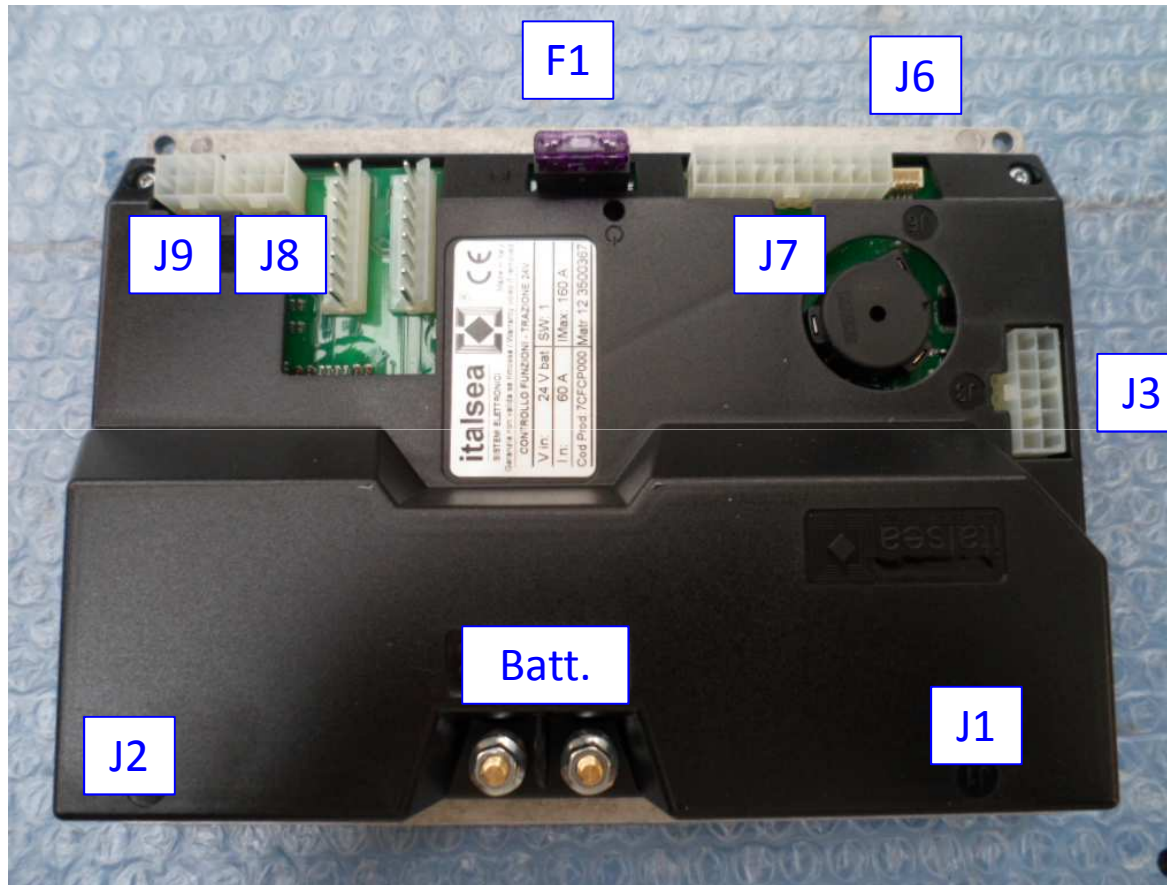


Troubleshooting – MXR

1.) How does the “Control Card” work ?

