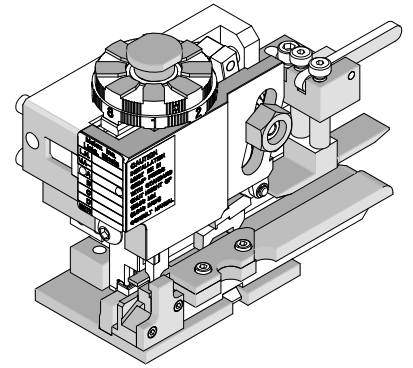




# Rear Feed Mini-Mac Applicator Mechanical Feed Specification Sheet Order No. 63802-7700



## FEATURES

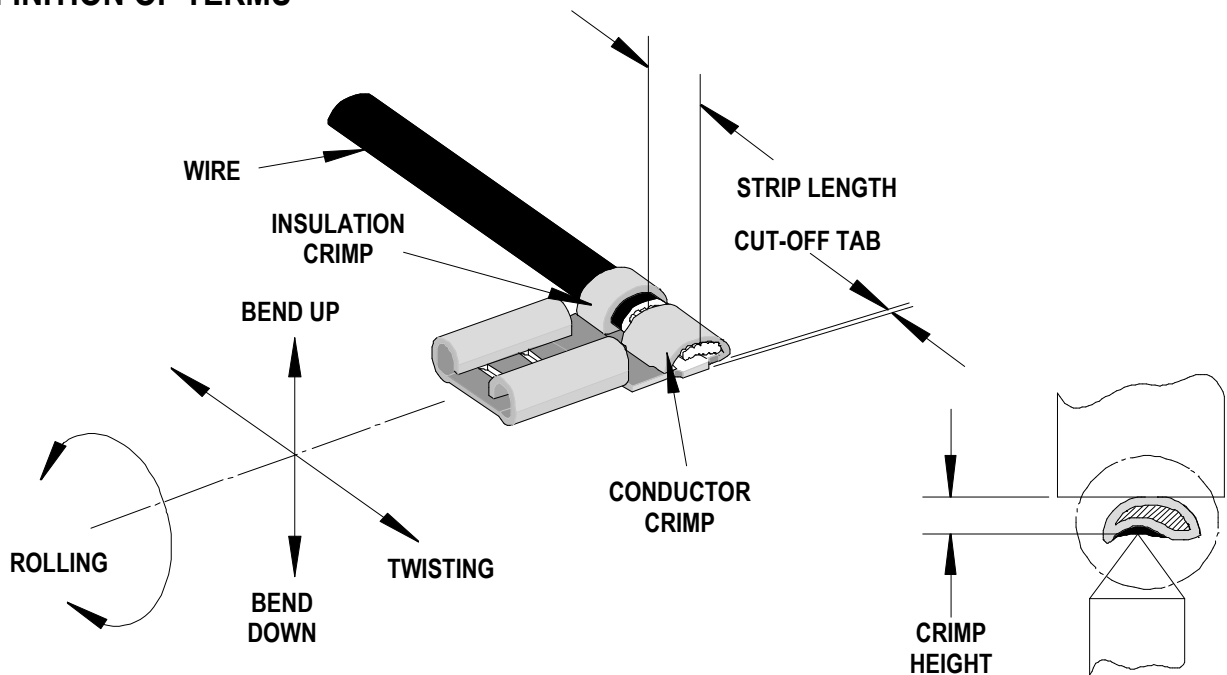
- Quick set-up time; plus the crimp height, track and feed adjustments can be preset in applicator
- Conductor and insulation rings allow quick adjustment for conductor and insulation diameter change
- Applicator designed to industry standard mounting and shut height 135.80mm (5.346")
- Directly adapts to most automatic wire processing machines

## SCOPE

Products: VibraKrimp™ Quick Disconnect Female Flag Terminals, 14-16 AWG.

Terminal Order No.	Terminal Eng. No.	Wire Size		Tab Size		Insulation Diameter		Strip Length	
		AWG	mm <sup>2</sup>	mm	In.	mm	In.	mm	In.
19009-0016	BBZ-4169	14-16	2.00-1.30	6.35 by 0.81	.250 by .032	3.70	.145	5.94	.234
19009-0017	BBZ-4171	14-16	2.00-1.30	4.75 by 0.51	.187 by .020	3.70	.145	5.94	.234
19009-0018	BBZ-4171-032	14-16	2.00-1.30	4.75 by 0.81	.187 by .032	3.70	.145	5.94	.234

## DEFINITION OF TERMS



The above terminal drawing is a generic terminal representation. It is not an image of a terminal listed in the scope.

