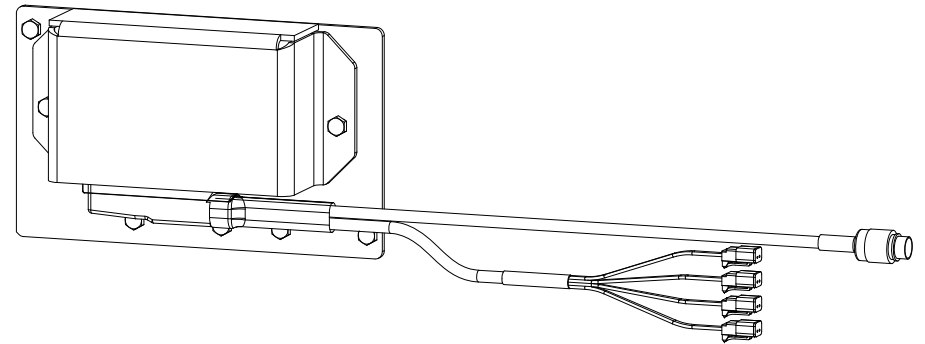


ELC7

Bobcat 7 Pin CanBus Electric Control System



Model Number ELC7.

Phone: 320-393-7080

08/10/15

ELC7

Features of Virnig Mfg. Inc. ELC7 Bobcat 7 Pin CanBus Electric Control System include:

- Works with Standard (hand/foot) control, Selective Joystick control, Advanced Joystick Control and Toolcats.
- Easy installation on Virnig Mfg. Inc. Snow Blowers, Angle Brooms (with hydraulic angle), Power Rakes (with hydraulic angle), Dozer Blades and Hydraulic Snow Blade/Pusher Combos.
- Control system integrated onto attachment.
- Standard wire harness of attachment not used with ELC7 Control System.

Installation

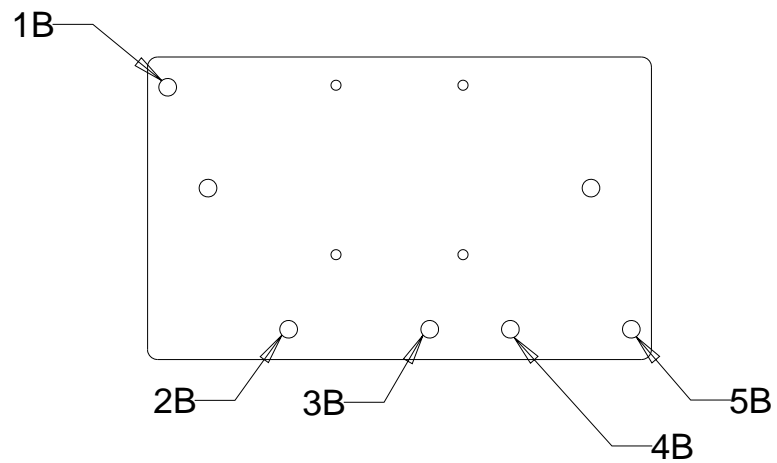
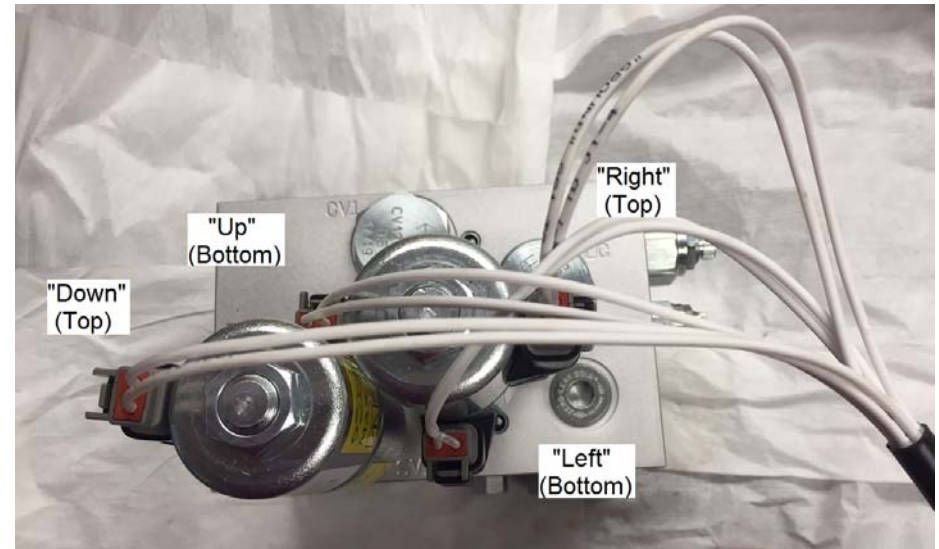