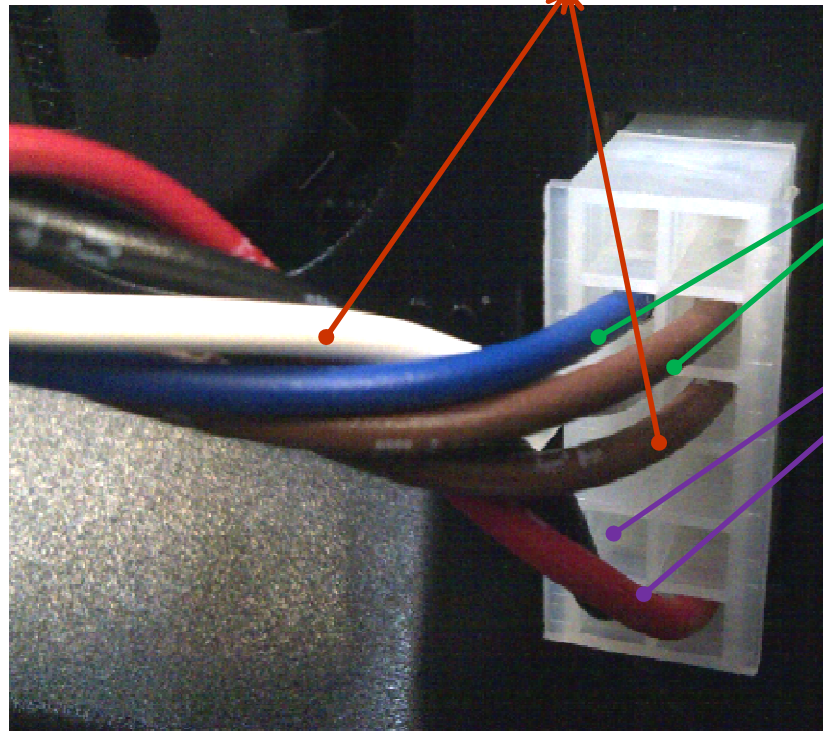


F1	General key fuse (3Amp)
J1	Brushes motor and suction motor
J2	Traction motor
J3	Solenoid valve, electric-brake, flashing
J6	Command buttons from steering wheel.
J7	Microswitches: squeegee, base, speed reduction on bends, backward inhibition, operator on board, drive control, potentiometer, battery charger.
J8/J9	Not used
Batt.	Battery connections

Troubleshooting – MXR

2.) What are the input signals in the J3 connector (control card) ?

1	7
	
	
	
	
	



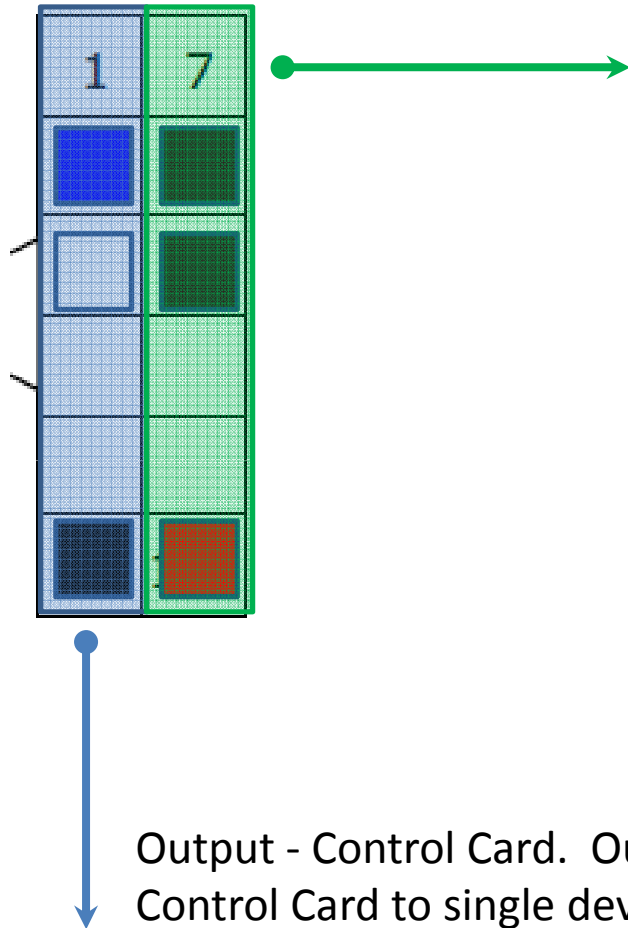
Solenoid Valve

Electronic Brake

Winking Light

J3-2	Out +24V
J3-3	Out +24V
J3-6	Out +24V
J3-8	Out Elect.Brake
J3-9	Out Solenoide Valve
J3-12	Out 0V

