



How to Attach Butler Robotics to an A-1

In order to accomodate all machine types we use universal parts bags, not all parts will be used in every installation.

Bag #
Cables

Contents

Vary by machine type

Picture



X1

White Belt, eye bolts, belt brackets



Y1

White Belt, eye bolts, belt brackets



Z1

Stylus, zip ties, anchor



Z3

Motor Pulley Cover



X4

White Belt Brackets



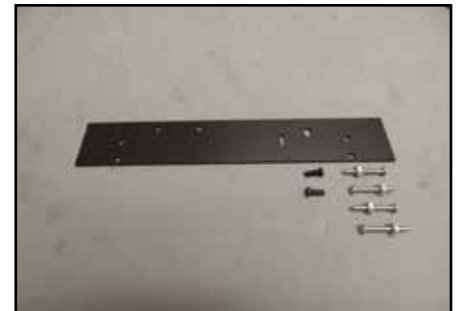
Y7

Black Belt, Carriage Bracket



M4

Front Motor Box Bracket



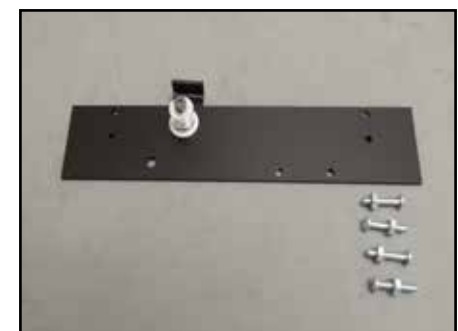
D2

Display Bracket



I5