Figure 1. Mounting Hole Locations

Snow Blower



Wire Harness Installation

Standard button position/movement

- Left Stick, Inner Toggle, Up Position – Chute Rotates Left
- Left Stick, Inner Toggle, Down Position – Chute Rotates Right
- Right Stick, Inner Toggle, Up Position – Deflector Up
- Right Stick, Inner Toggle, Down Position – Deflector Down

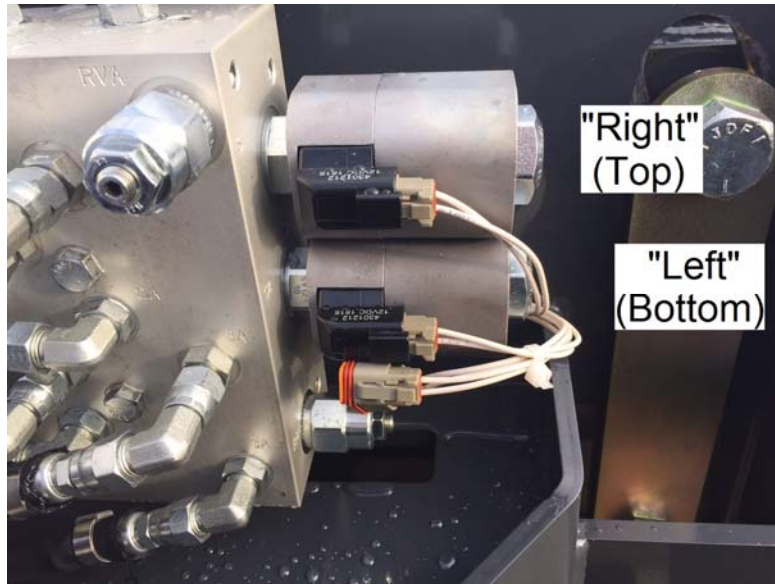
Toolcat, same movements using left toggle and right toggle.

To install ELC7 on Snow Blowers, use mount hole locations 1B and 5B, see Figure 1.

Mount using qty. 2 each of part numbers 7849PP and 6140PP (qty. 2 of 7850PP NOT used).

Button Position/Output

Hydraulic Snow Blade/Pusher



- Left Stick, Inner Toggle, Up Position – Power to Wire Labeled “Left”
- Left Stick, Inner Toggle, Down Position – Power to Wire Labeled “Right”
- Right Stick, Inner Toggle, Up Position – Power to Wire Labeled “Up”
- Right Stick, Inner Toggle, Down Position – Power to Wire Labeled “Down”

Toolcat, same outputs using left toggle and right toggle.

If attachment movement does not match preferred toggle and or toggle position, plugs of harness can be re-positioned. Each plug is attached by two wires, each has a wire labeled “Ground”. The other wire is labeled either “Left”, “Right”, “Up” or “Down”.

More information for attachment control can be found in the attachment’s manual. Please call factory at 320-393-7080 with any questions.

