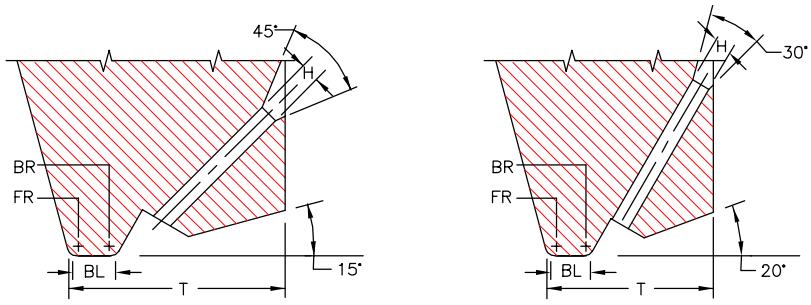
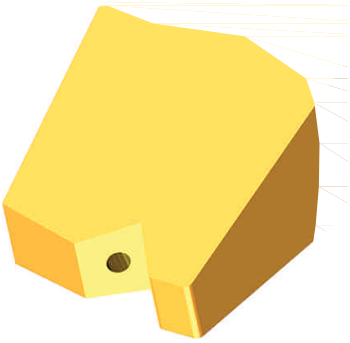
SERIES KSH

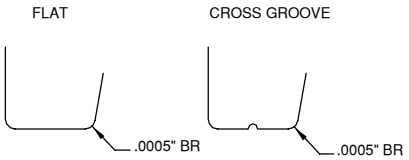
FOR MANUAL AND
SEMI-AUTOMATIC BONDERS

Double Flat ,Vertical Feed for Hughes, Palomar,
Hesse & Knipps and F&K Delvotec Bonders



FOR KSH-SERIES



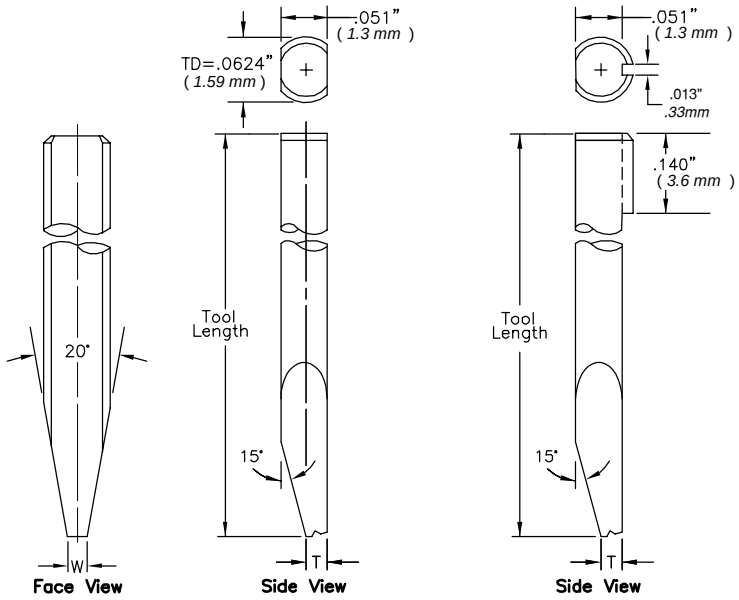


We recommend a .0005" back radius and a cross groove or a flat bond foot when ordering tools for gold wire thermosonic bonding. For more gold wire application information see **Tech Tips**

