

**FASTIN-FASTON\* Connectors, .110", .250", .312" & .375" srs.  
TAB & RECEPTACLE CONTACTS**

**1. SCOPE**

This specification covers the requirements for application of .110", .250", .312" and .375" series FASTIN-FASTON\* Tab & Receptacle contacts. These requirements are applicable to automatic machine crimping tools.

For specific wire and insulation ranges relative to the products covered in this specification, see Figure 4.

**1.1 Reference Specification**

For applicable performance requirements, see AMP Product Specification 108-20020.

**2. NOMENCLATURE**

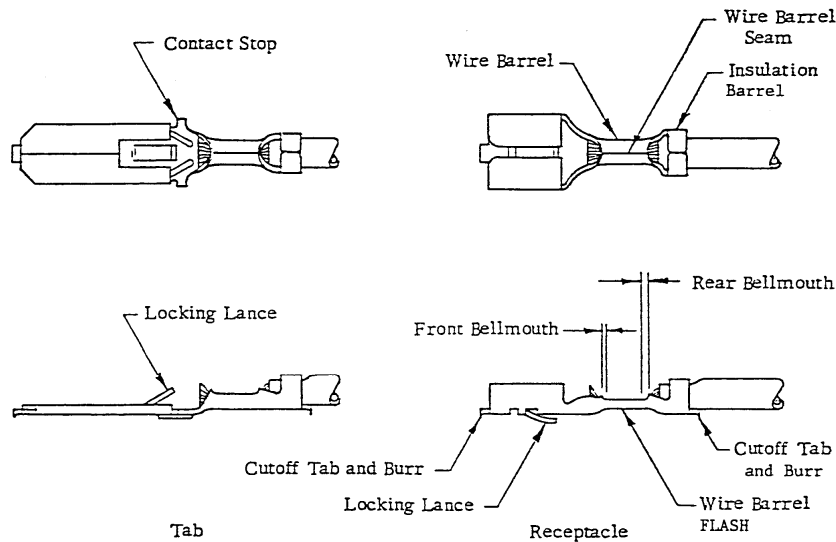


Figure 1

**3. CRIMP AND DIMENSIONAL REQUIREMENTS**

**3.1 Wire Preparation**

A- **Strip Length:** Insulation shall be stripped as indicated in Figure 4.

B- **Workmanship:** Reasonable care shall be taken not to nick, scrape or cut any strands during the stripping operation.

**3.2 Carrier Cutoff Tab and Burr.**

A- **Cutoff Tab:** Cutoff tab shall not exceed .015.

B- **Burr:** Burr on cutoff shall not exceed .005.

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**3.3 Barrel Crimp.**

- A- **Crimp Dimensions and Type:** Crimp height, width and type shall be as shown in Figure 4.
- B- **Wire Barrel Flash:** Shall not exceed .005.
- C- **Wire Barrel Seam:** Shall be completely closed and there shall be no evidence of loose wire strands or wire strands visible in the seam.
- D- **Bellmouth:**
  - (1) Rear bellmouth length shall be .010-.030.
  - (2) Front bellmouth length shall be .005-.025.
- E- **Conductor location:**
  - (1) End of the wire shall be flush with the front end of the wire barrel or extend .030 maximum after crimping.
  - (2) Both insulation and conductor shall be visible between the insulation barrel and wire barrel. Care shall be taken not to allow insulation to be crimped in the wire barrel.

**3.4 Insulation Barrel Crimp.**

- A- **Crimp Dimensions and Type:** Crimp width and type shall be as shown in Figure 4.
- B- **Workmanship:** Reasonable care shall be taken not to cut or break the insulation during the crimping operation.

**3.5 Locking Lance.**

Locking lance shall not be deformed and shall meet requirements of product drawing after crimping.

**3.6 Contact Stop.**

Contact stop shall not be deformed and shall meet requirements of product drawing after crimping.

**3.7 Alignment.**

A- **Straightness:**

- (1) The contact, including the cutoff tab and burr shall not be bent above or below the datum line more than the amount shown in Figure 2.