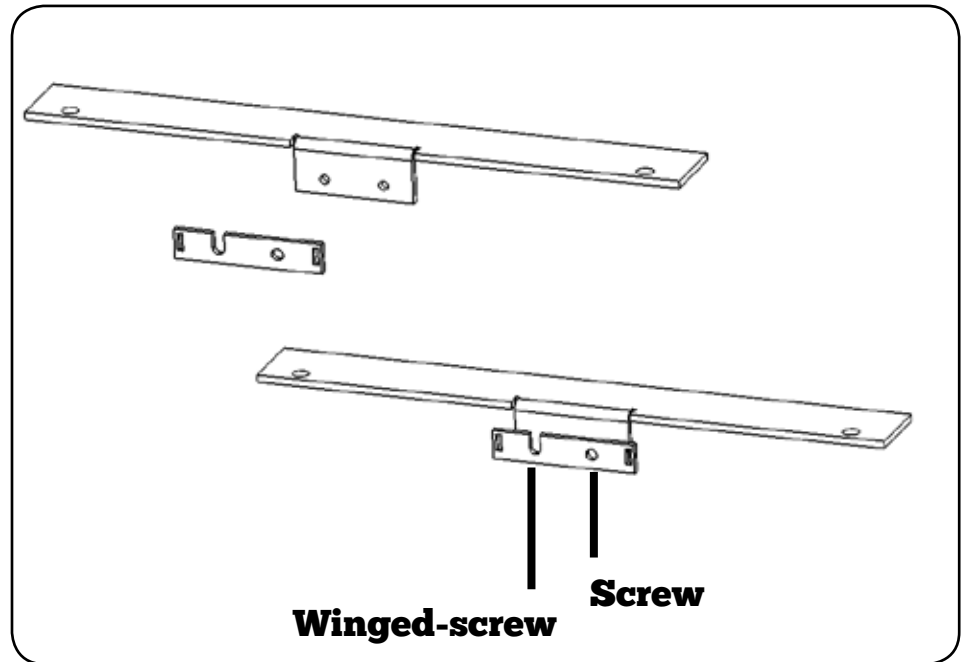
Rear Idle Bracket



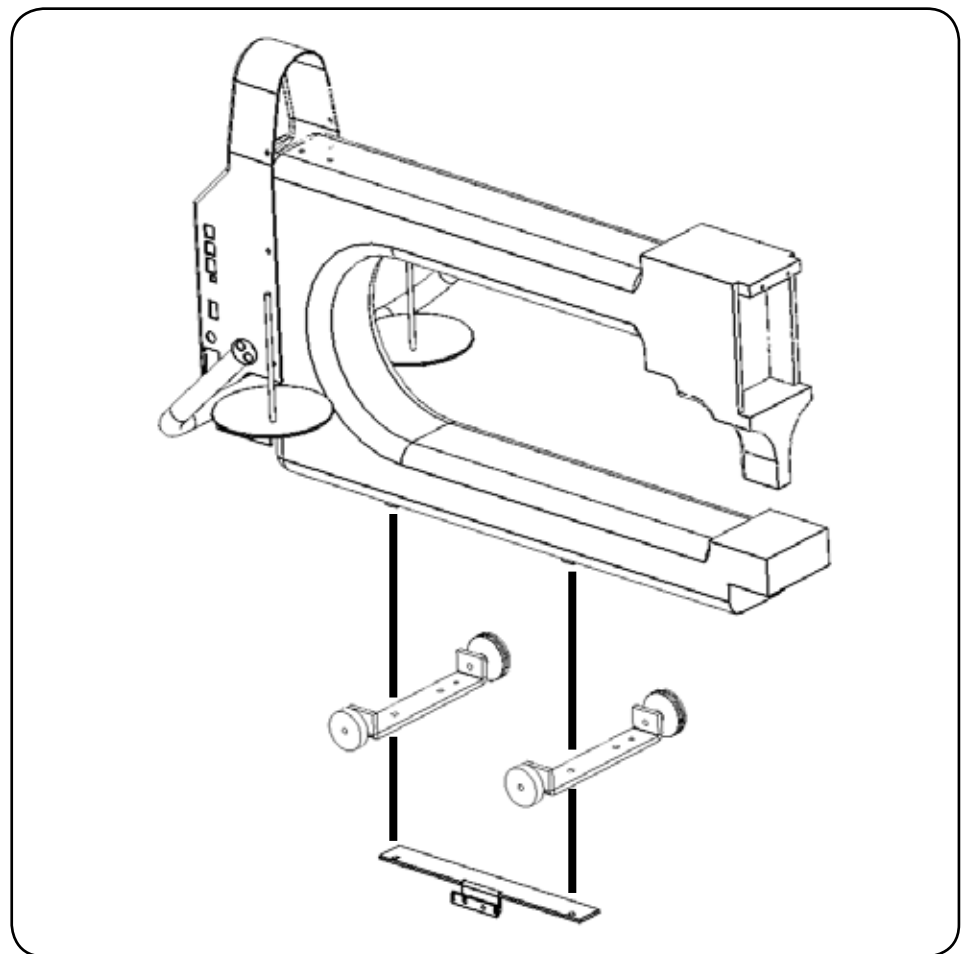
Install Belt Bracket

- 1** Attach the black belt bracket to the carriage bracket using the provided screws.

(Bag# 35)

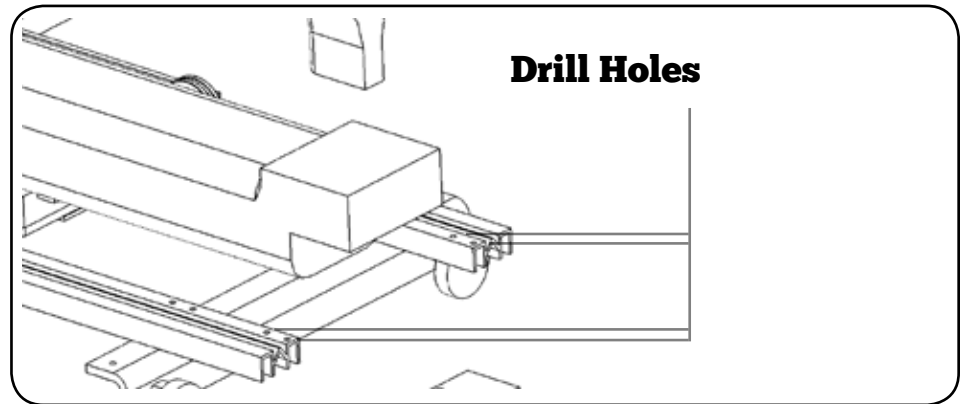


- 2** Remove the carriage wheel screws, line up the carriage bracket with the carriage wheels, and reattach wheels and bracket to the machine using the original carriage screws.



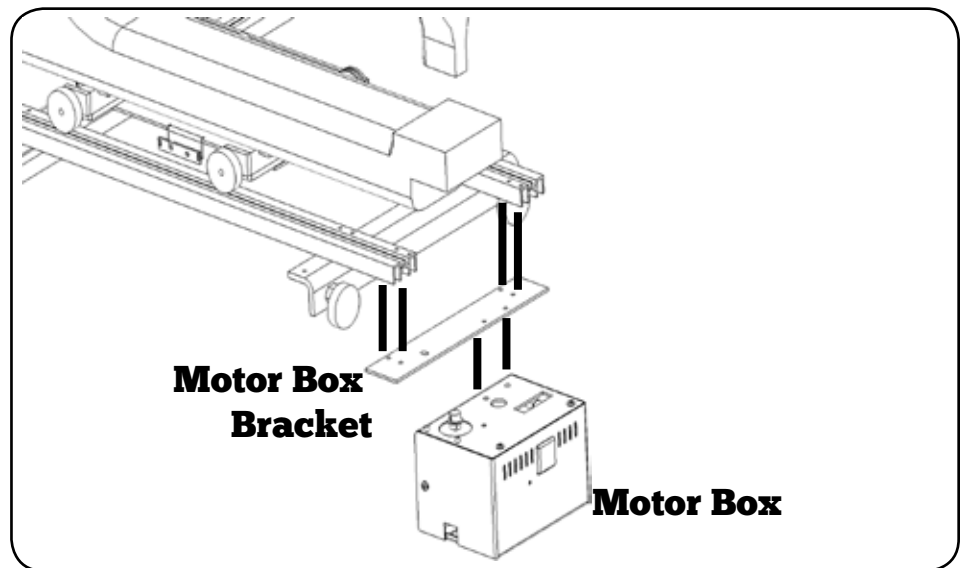
Attach the Front Carriage Bracket

- 1** Drill in front of carriage according to drill template specifications.