Troubleshooting – MXR



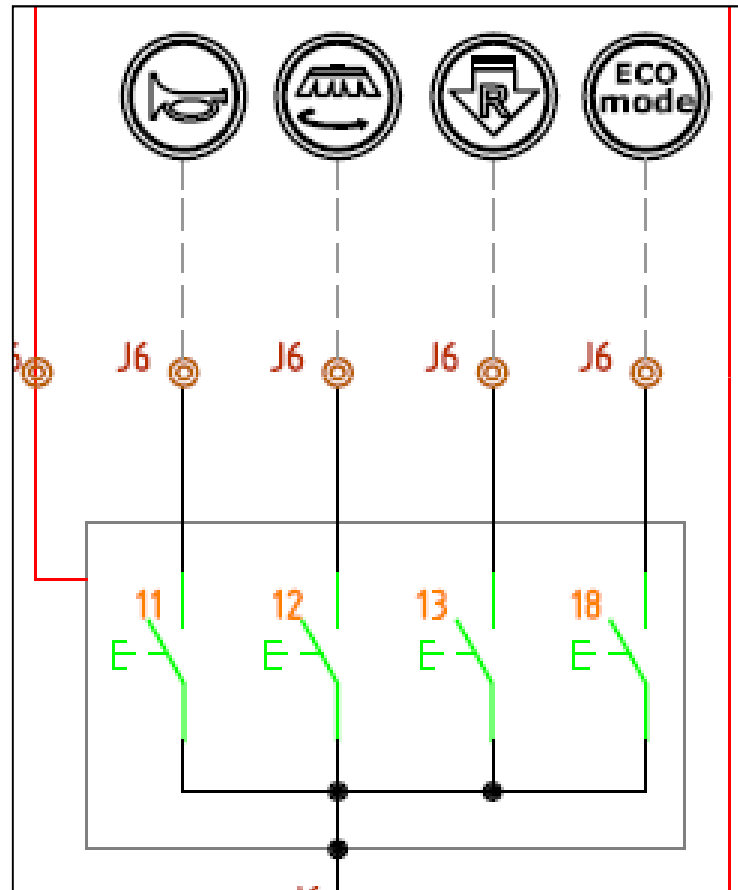
Input - Control Card. Input signals from single devices (Electronic brake, Solenoid Valve, Winking Light) to Control card.

Output - Control Card. Output signals from Control Card to single devices (Electronic brake, Solenoid Valve, Winking Light).

J3-2	Out +24V
J3-3	Out +24V
J3-6	Out +24V
J3-8	Out Elect.Brake
J3-9	Out Solenoide Valve
J3-12	Out Winking Light 0V

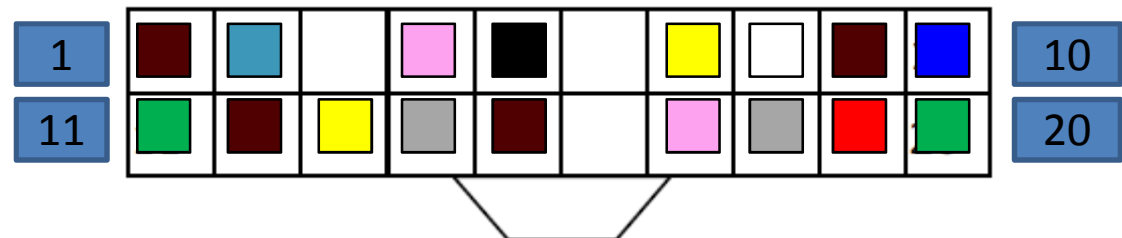
Troubleshooting – MXR

3.) What are the input signals in the J6 connector (control card) ?