### CRIMP SPECIFICATIONS

Terminal Order No.	Terminal Eng. No.	Wire Size		Conductor Crimp Height						Pull Force Minimum	
				Mean		Go		No Go			
		AWG	mm <sup>2</sup>	mm	In.	mm	In.	mm	In.	N	Lb.
19009-0016	BBZ-4169	14	2.00	1.62	.064	1.55	.061	1.68	.066	222.6	50.0
		16	1.30	1.62	.064	1.55	.061	1.68	.066	133.5	30.0
19009-0017	BBZ-4171	14	2.00	1.62	.064	1.55	.061	1.68	.066	222.6	50.0
		16	1.30	1.62	.064	1.55	.061	1.68	.066	133.5	30.0
19009-0018	BBZ-4171-032	14	2.00	1.62	.064	1.55	.061	1.68	.066	222.6	50.0
		16	1.30	1.62	.064	1.55	.061	1.68	.066	133.5	30.0

**Seam**  
Seam shall not be open and no wire allowed out of the crimping

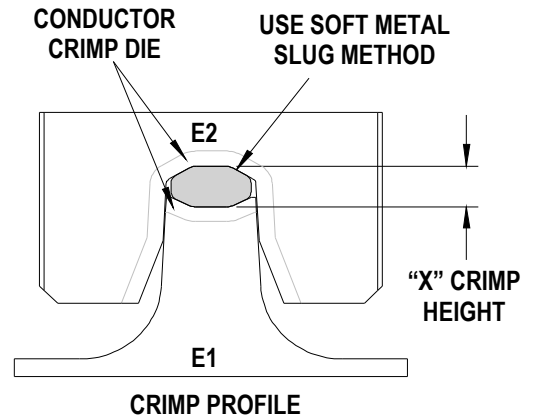
Pull Force should be measured with no influence from the insulation crimp. The above specifications are guidelines to an optimum crimp.

### Tool Calibration

To recalibrate this applicator, make sure the power is completely shut off on the press.

1. The Applicator must be properly installed in the press.
2. Crimping dies must be properly installed in the Applicator.
3. The recommended method of measuring the crimp height of the conductor dies is the soft metal slug method. See Figure 1.
4. The slug must have a diameter 0.51mm (.020”) larger than the “X” No Go dimension before crimping.
5. Place the soft metal slug (solder) into the nest of the bottom die and crimp (by hand cycling the press) similar to a terminal. The crimp height can be measured with a blade type micrometer or dial caliper, (Dimension “X”).
6. Adjustment of the crimp height can be accomplished by indexing the conductor cam. The letter “A” gives the loosest position and “K” gives the tightest position. A total adjustment of 0.50mm (.020”) can be achieved by adjusting the conductor cam.

Note: If the crimp height is too tight on the setting “A”, check the shut height of the press. See the Industrial Mini-Mac Applicator Manual Section 2.1 for adjustments.



Use soft metal slug (solder) method to measure the “X” dimension. Verify tooling crimp height calibration by referring to the Go/No Go dimensions shown in the chart below.

Figure 1

Molex does not sell gauge pins contact your local industrial supplier.

**PARTS LIST**

<b>Rear Feed Applicator 63802-7700</b>				
<b>Item</b>	<b>Order No</b>	<b>Engineering No.</b>	<b>Description</b>	<b>Quantity</b>
<b>Perishable Tooling</b>				
	63802-7770	63802-7770	Tool Kit (All "Y" Items)	REF
1	63801-5518	63801-5518	Conductor Punch ( E2 Die)	1 Y
2	63801-5617	63801-5617	Insulation Punch (I2 Die)	1 Y
3	19031-0311	19031-0311	Conductor/Insulation Anvil (E1/I1 Die)	1 Y
4	19229-0120	19229-0120	Cutter Housing	1 Y
5	19229-0121	19229-0121	Cutter Plunger	1 Y
<b>Other Components</b>				
6	19229-0095	19229-0095	Cutter Back Plate	1
7	19230-0038	19230-0038	Feed Finger	1
8	19230-0101	19230-0101	Guide Rail	1
9	19230-0106	19230-0106	Guide and Hold Down	1
10	19250-0038	19250-0038	Compression Spring	1
11	63801-2695	63801-2695	Terminal Drag Assembly	1
12	63801-7701	63801-7701	Cutter Striker	1
13	63802-7401	63802-7401	Shoulder Bushing	1
14	63803-5109	63803-5109	Conductor Bushing	1
<b>Frame</b>				
15	19230-0084	19230-0084	Slide (Terminal Track)	1
16	63801-2600	63801-2600	Rear Feed Frame	1
17	63801-2603	63801-2603	Base	1
<b>Hardware</b>				
18	N/A	N/A	M3 by 10 Long SHCS	2**
19	N/A	N/A	M4 by 8 Long SHCS	6**
20	N/A	N/A	M4 by 10 Long BHCS	2**
21	N/A	N/A	M4 by 12 Long SHCS	2**
22	N/A	N/A	M6 by 10 Long BHCS	6**
23	N/A	N/A	M8 by 25 Long BHCS	1**
24	N/A	N/A	6mm by 10 Long Dowel Pin	4**
** Available from an industrial supply company such as MSC (1-800-645-7270).				

