FONTANA GRUPPO
FASTENING THE FUTURE

MAG-FORM®

MINIMIZE DEBRIS GENERATION IN CRITICAL APPLICATIONS

Standard thread-forming fasteners with a 60° flank angle create excess debris when driven into low-ductile materials. They can easily exceed the ductility limits of the material, causing damage to the formed threads.

MAG-FORM® fasteners are specifically designed with a broader flank angle to eliminate tapping operations while forming strong threads in conventional magnesium die-castings and similar materials. The design also minimizes debris, making MAG-FORM® fasteners the optimal solution for critical applications such as electronics and air bag modules.

FEATURES

- Lobular configuration
- Wide-spaced thread design
- Broad flank angle that compresses, rather than roll-formsthreads into the mating material

BENEFITS

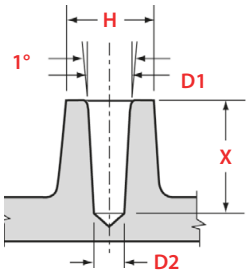
- Minimizing debris generation
- Forms strong threads in materials with low ductility
- Allows multiple removals and reinsertions, unlike standard fasteners
- Easily removed and reinserted for field service

STANDARD DESIGN GUIDELINES

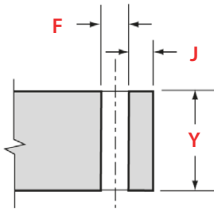
- Available in sizes MG1.0 to MG16
- Wide-spaced thread with broad flank angle
- Can be used with any external or internal head designs
- Can be used with all systems, including TORX PLUS® Drive System
- Zinc and Chromate to minimize galvanic corrosion

QUALITY FIRST. ENGINEERED TO LAST.®

SUGGESTED HOLE SIZES FOR DIE-CAST MAGNESIUM*



Cored Blind Hole



Drilled Hole

In order to utilize as much available screw strength as possible, the minimum length of thread engagement, excluding the two lead threads, should be equal to 2-1/2 times the basic screw size. Blind holes should be deep enough to allow a two-threaded lead with clearance, at the bottom of the hole. The included draft angle is 1.0°.

APPLIED SOLUTIONS

SCREW SIZE (METRIC)	HOLE DIA. AS CAST STD. TAPER				F HOLE DIA. AS DRILLED NORM.	Y THROUGH HOLE DEPTH NORM.	X BLIND HOLE CORE MIN.	H BOSS DIA MIN.	J DISTANCE TO EDGE W/O MEASURABLE DISTORTION
	TOP D1		BOTTOM D2						
	MAX	MIN	MAX	MIN					
	MM. IN.	MM. IN.	MM. IN.	MM. IN.	MM. IN.	MM. IN.	MM. IN.	MM. IN.	MM. IN.
MG3 X 1.0	2.85	2.77	2.72	2.64	2.75	7.50	10.50	6.75	2.00
	0.112	0.109	0.107	0.104	0.108	0.295	0.413	0.266	0.079
MG3.5 X 1.2	3.28	3.20	3.13	3.05	3.17	8.75	12.35	7.83	2.33
	0.129	0.126	0.123	0.120	0.125	0.344	0.486	0.308	0.092
MG4 X 1.4	3.70	3.62	3.52	3.44	3.57	10.00	14.20	8.90	2.67
	0.146	0.142	0.139	0.136	0.141	0.394	0.559	0.351	0.105
MG4.5 X 1.5	4.13	4.05	3.94	3.86	4.00	11.25	15.75	10.00	3.00
	0.163	0.160	0.155	0.152	0.157	0.443	0.620	0.394	0.118
MG5 X 1.6	4.58	4.50	4.36	4.28	4.43	12.50	17.30	11.10	3.33
	0.180	0.177	0.172	0.169	0.175	0.492	0.681	0.437	0.131
MG6 X 2.0	5.46	5.38	5.20	5.12	5.29	15.00	21.00	13.29	4.00
	0.215	0.212	0.205	0.202	0.208	0.591	0.827	0.523	0.157
MG7 X 2.0	6.49	6.41	6.18	6.10	6.29	17.50	23.50	15.63	4.67
	0.255	0.252	0.243	0.240	0.248	0.689	0.925	0.615	0.184
MG8 X 2.5	7.33	7.25	6.98	6.90	7.12	20.00	27.50	17.78	5.33
	0.289	0.285	0.275	0.272	0.280	0.787	0.925	0.700	0.210
MG10 X 3.0	9.20	9.12	8.76	8.68	8.94	25.00	34.00	22.27	6.67
	0.362	0.359	0.345	0.342	0.352	0.984	1.339	0.877	0.262
MG12 X 3.5	11.06	10.98	10.54	10.46	10.76	30.00	40.50	26.76	8.00
	0.436	0.432	0.415	0.412	0.424	1.181	1.594	1.054	0.135
MG14 X 4.0	12.93	12.85	12.32	12.24	12.59	35.00	47.00	31.25	9.33
	0.509	0.506	0.485	0.482	0.495	1.378	1.850	1.230	0.367
MG16 X 4.0	14.97	14.89	14.28	14.20	14.59	40.00	52.00	35.92	10.67
	0.590	0.586	0.562	0.559	0.574	1.575	2.047	1.414	0.420