

Section/Rate Control Kit Installation Guide

Kit: SECT RATE CTRL Spra-Coupe 3000/4000
P/N 911-0004-000

Fits Spra-Coupe 3000/4000 Sprayers:

Read and Follow Safety Messages

- In these instructions, you will see the heading WARNING and the safety alert symbol . They indicate a hazardous situation that, if not avoided, could result in death or serious injury. The safety messages provide information to identify a hazard associated with potential injury.
- Before installing, operating, or performing maintenance or service on any part of the system, read and understand this installation guide.
- Do not allow anyone to operate without instruction.
- Keep these instructions and all related safety information with the manuals for your machine and other implements.



If you have questions or need assistance, contact your local dealer or distributor.

Overview

A series of equipment-specific kits has been developed to enable the AC110 section/rate controller to interface with your product rate controller. This kit contains the components and instructions to connect an AC110 with the equipment models indicated above.

Please read this manual thoroughly before beginning the installation.

Kit Contents

Unpack this kit and identify the required parts as shown. Kit items are referenced A, B, C etc. and those references are used in the installation steps and pictures.

REF	PART NUMBER	QTY	DESCRIPTION	PHOTOGRAPH
A	054-0156-000#	1	Interface cable	
B	750-5006-000#	1	Section/rate controller (AC110)	

Kit Contents *(continued)*

REF	PART NUMBER	QTY	DESCRIPTION	PHOTOGRAPH
C	054-0144-000#	1	Power cable	
D	054-0185-000#	1	Power switch cable	
E	051-0067-005#	1	Input/output splitter ('Y') cable	
F	051-0288-000#	1	CAN loop back connector (terminator)	
G	405-0018	10	Female spade heat shrink covers	
H	677-2001	20	Tie strap, 11" heavy duty	

Connections and Installation

1. Standard AC110 connections.

NOTE:

The text and figures in this section detail the connections that you will need to make. Exactly when you make the connections depends on individual installations and your working preferences. See “Appendix - AC110 Cables and Connections”, page 7.

- a. Install the loop back connector (terminator) **F** in the appropriate connector on interface cable **A** then connect **A** (main plug and power connectors) to AC110 **B** (red to + positive, black to - negative). Do not refit terminal nuts yet.

Install power cable **C** (‘non-fused’ end) on AC110 **B**. Refit the terminal nuts and tighten the power connections (Figure 1a).

- b. Disconnect the console cable from the back of the existing rate controller (Figure 1b-i). Connect the console cable to interface cable **A** (Figure 1b-ii).

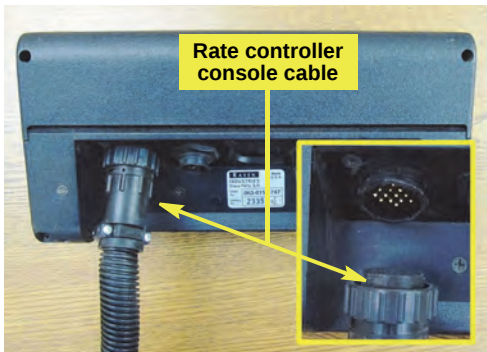


Figure 1b-i: Disconnecting controller console cable

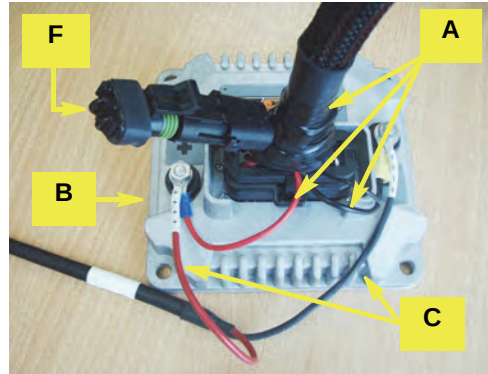


Figure 1a: Connections at AC110

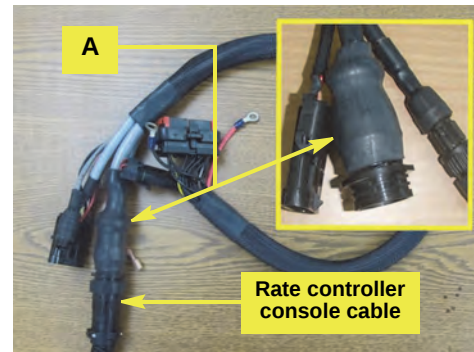


Figure 1b-ii: Reconnecting controller console cable

- c. Using the splitter (‘Y’) cable **E** (but see note following), tie into the existing CAN connection. For example, connect **E** between the 7-pin CAN connector labeled “ECU” on the Outback MAX cable (with the white connector) and the 7-pin CAN connector on interface cable **A**.

NOTE:

You can use splitter cable **E** as an extension cable between interface cable **A** and the CAN connection “ECU” on the (white connector) Outback MAX cable. You can also use cable **E** to connect the switchbox if installed (Figure 1c)

- d. Connect power switch cable **D** to the 4-pin connector on interface cable **A** (Figure 1d).