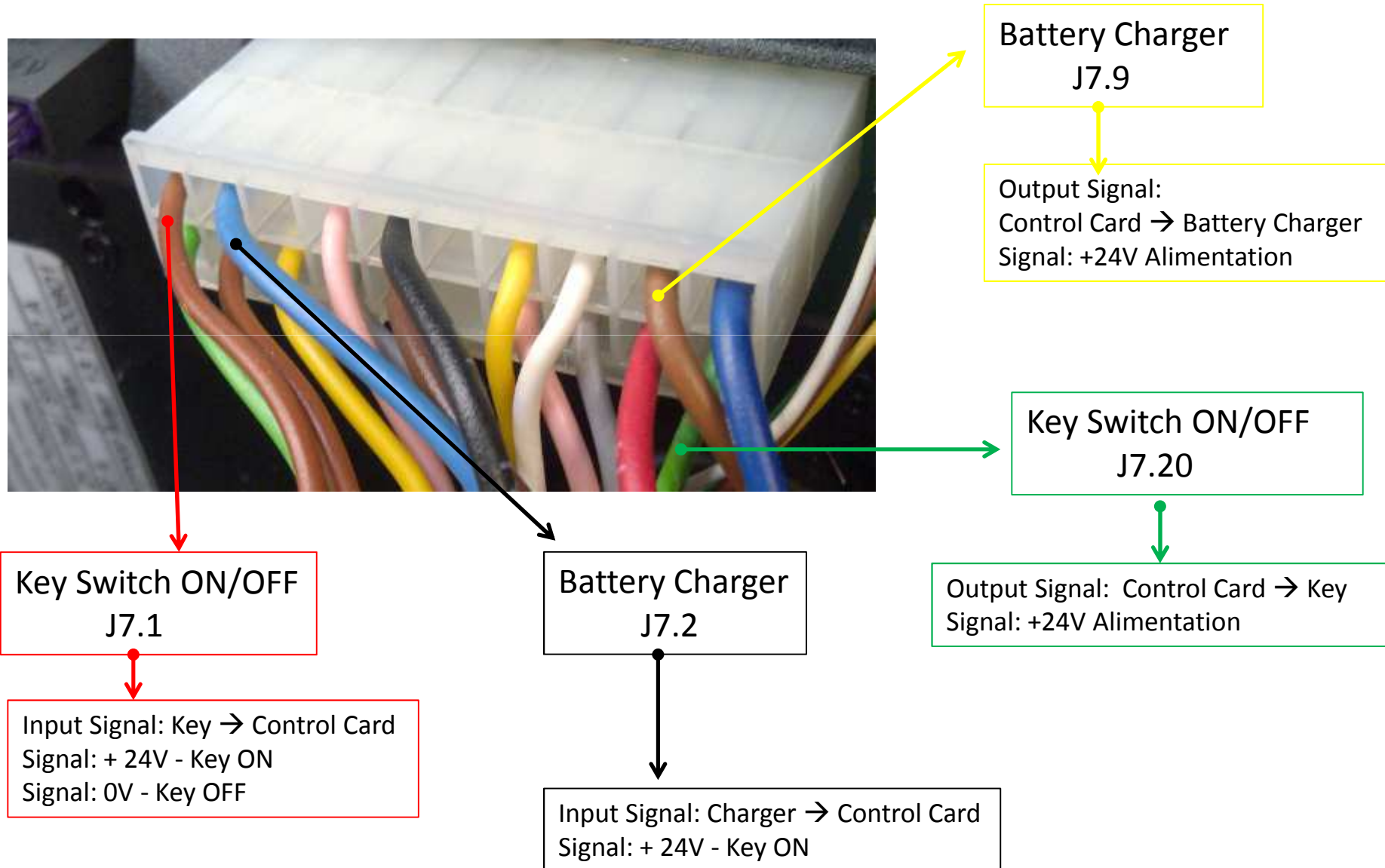
Troubleshooting – MXR

4.) What are the input/output signals in the J7 connector (control card) ?