Wire Harness Installation

Standard button position/movement

- Left Stick, Inner Toggle, Up Position – Left Wing
- Left Stick, Inner Toggle, Down Position – Right Wing
- Right Stick, Inner Toggle, Up Position – Not Used
- Right Stick, Inner Toggle, Down Position – Not Used

Toolcat, same movements using left toggle.

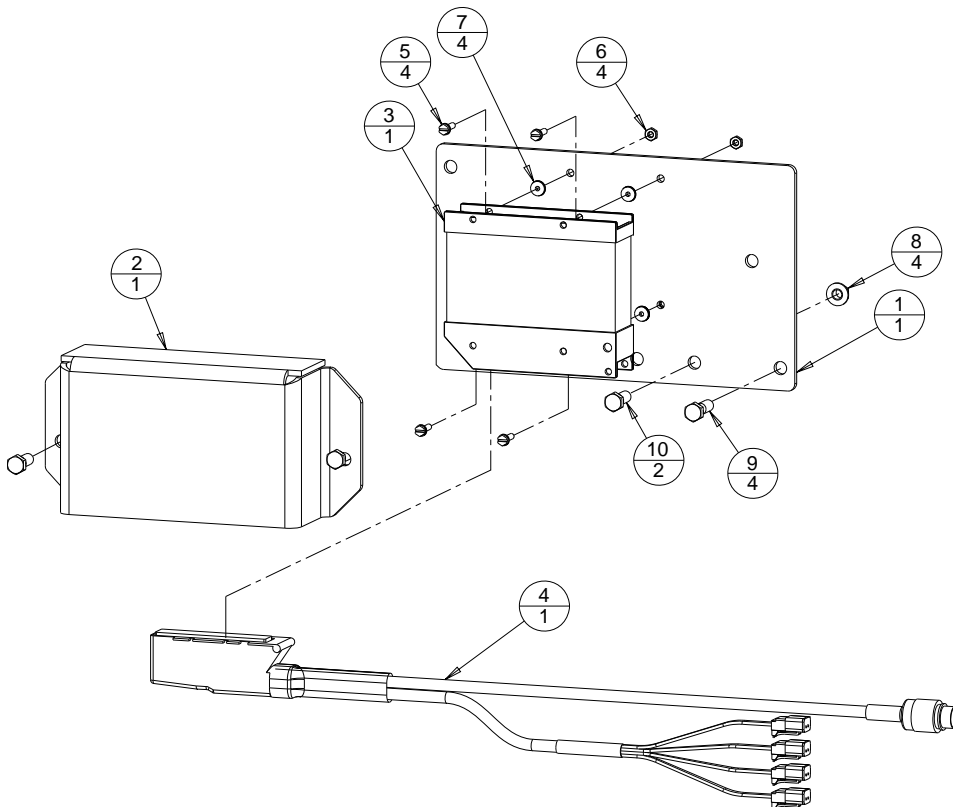
To install ELC7 on Hydraulic Snow Blade/Pusher Combos, use mount hole locations 2B and 4B, see Figure 1.

Mount using qty. 2 each of part numbers 7849PP and 6140PP (qty. 2 of 7850PP NOT used).

ELC7 Parts List

ITEM	PART NO.	QTY	DESCRIPTION
1	9830VP	1	MOUNT PLATE ELC7 CONTROL
2	10003VP	1	COVER ELC7 CONTROL
3	10004PP	1	ELC7 CONTROL UNIT
4	10005PP	1	HARNESS ELC7 CONTROL
5	10014PP	4	#10-32 X 3/4" LG MACHINE SCREW
6	10015PP	4	#10-32 REVERSE LOCK NUT
7	10016PP	4	#10 BONDED SEAL WASHER
8	6140PP	4	3/8"-16 TOP LOCK FLANGE NUT
9	7849PP	4	3/8"-16 X 1" LG HHCS
10	7850PP	2	3/8"-16 X 1 1/4" LG HHCS

ELC7 Assembly



Angle Broom



Wire Harness Installation

Standard button position/movement

- Left Stick, Inner Toggle, Up Position – Angle Left
- Left Stick, Inner Toggle, Down Position – Angle Right
- Right Stick, Inner Toggle, Up Position – Not Used
- Right Stick, Inner Toggle, Down Position – Not Used

Toolcat, same movements using left toggle.

