

Caution: holding of tubing by hand is not recommended.

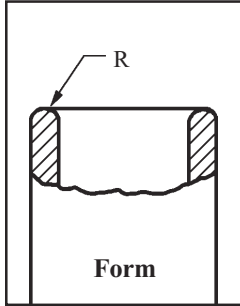
## Tube End Forming Cutters

These cutters are used to produce a smooth, round lip on all types of tubing, including steel, copper, aluminum, plastic and other materials. They are not recommended for tubing with irregular wall thickness or for interrupted cutting. Larger sizes (A-6 x .025 and up) can be supplied in carbide. Special cutting shapes can also be provided. Speeds of about 50 to 350 RPM are suggested for these cutters. It is advisable to start at a slower speed on any given material or size, and increase until best results are obtained. Order by tool number plus wall thickness of tubing: A-6-.035, A-16-.065, etc. If possible, provide a sample of your tubing when ordering, or, at least, give material specification.

### High Speed Steel

Tubing Size	Wall Thickness		Shank Dia.	Head Dia.	Overall Length	Shank Length	Severance Tool Name	EDP Order Number
	Gauge	Inch						
1/8"	31	.010"	1/4"	1/4"	2-1/4"	2"	A-2-010	35460
1/8"	27	.016"	1/4"	1/4"	2-1/4"	2"	A-2-016	35461
1/8"	25	.020"	1/4"	1/4"	2-1/4"	2"	A-2-020	35462
1/8"	22	.028"	1/4"	1/4"	2-1/4"	2"	A-2-028	35463
1/8"	21	.032"	1/4"	1/4"	2-1/4"	2"	A-2-032	35464
1/8"	21	.035"	1/4"	1/4"	2-1/4"	2"	A-2-035	35465
3/16"	25	.020"	3/8"	1/2"	1-9/16"	1"	A-3-020	35466
3/16"	22	.028"	3/8"	1/2"	1-9/16"	1"	A-3-028	35467
3/16"	21	.032"	3/8"	1/2"	1-9/16"	1"	A-3-032	35468
3/16"	20	.035"	3/8"	1/2"	1-9/16"	1"	A-3-035	35469
1/4"	25	.020"	3/8"	1/2"	1-9/16"	1"	A-4-020	35470
1/4"	22	.028"	3/8"	1/2"	1-9/16"	1"	A-4-028	35471
1/4"	21	.032"	3/8"	1/2"	1-9/16"	1"	A-4-032	35472
1/4"	20	.035"	3/8"	1/2"	1-9/16"	1"	A-4-035	35473
1/4"	18	.049"	3/8"	1/2"	1-9/16"	1"	A-4-049	35474
1/4"	16	.065"	3/8"	1/2"	1-9/16"	1"	A-4-065	35475
5/16"	25	.020"	3/8"	9/16"	1-9/16"	1"	A-5-020	35476
5/16"	22	.028"	3/8"	9/16"	1-9/16"	1"	A-5-028	35477
5/16"	21	.032"	3/8"	9/16"	1-9/16"	1"	A-5-032	35478
5/16"	20	.035"	3/8"	9/16"	1-9/16"	1"	A-5-035	35479
5/16"	18	.049"	3/8"	9/16"	1-9/16"	1"	A-5-049	35480
5/16"	17	.058"	3/8"	9/16"	1-9/16"	1"	A-5-058	35481
5/16"	16	.065"	3/8"	9/16"	1-9/16"	1"	A-5-065	35482
3/8"	25	.020"	1/2"	3/4"	1-9/16"	1"	A-6-020	35483
3/8"	22	.028"	1/2"	3/4"	1-9/16"	1"	A-6-028	35484
3/8"	21	.032"	1/2"	3/4"	1-9/16"	1"	A-6-032	35485
3/8"	20	.035"	1/2"	3/4"	1-9/16"	1"	A-6-035	35486
3/8"	18	.049"	1/2"	3/4"	1-9/16"	1"	A-6-049	35487
3/8"	17	.058"	1/2"	3/4"	1-9/16"	1"	A-6-058	35488
3/8"	16	.065"	1/2"	3/4"	1-9/16"	1"	A-6-065	35489
7/16"	25	.020"	1/2"	3/4"	1-9/16"	1"	A-7-020	35490
7/16"	22	.028"	1/2"	3/4"	1-9/16"	1"	A-7-028	35491

**Tube end forming cutters continued...**



Holding of tubing by hand is not recommended.



Other Sizes, Shapes, and Form available as a special. Metric sizes also available as a special.

Tube End Forming Cutters for tubing 7/8" and larger, require threaded shanks. See pages 78-80 for available shank styles and sizes.