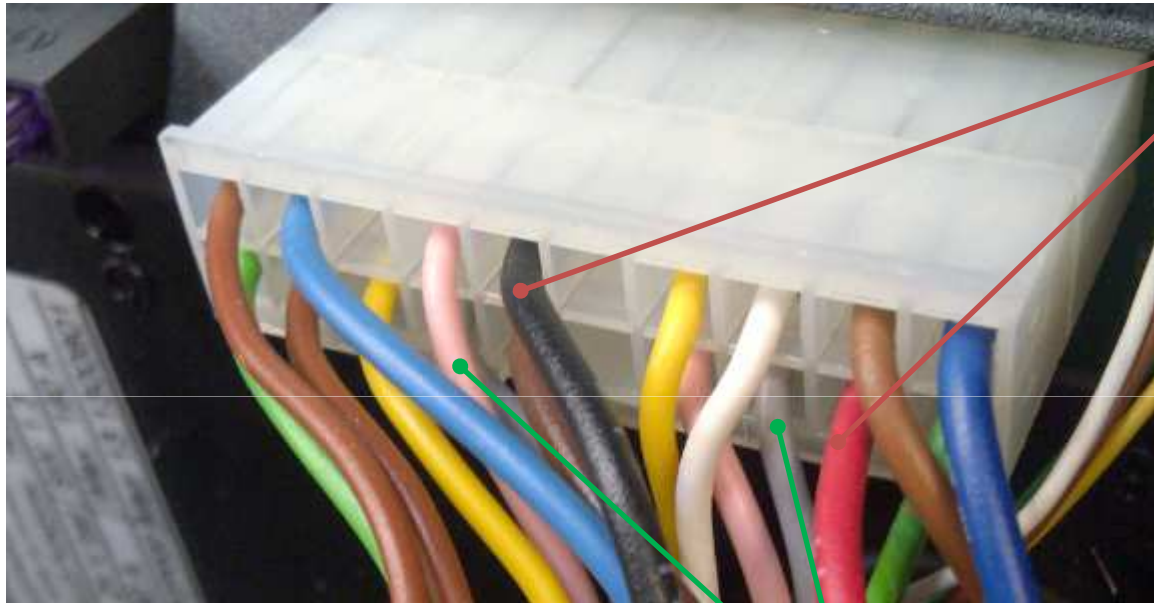
Troubleshooting – MXR

4.) What are the input/output signals in the J7 connector (control card) ?



Troubleshooting – MXR

4.) What are the input/output signals in the J7 connector (control card) ?



Micro “Speed Reduction”

J7.5

J7.19

Input Signal:
Micro → Control Card
Signal : 0V - Normal Drive
Signal : + 24Volt - while steering

Output Signal:
Control Card → Micro
Signal: +24V Alimentation

Micro “Drive Control”

J7.4

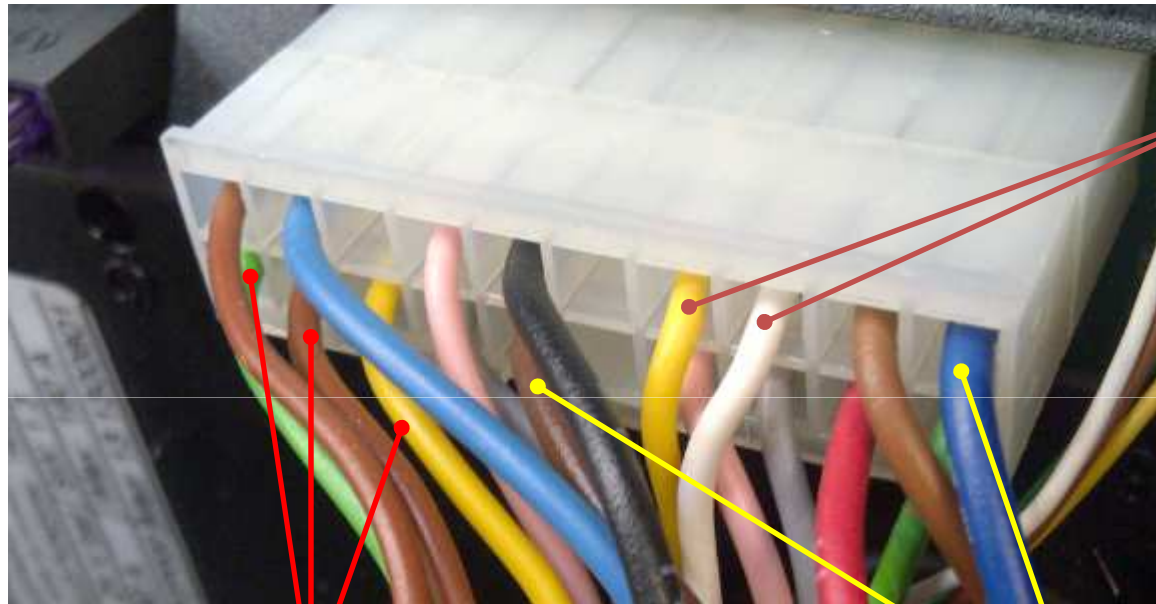
J7.18

Input Signal: Micro → Control Card
Signal: + 24V - Key ON AND Pedal ON

Output Signal:
Control Card → Micro
Signal: +24V Alimentation

Troubleshooting – MXR

4.) What are the input/output signals in the J7 connector (control card) ?



Micro “Limit Switch Squeegee”

J7.7

J7.8

Input Signal:

Micro → Control Card

Signal : 0V - squeegee lever UP

Signal : + 24Volt - squeegee lever DOWN

Output Signal:

Control Card → Micro

Signal: +24V Alimentation

Potentiometer

J7.11

J7.12

J7.13

OUT +24V

IN

OUT -24V

Safety Switch “Operator on Board”

J7.10

J7.15

Output Signal:

Control Card → Switich

Signal: +24V Alimentation

Input Signal:

Micro → Control Card

Signal : 0V - micro not pressed

Signal : + 24Volt - micro pressed
(operator on board)

Troubleshooting – MXR

4.) What are the input/output signals in the J7 connector (control card) ?