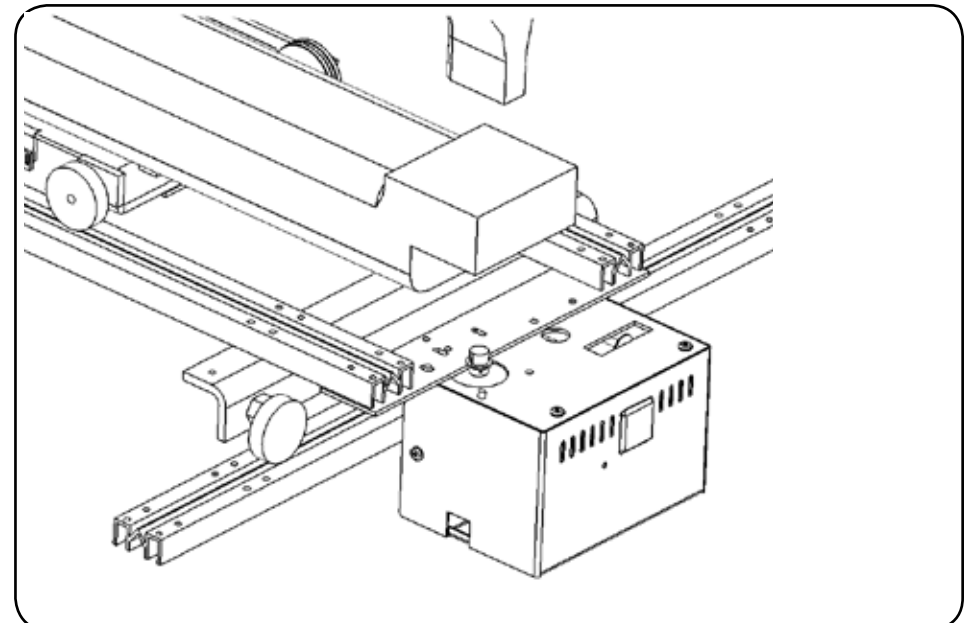


- 2** Attach Motor box and motor box bracket to machine using provided screws.

(Bag #37)



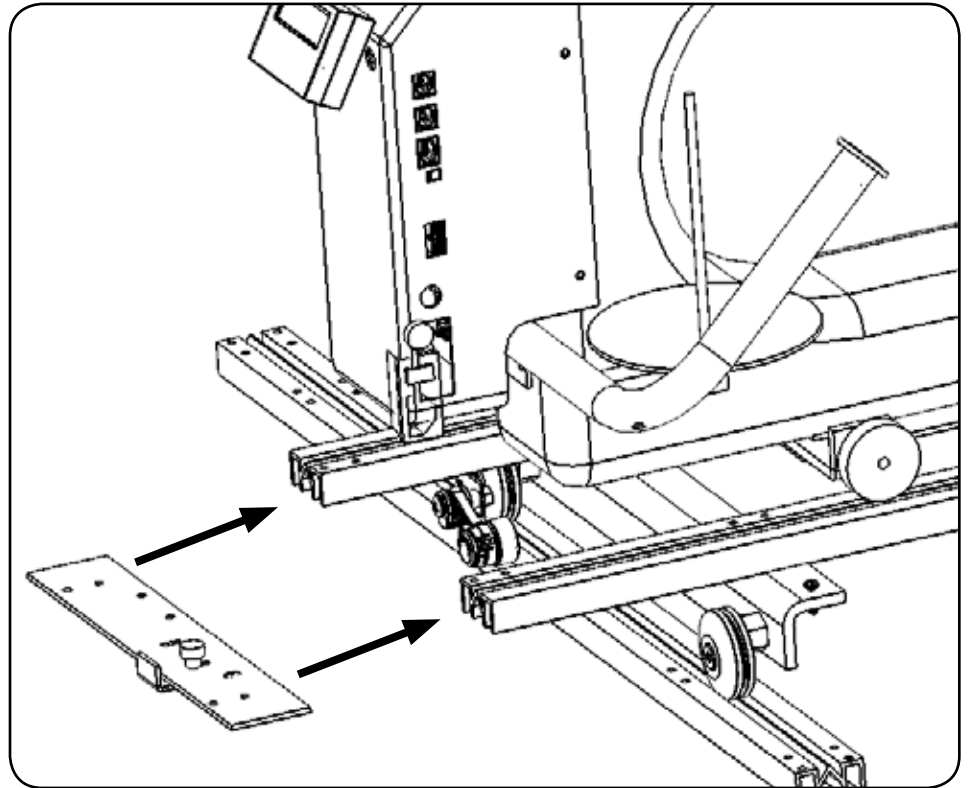
For carriage drill templates, see Appendix B on page 16.