To install ELC7 on Angle Brooms, use mount hole locations 2B and 3B, see Figure 1.

Remove 2 upper bolts holding hydraulic manifold onto broom. Mount control by re-using 3/8" lock washers and qty. 2 of part number 7850PP. (qty. 2 of 7849PP and qty. 2 of 6140PP NOT used).

Power Rake



Wire Harness Installation

Standard button position/movement

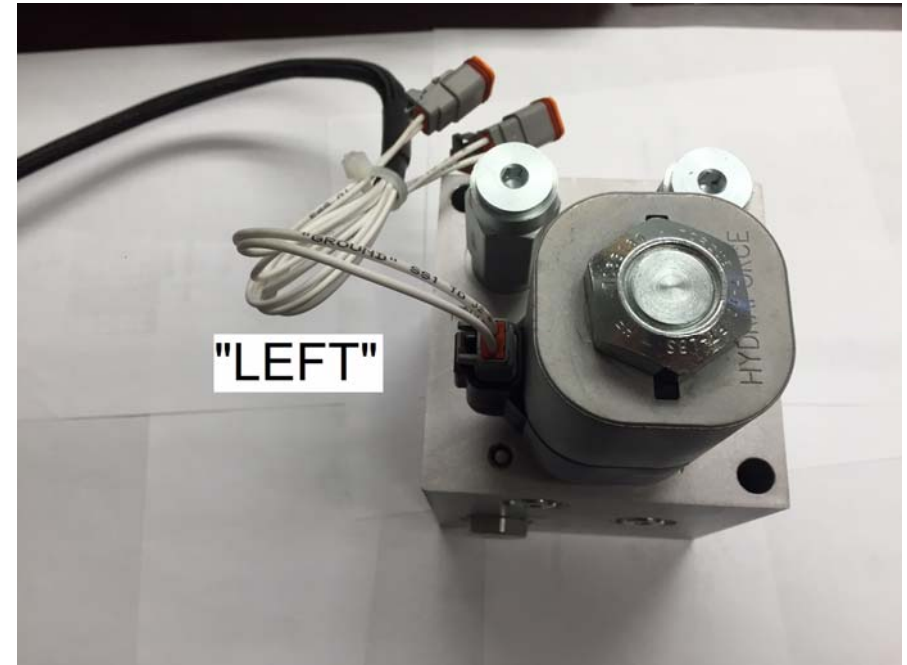
- Left Stick, Inner Toggle, Up Position – Angle Left
- Left Stick, Inner Toggle, Down Position – Angle Right
- Right Stick, Inner Toggle, Up Position – Not Used
- Right Stick, Inner Toggle, Down Position – Not Used

Toolcat, same movements using left toggle.

To install ELC7 on Power Rakes, use mount hole locations 2B and 4B, see Figure 1.

Mount using qty. 2 each of part numbers 7849PP and 6140PP (qty. 2 of 7850PP NOT used).

Dozer Blade



Wire Harness Installation

Standard button position/movement

- Left Stick, Inner Toggle, Up Position – Blade Tilt
- Left Stick, Inner Toggle, Down Position – Not Used
- Right Stick, Inner Toggle, Up Position – Not Used
- Right Stick, Inner Toggle, Down Position – Not Used

Toolcat, same movements using left toggle.

To install ELC7 on Dozer Blades, use mount hole locations 2B and 4B, see Figure 1.

Mount using qty. 2 each of part numbers 7849PP and 6140PP (qty. 2 of 7850PP NOT used).