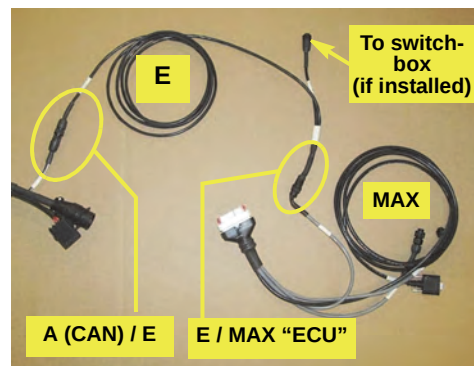


Figure 1c: Splitter cable connections

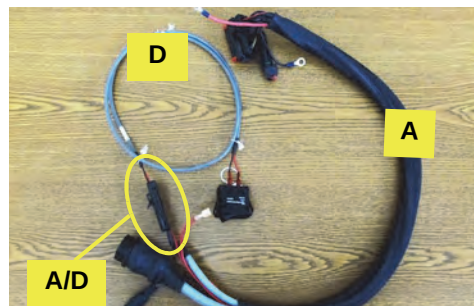


Figure 1d: Connecting the power switch cable

2. Installing the AC110.

- a. Remove the four screws securing the boom switch control panel on the right console (Figure 2).

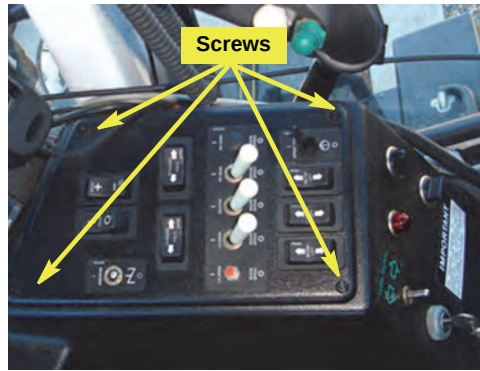


Figure 2a: Boom switch control panel

- b. Raise the boom switch panel and locate the four connections for each switch (Figure 2b).

NOTE:

1. Each boom switch will have two signal wires (yellow), a ground wire (white) and a power wire (orange).

2. One of the signal wires will have an additional wire sharing the same spade connection. This is the positive boom signal connection.

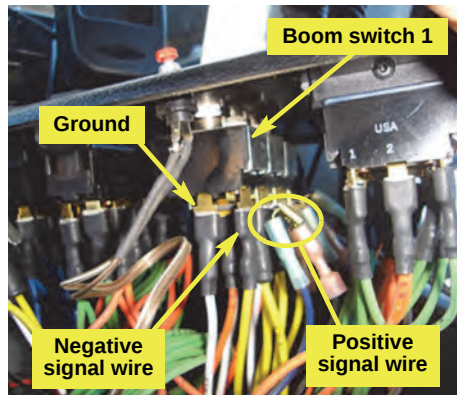


Figure 2b: Boom switch wiring

- c. Route the two small ends (wires with spade connectors) of interface cable A from the floor up through the console to the switch panel (Figure 2c).

NOTE:

The bundle of wires with male spades is for connections to existing Spra-Coupe signal wires. The smaller/longer bundle of wires—with female spades—is for connection to the Spra-Coupe boom switch terminals.



Figure 2c: Interface cable routing

- d. Disconnect the positive and negative boom signal wires from boom switch 1 (Figure 2d). Connect the signal wires to the two corresponding wires of the interface cable A according to Table 1 (3-boom system) or Table 2 (5-boom system) on page 5. See also “Appendix - AC110 Cables and Connections” on page 7.



After connecting the interface cable to the positive signal wire, make sure you properly insulate the electrical connectors.

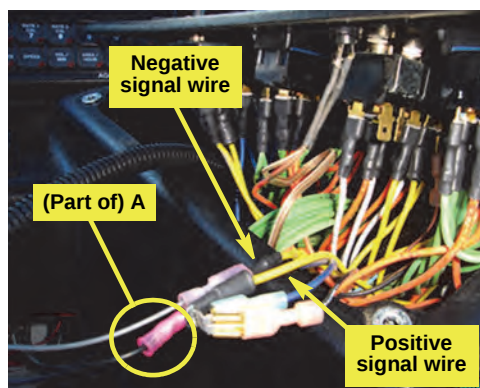


Figure 2d: Boom 1 signal wire connections

Table 1: 3-Boom System

Boom #	AC110 Wire color	Shielded	Machine Wire #
1+	Purple	No	505B
1-	White/Purple	Yes	506B
2+	Brown	No	507B
2-	White/Brown	Yes	508B
3+	Orange	No	509B
3-	White/Orange	Yes	510B
4+	Blue	No	No Connection
4-	Blue/White	Yes	No Connection
5+	White	No	No Connection
5-	White/Black	Yes	No Connection

- e. Disconnect the white ground wire from the boom switch—the system will be grounded through the AC110 interface cable A.



After detaching the white ground wire, make sure you properly insulate the tips of the female connectors.