Attach the Rear Idle Bracket

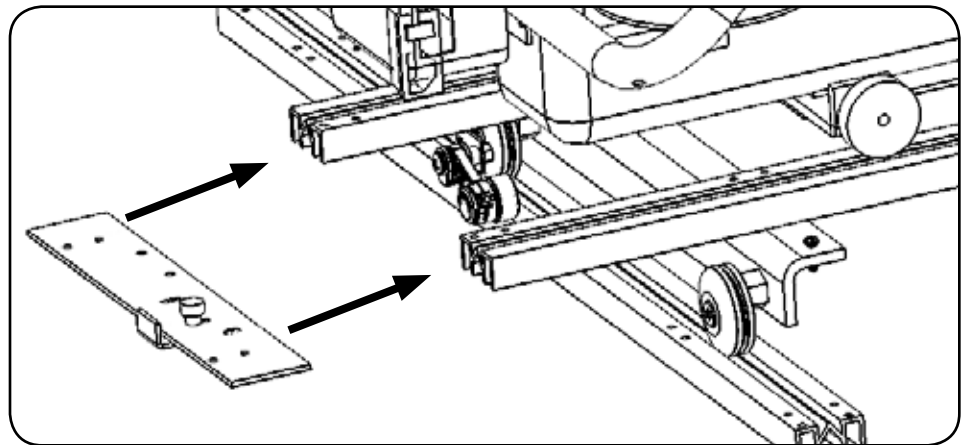
1 Drill holes in front of carriage according to drill template specifications.

For carriage drill templates, see Appendix B on page 16.



2 Attach rear pulley motor bracket using provided screws.

Make sure that the pulley lines up with the pulley on the motor box.
(Bag # 32)



Install Black Belt

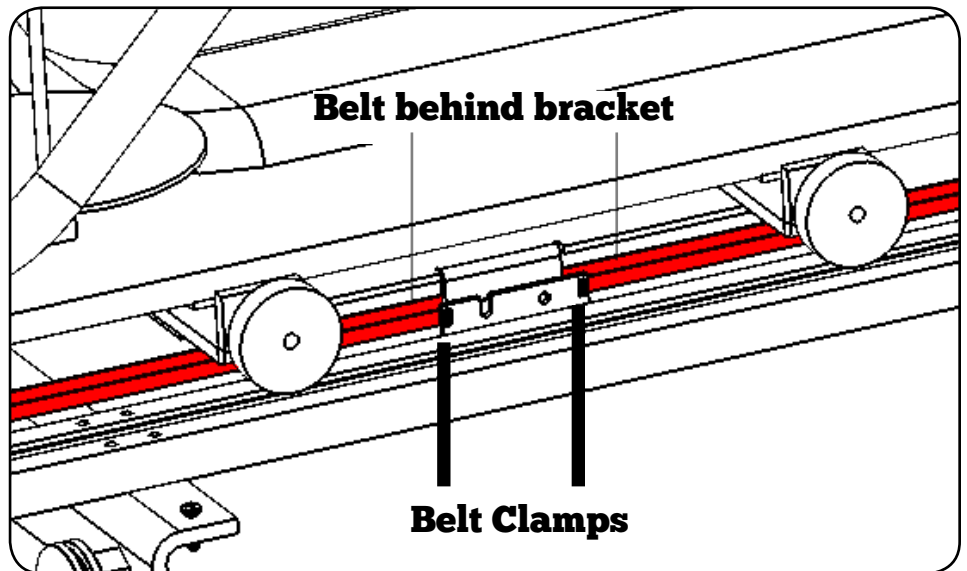
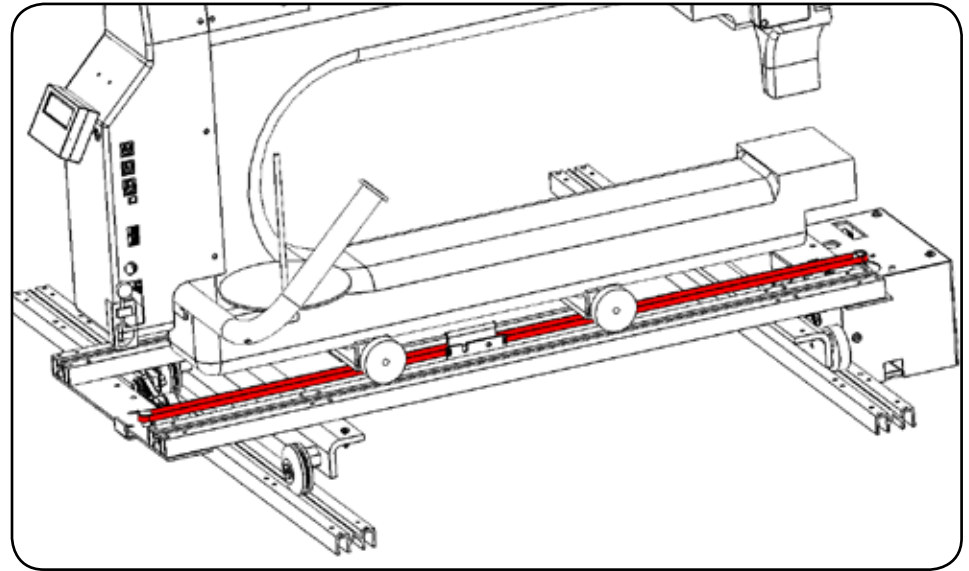
1 Using the belt clamps, attach one end of the black belt to the carriage bracket.