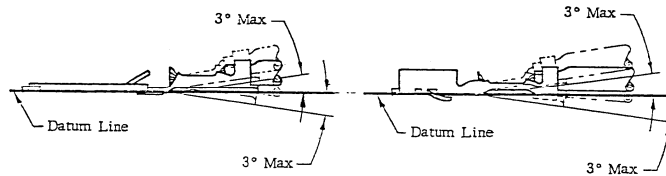


Figure 2

- (2) The side to side bending of the contact shall not exceed the limits specified in Figure 3.

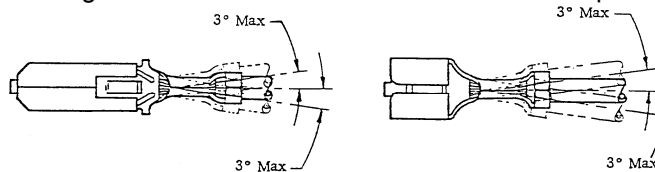


Figure 3

- B- **Twist or Roll:** There shall be no twist or roll in crimped portion that will impair usage of the contact.
- C- **Assembly.** The following list of do's and don'ts are to be followed when assembling contacts into housing cavities.

(1) **do's:**

- a) Do insert contacts fully.
- b) Do check for proper insertion by pulling back lightly.
- c) Do ensure proper handling of contacts to eliminate lance deformation.

(2) **Don'ts:**

- a) Don't insert contact into housing at an angle.
- b) Don't rock connectors while mating.
- c) Don't tie harness closer than 1.50 inches to back of housing.
- d) Don't dress wires sharply to one side of housing.

**AUTOMATIC MACHINE WIRE CRIMP DIMENSIONS**

S E R I E S	L O G	PART N°		WIRES		INSULATION DIA.	STRIP LENGHT APPROX.	WIRE BARREL CRIMP			INSULATION BARREL CRIMP	
		TAB	REC.	N°	SIZE mm2			WIDTH	HEIGHT	T Y P E	WIDTH	T Y P E
.110"		188352 160743 160762		1	0.50	.090-.120	.180	.090	.058	F	.130	F
				1	20 (AWG)				.058			
				1	0.75				.060			
				1	18 (AWG)				.062			
				1	1.00				.062			
				1	16 (AWG)				.069			
				1	1.50				.069			
.110"		160887		1	0.50	.055-.090	.177	.080	.056	F	.110	O V
				1	0.70				.059			
				1	0.75				.060			
				1	0.85				.061			
				1	1.00				.063			
.110"		160926		1	1.50	.083-.122	.180	.110	.067	F	.140	O V
				1	2.00				.072			
				1	2.50				.078			
.110"		160888		1	1.00	.075-.090	.180	.090	.061	F	.110	O V
				1	1.25				.065			
				1	1.35				.066			
				1	1.50				.068			
.110"			160366	1	0.20	.040-.080	.158	.062	.032	F	.080	F
				1	24 (AWG)				.032			
				1	0.30				.035			
				1	22 (AWG)				.035			
				1	0.40				.037			
				1	0.50				.039			
				1	20 (AWG)				.039			
.110"			160864	1	0.50	.055-.090	.158	.070	.041	F	.100	O V
				1	0.70				.045			
				1	0.75				.046			
				1	0.85				.047			
				1	1.00				.050			
.110"		160776		1	26 (AWG)	-	-	.070	.038	F	-	-
				1	24 (AWG)				.039			
				1	22 (AWG)				.042			
.110"		160923		1	0.20	.040-.063	.180	.070	.043	F	.090	F
				1	0.25				.044			
				1	0.35				.046			
				1	0.50				.049			
.250"	785314	280096		1	0.35	.090-.130	.218	.080	.053	F	.130	F
				1	0.50				.055			
				1	0.75				.057			
.250"	785316		280095	1	0.35	.090-.130	.218	.080	.046	F	.130	F
				1	0.50				.049			
				1	0.75				.051			
.250"	785129		282178	1	0.35	.057-.075	.218	.080	.046	F	.120	F
				1	0.50				.049			
				1	0.75				.051			
.250"	687839	42098 42460 280081 280425		1	0.75	.120-.160	.218	.110	.057	F	.160	F
				1	1.00				.060			
				1	1.50				.065			
				1+1	0.75+0.75				.065			
				1	2.50				.075			