- f. Connect the AC110 boom 1 switch wire to the positive signal terminal of the Spra-Coupe boom 1 switch (Figure 2e). See Table 3 following for the appropriate connections. See also “Appendix - AC110 Cables and Connections” on page 7.

Table 3: AC110 Switch Wire Connections

AC110 Wire color	Boom # 3-Boom System	Boom # 5-Boom System
Purple	1	1
Brown	2	2
Orange	3	3
Blue	No Connection	4
White	No Connection	5

- g. Repeat steps d to f for the remaining boom switches (Figure 2f).



If you have five boom switches, remove the spade covers on the AC110 interface cable A before connecting them to the signal wires.

Table 2: 5-Boom System

Boom #	AC110 Wire color	Shielded	Machine Wire #
1+	Purple	No	503B
1-	White/Purple	Yes	504B
2+	Brown	No	505B
2-	White/Brown	Yes	506B
3+	Orange	No	507B
3-	White/Orange	Yes	508B
4+	Blue	No	509B
4-	Blue/White	Yes	510B
5+	White	No	511B
5-	White/Black	Yes	512B

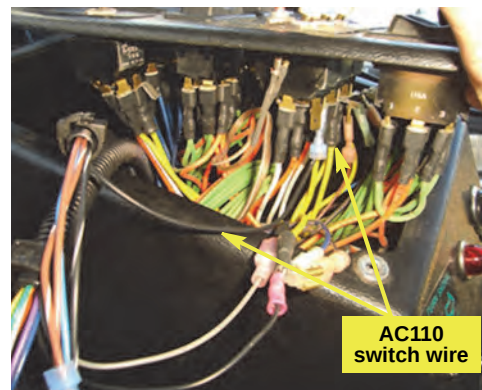


Figure 2e: AC110 switch wire

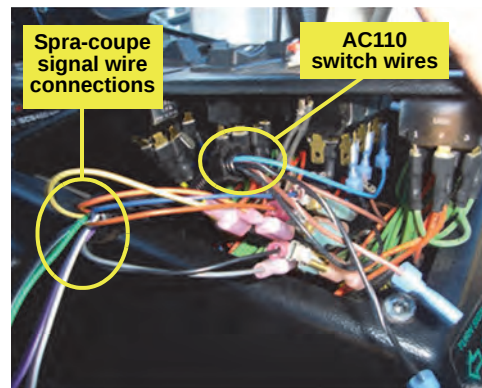


Figure 2f: Boom switch wiring complete

- h. Using spade covers **G**, insulate the two blank terminals on each boom switch (Figure 2g).
- i. Locate the joystick wiring harness at the bottom front area of the cab console. The end of this harness will branch into several 2-pin weather pack connections.

Identify the 2-pin connector that carries the master spray/hold connection. This connection will typically have one blue and one white wire entering and two yellow wires exiting (Figure 2h-i).

- j. Disconnect the master spray/hold connection and insert the 'T' connector from interface cable **A** (Figure 2h-ii).

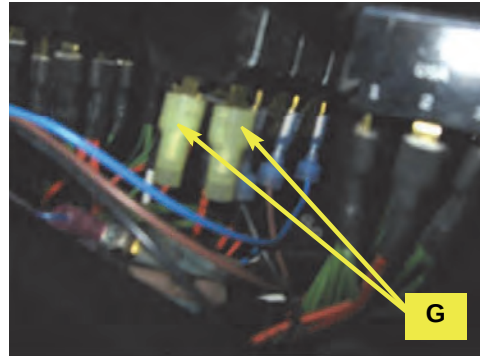


Figure 2g: Boom switch connectors insulated

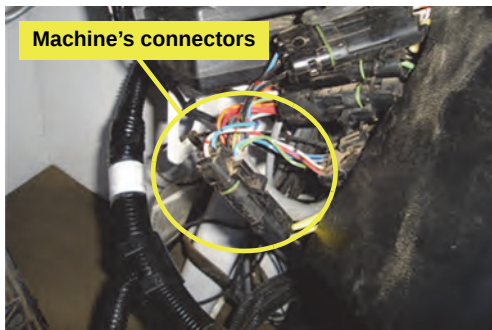


Figure 2h-i: Master spray/hold connection

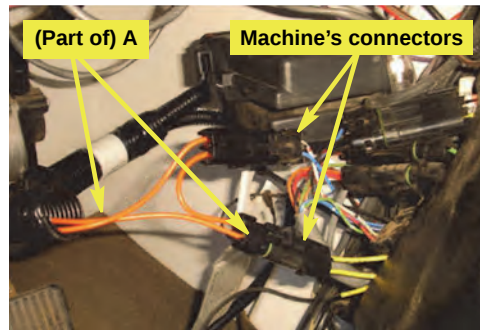


Figure 2h-ii: Master spray/hold 'T' installed

- k. Mount AC110 **B** suitably in the cab using tie straps **H** or screws (not supplied).

NOTE:

*If your AC110 connections are not yet complete, refer to 1. **Standard AC110 connections** on page 3.*

- l. Connect the fused end of power cable **C** to the machine's battery.
- m. Secure all cabling with tie straps **H**.

© AgJunction Inc. (2014). All rights reserved.

7