Wrap the toothed side of the black belt (highlighted at right) around both the Idle and Motor Box pulleys, then use belt clamps to attach the remaining end of the belt to the carriage bracket.

Ensure that the black belt travels **behind** the carriage bracket (shown at right).

(Bag # 35)

For more on how to use belt clamps, see Appendix A on pg 14.

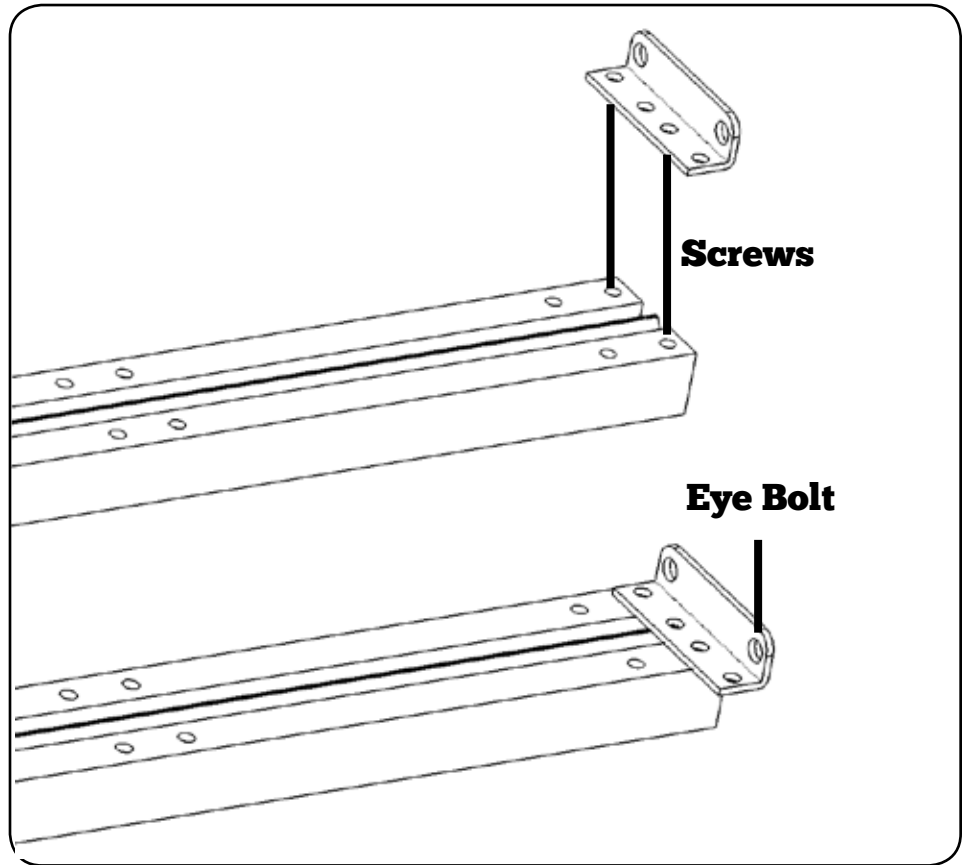


Install White Belt

1 Remove the screws at each end of the frame use them to attach the white belt brackets onto the frame.

Attach one end of the white belt to an eye bolt using the belt clamps and screw the eye bolt into the white belt bracket. (Install with the eye of eye bolt closest to Motor Box.)