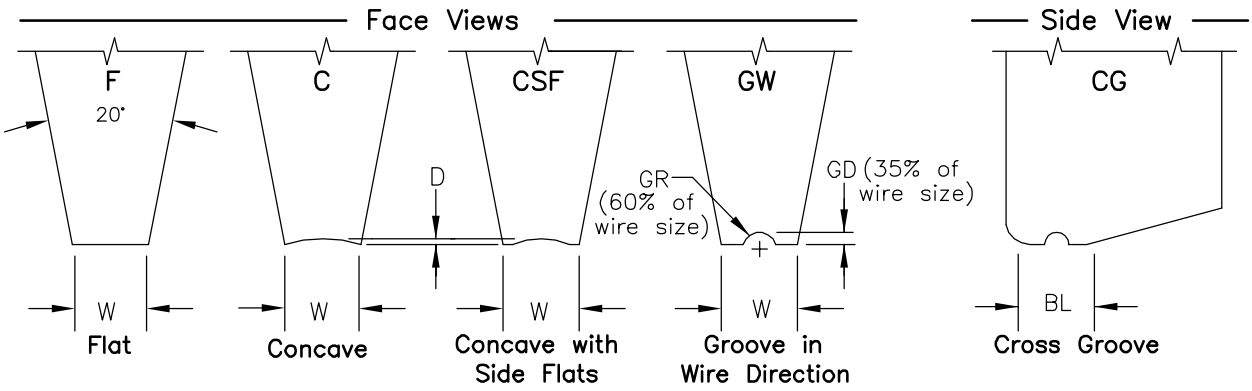
KSH-SERIES

WIREØ .0005" through .0020

S1 Option



Standard: Ø 1/16, Hole Angle: 45°,55°, 60°



SERIES KSH

SMALL WIRE

ORDERING INFORMATION
SMALL WIRE BONDING WEDGES
FOR GOLD AND ALUMINUM WIRE

SAMPLE PART NUMBER: M-KSH-D-1/16-3/4-45-CG-2020-M-*

SYMBOL EXPLANATION: 1 2 3 4 5 6 7 8 9 10

1. **MATERIAL:**
   - **M** = Ceramic
   - **C** = Tungsten Carbide
   - **T** = Titanium
   - **All other:** Material Selection Guide Tech Tips
2. **SERIES: KSH**
3. **FRONT/BACK RADIUS:** See Radius Option Chart
   *For special Radius sizes insert an X Please specify FR/BR
4. **SHANK DIA.:** Please Specify Diameter
5. **TOOL LENGTH: Please Specify Length**
6. **HOLE ANGLE: 45°,55°,60**
7. **(7) FOOT TYPE:**
   - **F** = Flat
   - **C** = Concave
   - **CSF** = Concave with Side Flats
     (CSF not available with ceramic tools)
   - **CG** = Cross Groove
   - **GW** = Groove in wire direction
     (Please specify wire size)
8. **(8) TOOL SIZE**: See Standard Chart
9. **(9) FOOT FINISH:**
   - **M =** Matte finish (FR, BR, & Bond Flat)
   - **P =** Polish finish (FR, BR, & Bond Flat)
   - **MP=** Polish finish (FR, BR), and Matte finish (Bond Flat)
10. **(10)** S1 and other Option See Tool Options

For special sizes or dimensions insert an (X) in the appropriate position of the part number then specify what (X) equals.
Example: M-KSH-X-1/16-3/4-45-F-2020-M (X) FR=.0012, BR=.0007

STANDARD CHART	KSH SMALL WIRE:				FOR WIRE DIAMETERS .0005" THROUGH .0020"									
TS	**H**		**BL**		**D**		**T 45°**		**T(55° 60°)**		**W**		**SUGGESTED WD**	
Units	in.	μ	in.	μ	in.	μ	in.	μ	in.	μ	in.	μ	in.	μ
Tolerance	±.0002	±5	±.0002	±5	-.0001	-2.5	±.0005	±13	±.0005	±13	**+ .0005**	±13		
1505	.0015	38	.0005	13	.0002	5	.0090	229	.0075	191	.0025	64		
1507	.0015	38	.0007	18	.0002	5	.0090	229	.0075	191	.0025	64	**.0005**	**13**
1510	.0015	38	.0010	25	.0002	5	.0100	254	.0080	203	.0025	64	**through**	
1513	.0015	38	.0013	33	.0002	5	.0100	254	.0080	203	.0025	64	**.0007**	**18**
1515	.0015	38	.0015	38	.0002	5	.0100	254	.0090	229	.0025	64		
1520	.0015	38	.0020	51	.0002	5	.0110	279	.0090	229	.0025	64		
Tolerance	±.0002	±5	±.0002	±5	-.0001	-2.5	±.0005	±13	±.0005	±13	**± .0002**	±5		
2010	.0020	51	.0010	25	.0002	5	.0100	254	.0090	229	* .0040	102		
2015	.0020	51	.0015	38	.0002	5	.0110	279	.0090	229	.0040	102	**.0007**	**18**
2020	.0020	51	.0020	51	.0002	5	.0110	279	.0100	254	.0040	102	**through**	
2025	.0020	51	.0025	64	.0002	5	.0120	305	.0100	254	.0040	102	**.0010**	**25**
2030	.0020	51	.0030	76	.0002	5	.0120	305	.0110	279	.0040	102		
2520	.0025	64	.0020	51	.0002	5	.0130	330	.0110	279	.0040	102		
2525	.0025	64	.0025	64	.0002	5	.0140	356	.0120	305	.0040	102		
2530	.0025	64	.0030	76	.0002	5	.0140	356	.0120	305	.0050	127	**.0013**	**33**
2535	.0025	64	.0035	89	.0002	5	.0150	381	.0125	318	.0050	127		
2540	.0025	64	.0040	102	.0002	5	.0150	381	.0125	318	.0050	127		
3020	.0030	76	.0020	51	.0003	8	.0130	330	.0115	292	.0050	127		
3025	.0030	76	.0025	64	.0003	8	.0140	356	.0115	292	.0050	127		
3030	.0030	76	.0030	76	.0003	8	.0140	356	.0125	318	.0050	127	**.0015**	**38**
3035	.0030	76	.0035	89	.0003	8	.0150	381	.0125	318	.0050	127		
3040	.0030	76	.0040	102	.0003	8	.0150	381	.0135	343	.0050	127		
3525	.0035	89	.0025	64	.0003	8	.0140	356	.0130	330	.0060	152		
3530	.0035	89	.0030	76	.0003	8	.0150	381	.0130	330	.0060	152		
3535	.0035	89	.0035	89	.0003	8	.0150	381	.0140	356	.0060	152	**.0020**	**51**
3540	.0035	89	.0040	102	.0003	8	.0160	406	.0140	356	.0060	152		
3545	.0035	89	.0045	114	.0003	8	.0160	406	.0150	381	.0060	152		
3550	.0035	89	.0050	127	.0003	8	.0160	406	.0150	381	.0060	152		

***Other sizes available upon request *All dimensions and tolerances are for reference only**
TOOL SIZE=TS , WIRE DIAMETER =WD "T" To be determined according to the size of FR and BR and Hole Bore Length