AUTOMATIC MACHINE WIRE CRIMP DIMENSIONS  
(continuation)

S E R I E S	L O G	PART N°		WIRES		INSULATION DIA.	STRIP LENGHT APPROX.	WIRE BARREL CRIMP			INSULATION BARREL CRIMP	
		TAB	REC.	N°	SIZE mm2			WIDTH	HEIGHT	T Y P E	WIDTH	T Y P E
.250"	785320		42100 280098 280923 180375 284340 293212	1	0.75	.120-.160	.218	.100	.049	F	.180	F
				1	1.0				.052			
				1	1.5				.056			
				1	2.5				.064			
				-	-				-			
.250"	785127		282171 282176 282177	1	1.0	.075-.118	.218	.100	.052	F	.140	F
				1	1.5				.056			
				1	2.0				.060			
				1	2.5				.064			
.250"	677705	180352 280080		1+1	1.5+1.5	.135-.200	.240	.160	.072	F	.210	F
				1	4.0				.077			
				1	5.0				.085			
				1	6.0				.092			
.250"	466675		180560 180351	1+1	1.5+1.5	.135-.200	.240	.160	.072	F	.210	F
				1	4.0				.077			
				1	5.0				.085			
				1	6.0				.092			
.250"	7-1529168-1		180351	1+1	1.5+1.5	.135-.200	.240	.160	.072	F	.210	F
					4.0				.077			
					2.5+1.5				.077			
					5.0				.085			
					2.5+2.5				.085			
					[10AWG]				.087			
					6.0				.092			
.250"	785126	282170		1	1.0	.075-.118	.216	.110	.060	F	.155	F
				1	1.5				.065			
				1	2.0				.070			
				1	2.5				.075			
.250"	785135	282186		1	0.35	.057-.075	.216	.080	.053	F	.120	F
				1	0.50				.055			
				1	0.75				.057			
.250"		160645 160691		1	0.30(22AWG)	.085-.125	.218	.090	.045	F	.140	F
				1	0.50(20AWG)				.048			
				1	0.75(18AWG)				.052			
.312"			160920	1	3.00	.130-.177	.255	.130	.085	F	.210	F
				1	3.50				.089			
				1	4.00				.093			
.312"			160557	1	0.50	.090-.130		.090	.056	F	.130	F
				1	0.75				.058			
				1	1.00				.060			
				1	1.50				.062			
.375"		280075		1+1	0.75+2.50	.150-.200	.270	.160	.106	F	.250	F
				1	4.00				.118			
				1	6.00				.126			
.375"	785489		280077 280756	1	3.00	.118-.200	.270	.160	.110	F	.250	F
				1	4.00				.118			
				1	6.00				.126			
.375"	1529063 1339559		280756	1	4.00	.118-.200	.270	.160	.102	F	.250	F
				1	6.00				.110			
.375"	1529095		280756	1	4.00	.118-.200	.270	.180	.095	F	.250	F
				1	5.00				.102			
				1	6.00				.109			
.375"	783282	280074		1	6.00	.200-.275	.280	.180	.127	F	.300	F
				1	10.0				.143			
.375"	782678		280755 281089 280076 281091	1	6.00	.200-.275	.280	.180	.127	F	.300	F
				1+1	6.00+2.50				.138			
				1	10.0				.143			
.375"	1529136		280755 280076 281091	1	6.00	.200-.275	.260	.180	.127	F	.300	F
				1	8.00				.135			
				1	8.50				.138			
				1	10.0				.143			

Figure 4