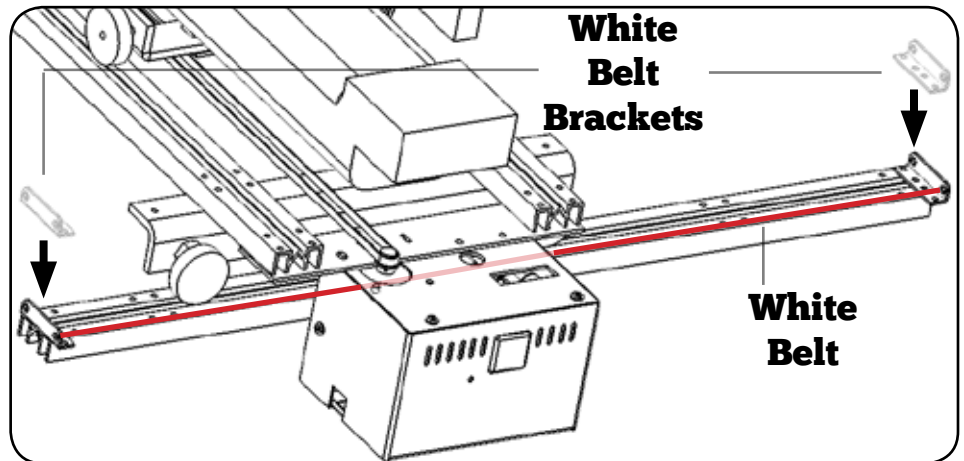
(Bag #35)
(Bag #12)



2 Position the white belt into the pulley on the motor box.

Attach the remaining end of the white belt to an eye bolt and install eye bolt into remaining White belt bracket.

For more on how to use belt clamps, see Appendix A on pg 14.



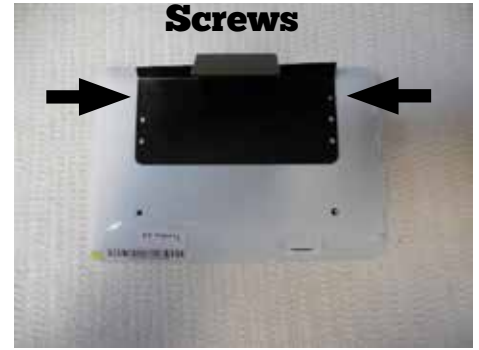
Install Display

1 Insert SD card into display.

Attach display to display bracket with provided screws.

(Bag# 36)

(Bag# 45)



2 Loosen faceplate screws and slide display bracket tab between faceplate and machine head. Tighten faceplate screws.

(Note that machine pictured at right is not an A-1, but the method is the same.)



3 Plug the display wire into the remote port.

Plug the remaining end into the display.

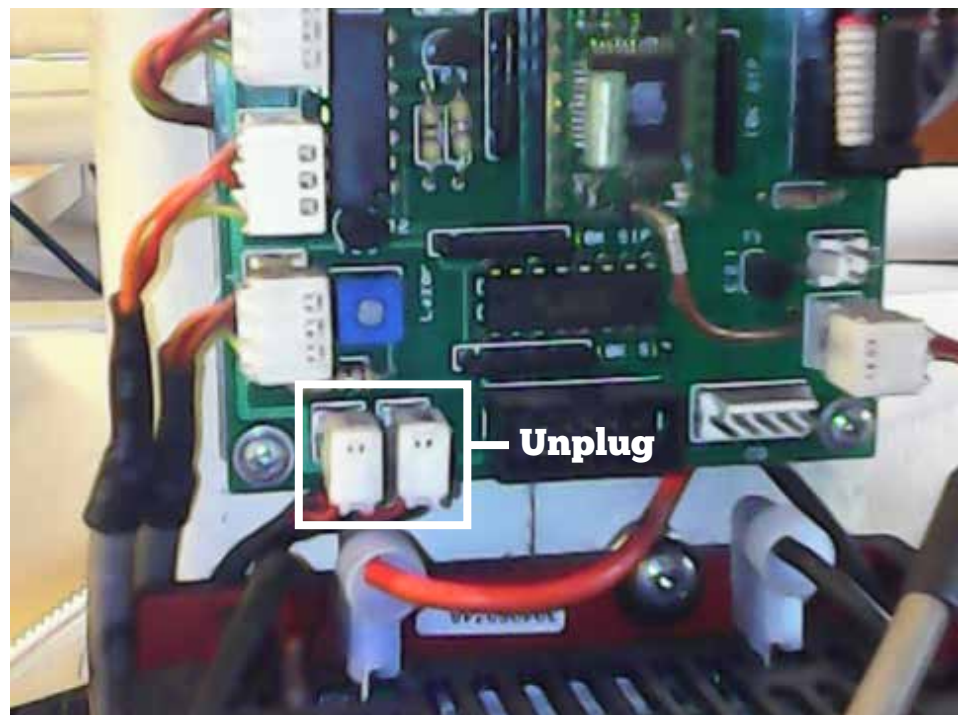
(Bag #10)



Connect Handle Bars

For Non-Perfect Stitch

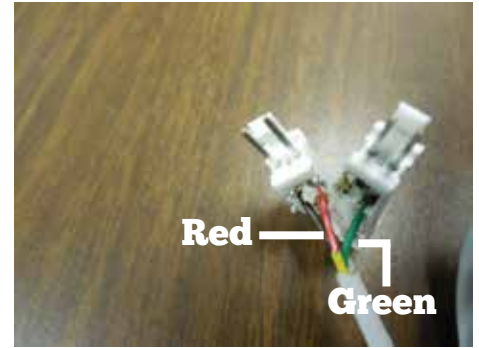
1 Unplug the indicated wires from the PCB located at the rear of the machine.