**High Speed Steel**

Tubing Size	Wall Thickness		Shank Dia.	Head Dia.	Overall Length	Shank Length	Severance Tool Name	EDP Order Number
	Gauge	Inch						
7/16"	21	.032"	1/2"	3/4"	1-9/16"	1"	A-7-032	35492
7/16"	20	.035"	1/2"	3/4"	1-9/16"	1"	A-7-035	35493
7/16"	18	.049"	1/2"	3/4"	1-9/16"	1"	A-7-049	35494
7/16"	16	.065"	1/2"	3/4"	1-9/16"	1"	A-7-065	35495
1/2"	25	.020"	1/2"	3/4"	1-9/16"	1"	A-8-020	35496
1/2"	22	.028"	1/2"	3/4"	1-9/16"	1"	A-8-028	35497
1/2"	21	.032"	1/2"	3/4"	1-9/16"	1"	A-8-032	35498
1/2"	20	.035"	1/2"	3/4"	1-9/16"	1"	A-8-035	35499
1/2"	18	.049"	1/2"	3/4"	1-9/16"	1"	A-8-049	35500
1/2"	17	.058"	1/2"	3/4"	1-9/16"	1"	A-8-058	35501
1/2"	16	.065"	1/2"	3/4"	1-9/16"	1"	A-8-065	35502
1/2"	14	.083"	1/2"	3/4"	1-9/16"	1"	A-8-083	35503
9/16"	22	.028"	1/2"	7/8"	1-5/8"	1"	A-9-028	35504
9/16"	20	.035"	1/2"	7/8"	1-5/8"	1"	A-9-035	35505
9/16"	18	.049"	1/2"	7/8"	1-5/8"	1"	A-9-049	35506
9/16"	16	.065"	1/2"	7/8"	1-5/8"	1"	A-9-065	35507
9/16"	13	.095"	1/2"	7/8"	1-5/8"	1"	A-9-095	35508
5/8"	22	.028"	1/2"	7/8"	1-5/8"	1"	A-10-028	35509
5/8"	21	.032"	1/2"	7/8"	1-5/8"	1"	A-10-032	35510
5/8"	20	.035"	1/2"	7/8"	1-5/8"	1"	A-10-035	35511
5/8"	18	.049"	1/2"	7/8"	1-5/8"	1"	A-10-049	35512
5/8"	17	.058"	1/2"	7/8"	1-5/8"	1"	A-10-058	35513
5/8"	16	.065"	1/2"	7/8"	1-5/8"	1"	A-10-065	35514
5/8"	14	.083"	1/2"	7/8"	1-5/8"	1"	A-10-083	35515
5/8"	13	.095"	1/2"	7/8"	1-5/8"	1"	A-10-095	35516
3/4"	22	.028"	1/2"	1"	1-5/8"	1"	A-12-028	35517
3/4"	21	.032"	1/2"	1"	1-5/8"	1"	A-12-032	35518
3/4"	20	.035"	1/2"	1"	1-5/8"	1"	A-12-035	35519
3/4"	18	.049"	1/2"	1"	1-5/8"	1"	A-12-049	35520
3/4"	17	.058"	1/2"	1"	1-5/8"	1"	A-12-058	35521
3/4"	16	.065"	1/2"	1"	1-5/8"	1"	A-12-065	35522
3/4"	14	.083"	1/2"	1"	1-5/8"	1"	A-12-083	35523
3/4"	13	.095"	1/2"	1"	1-5/8"	1"	A-12-095	35524
3/4"	11	.120"	1/2"	1"	1-5/8"	1"	A-12-120	35525
7/8"	22	.028	1/2"-20	1-1/4"	1-1/8"	-	A-14-028	35526
7/8"	21	.032	1/2"-20	1-1/4"	1-1/8"	-	A-14-032	35527
7/8"	20	.035	1/2"-20	1-1/4"	1-1/8"	-	A-14-035	35528
7/8"	18	.049	1/2"-20	1-1/4"	1-1/8"	-	A-14-049	35529
7/8"	17	.058	1/2"-20	1-1/4"	1-1/8"	-	A-14-058	35530
7/8"	16	.065	1/2"-20	1-1/4"	1-1/8"	-	A-14-065	35531
7/8"	14	.083	1/2"-20	1-1/4"	1-1/8"	-	A-14-083	35532
7/8"	13	.095	1/2"-20	1-1/4"	1-1/8"	-	A-14-095	35533
1"	22	.028	1/2"-20	1-3/8"	1-1/8"	-	A-16-028	35534
1"	20	.035	1/2"-20	1-3/8"	1-1/8"	-	A-16-035	35535
1"	18	.049	1/2"-20	1-3/8"	1-1/8"	-	A-16-049	35536
1"	17	.058	1/2"-20	1-3/8"	1-1/8"	-	A-16-058	35537
1"	16	.065	1/2"-20	1-3/8"	1-1/8"	-	A-16-065	35538
1"	14	.083	1/2"-20	1-3/8"	1-1/8"	-	A-16-083	35539
1"	13	.095	1/2"-20	1-3/8"	1-1/8"	-	A-16-095	35540
1"	11	.120	1/2"-20	1-3/8"	1-1/8"	-	A-16-120	35541
1-1/8"	22	.028	1/2"-20	1-1/2"	1-1/8"	-	A-18-028	35542
1-1/8"	20	.035	1/2"-20	1-1/2"	1-1/8"	-	A-18-035	35543
1-1/8"	18	.049	1/2"-20	1-1/2"	1-1/8"	-	A-18-049	35544
1-1/8"	17	.058	1/2"-20	1-1/2"	1-1/8"	-	A-18-058	35545
1-1/8"	16	.065	1/2"-20	1-1/2"	1-1/8"	-	A-18-065	35546
1-1/4"	20	.035	1/2"-20	1-1/2"	1-1/8"	-	A-20-035	35547
1-1/4"	18	.049	1/2"-20	1-1/2"	1-1/8"	-	A-20-049	35548
1-1/4"	16	.065	1/2"-20	1-1/2"	1-1/8"	-	A-20-065	35549
1-1/4"	14	.083	1/2"-20	1-1/2"	1-1/8"	-	A-20-083	35550