### Assembly Drawing

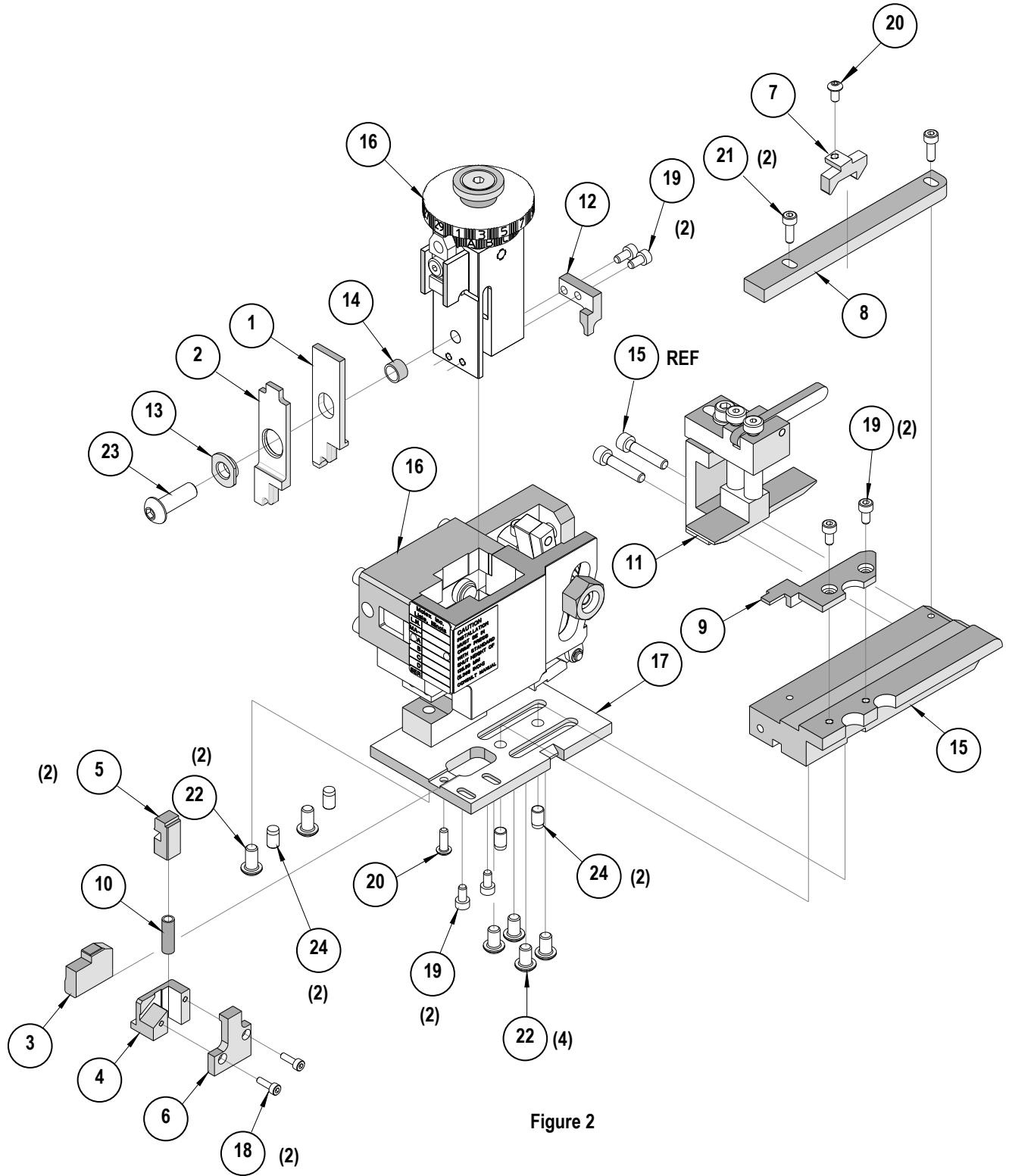


Figure 2

## NOTES

1. Molex recommends an extra perishable tooling kit be maintained at your facility.
2. Verify tooling alignment by manually cycling the press and Applicator before crimping under power. Check that all screws are tight.
3. Slugs, Terminals, Dirt and Oil should be kept clear of work area.
4. Wear safety glasses at all times.
5. For recommended maintenance refer to the Mini-Mac Manual.

**CAUTION:** This applicator should only be used in a press with a shut height of 135.80 mm (5.346"). Tooling damage could result at a lower setting.

**CAUTION:** To prevent injury never operate this Applicator without the guards supplied with the press or wire-processing machine in place. Reference the press or wire processing manufacturer's instruction manual.

**CAUTION:** Molex crimp specifications are valid only when used with Molex terminals, applicators and tooling.

**Wear Safety Glasses At All Times.**

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