2 Plug the red wire into the Start/Stop port and the green wire into the Needle Up port.

(The two ports you just unplugged.)

(Bag #10)



3 Plug the remaining end of the handle bar wire into the handle bar port.



For Perfect Stitch

1

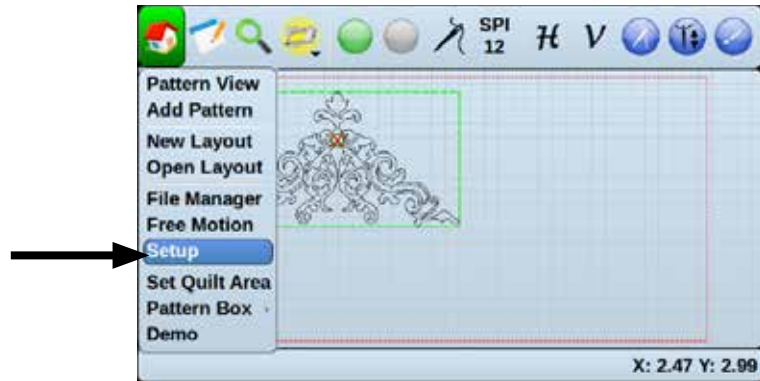
Plug network cable into Stitcher Box port on Black Motor Box.

Plug remaining end of cable into the robotics port of the Perfect Stitch PCB box.



Set Machine Type

- 1 Power on the display, go to Setup > Advanced



- Power on the display, go to Setup > Advanced and set the machine type to A-1.

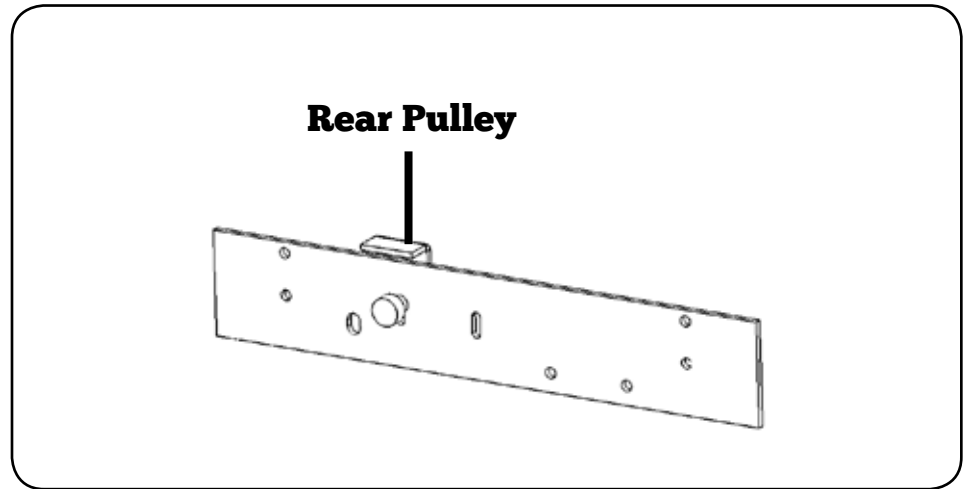


Check Belt Tension

1 A correctly tensioned belt won't be as tight as a piano string but not sagging either. Aim for a taught belt.

Adjust belts as necessary.

Note that the rear idle pulley can have the screw loosened, moved to tighten the white belt, then the screw re-tightened to adjust tension.