High Speed Steel Tube End Forming Cutters (continued)

Tubing Size	Wall Thickness		Shank Dia.	Head Dia.	Overall Length	Shank Length	Severance Tool Name	EDP Order Number
	GAUGE	INCH						
1-1/4"	11	.120	1/2"-20	1-1/2"	1-1/8"	-	A-20-120	35551
1-3/8"	20	.035	1/2"-20	1-5/8"	1-1/8"	-	A-22-035	35552
1-3/8"	18	.049	1/2"-20	1-5/8"	1-1/8"	-	A-22-049	35553
1-1/2"	18	.049	5/8"-18	2"	1-1/4"	-	A-24-049	35554
1-1/2"	17	.058	5/8"-18	2"	1-1/4"	-	A-24-058	35555
1-1/2"	16	.065	5/8"-18	2"	1-1/4"	-	A-24-065	35556
1-1/2"	14	.083	5/8"-18	2"	1-1/4"	-	A-24-083	35557
1-1/2"	13	.095	5/8"-18	2"	1-1/4"	-	A-24-095	35558
1-5/8"	16	.065	5/8"-18	2"	1-1/4"	-	A-26-065	35559

The above Tube End Forming Cutters require threaded shanks. See pages 78-80 for available shank styles and sizes.

Holding of tubing by hand is not recommended.

## EMT Tube End Forming Cutters

EMT for electrical conduit, standard thin wall type

### High Speed Steel

Tube O.D. Size	O.D.	I.D.	Wall Thickness	Shank Dia.	Shank Dia.	Severance Tool Name	EDP Order Number
3/8"	0.577	0.493	0.042	7/16"	1"	A-3/8-EMT	35579
1/2"	0.706	0.622	0.042	1/2"	1"	A-1/2-EMT	35580
3/4"	0.922	0.824	0.049	1/2"-20	-	A-3/4-EMT	35581
1"	1.163	1.049	0.057	1/2"-20	-	A-1-EMT	35582
1-1/4"	1.51	1.38	0.065	1/2"-20	-	A-1-1/4-EMT	35583
1-1/2"	1.74	1.61	0.065	5/8"-18	-	A-1-1/2-EMT	35584
2"	2.197	2.067	0.065	3/4"-16	-	A-2-EMT	35585

Tube End Forming Cutters for electrical conduit sizes 3/4" and larger require threaded shanks. See pages 78-80 for available shank styles and sizes.

## Tube Hole Deburring Cutters

**Inside Tube** - Place cutter head inside hole, bring back against inner wall edge; follow around inner contour of hole letting the shank act as a guide.

**Outside Tube** - Place cutter in hole at right angle to tubing length. Geometrically (for any size hole) the diameter of the tool and the outside diameter of the tubing should equal,

### High Speed Steel Inside Style

Cutting Dia.	Neck Dia.	Shank Dia.	Severance Tool Name	EDP Order Number
7/32"	.109"	1/4"	7/32-IAD	35660
1/4"	.125"	1/4"	1/4-IAD	35661
5/16"	.187"	1/4"	5/16-IAD	35662
3/8"	.187"	1/4"	3/8-IAD	35663
7/16"	.250"	1/4"	7/16-IAD	35664
1/2"	.250"	1/4"	1/2-IAD	35665

### High Speed Steel Outside Style

Cutting Dia.	Cutting Length	Shank Dia.	Severance Tool Name	EDP Order Number
5/16"	1"	1/4"	DLA-LHS	35666
3/8"	1"	1/4"	ELA-LHS	35667
1/2"	1/2"	1/4"	GGA-LHS	35668
5/8"	1"	1/4"	ILA-LHS	35669
3/4"	3/4"	1/4"	JJA-LHS	35670
1"	1"	1/4"	LLA-LHS	35671