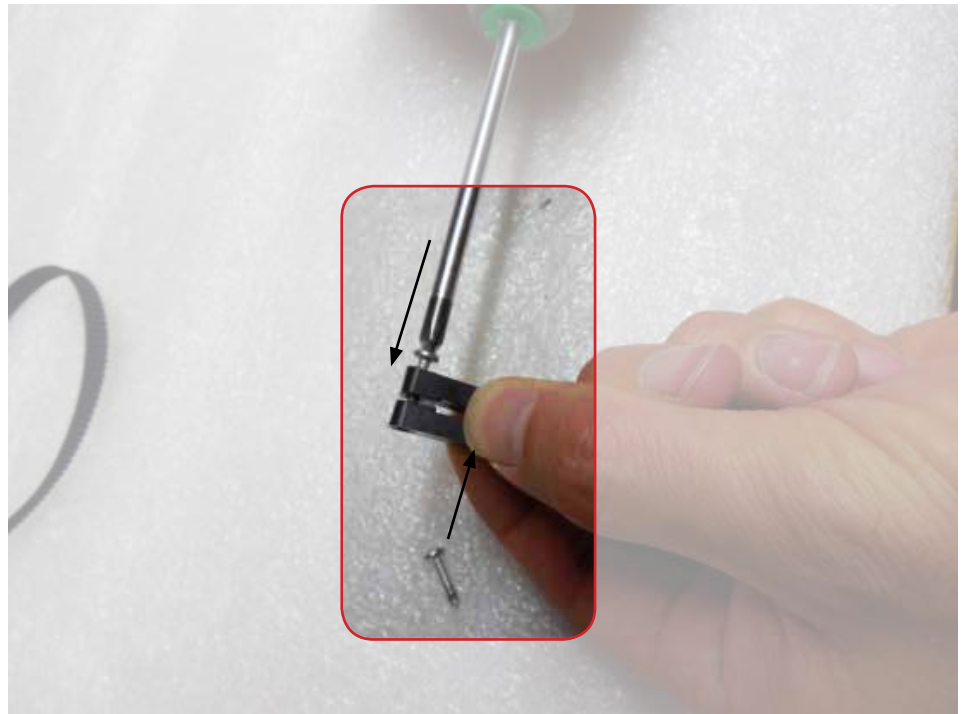


Appendix A - How to use Belt Clamps

A belt clamp consists of two clamps and two screws.



- 1** Using a Phillips screwdriver, insert each screw on opposite sides of the clamps and tighten halfway.



- 2** Thread the belt between the clamps, loop it around and reinsert it between the clamps.



- 3** Align the belt teeth, then finish tightening the clamps.



Appendix B- Additional help

Installing cables

Please refer to the Connecting Robot to Quilt Machine instruction set for help installing cables.

Power on the robotics

Use the power switch located on the side of the motor box with the ports to power the motor box off and on.

Disengage belts for free motion

In order to use free motion with the butler connected the belts will need to be disengaged.

To disengage the x-belt, move the locking lever away from the edge of the motorbox.

To disengage the y-belt, loosen the wingnut on the carriage bracket.

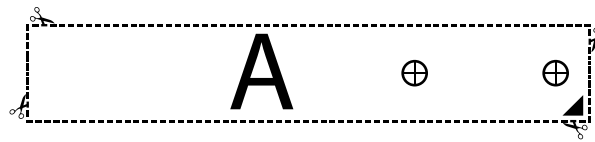
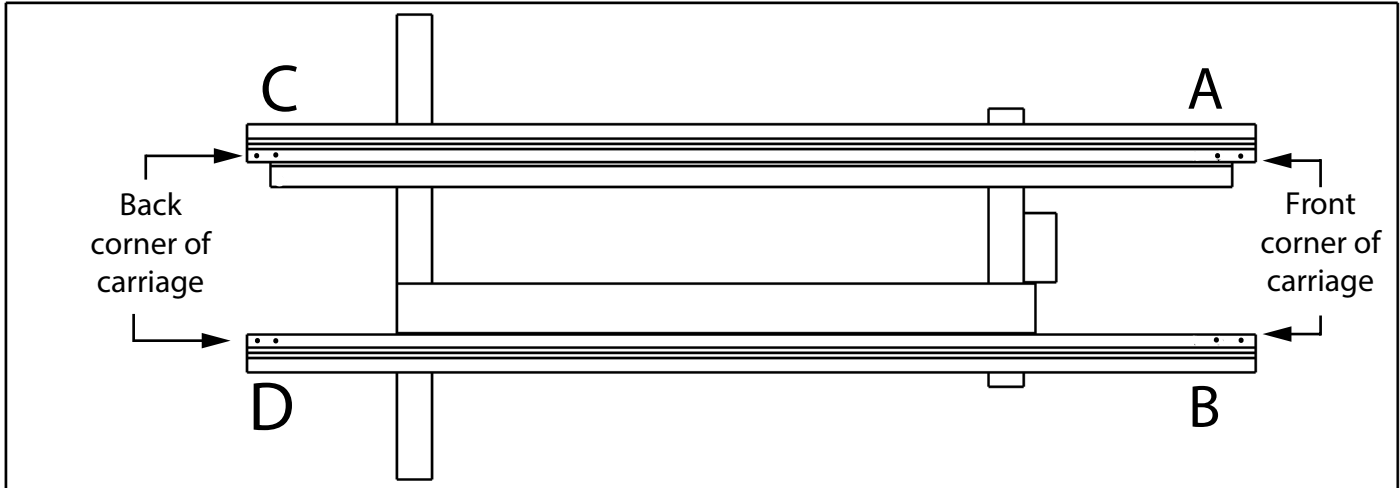
You can now use free motion quilting.



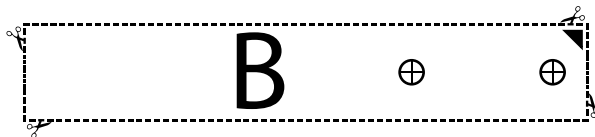
Appendix C - Carriage Drill Templates

Cut out, position, and tape templates into place on the carriage. Drill holes using a #29 drill bit.

A-1 Carriage (Top View)



Drill Bit Size:
#29 (.1360")



Align this corner with rear inner corner of carriage



Drill Bit Size:
#29 (.1360")





Still need help?

Visit support.quiltez.com for
tutorial videos and additional
help documentation