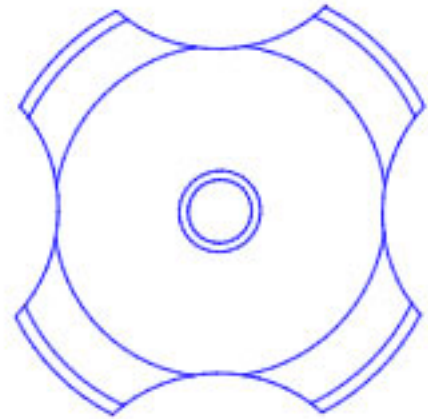
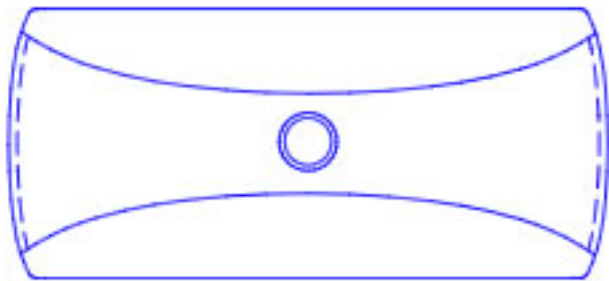
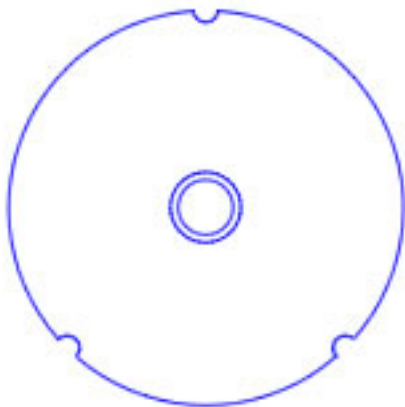


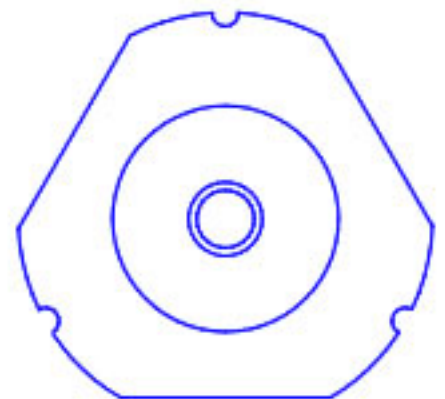
True Tone Industries Ltd.



# Stainless Steel Metal Dome Catalog



2006



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Diamond Electronics Limited



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# CERTIFICATE

The TÜV CERT Certification Body  
of TÜV Industrie Service GmbH  
TÜV Rheinland Group

certifies in accordance with  
TÜV CERT procedures that

## True Tone Ind. Ltd.

Flat E-F, 3/F, Flat E, 7/F, Flat L, 13/F, Winner Factory Building,  
55 Hung To Road, Kwun Tong, Kowloon, Hong Kong

has established and applies a quality management system for

### Design and Manufacturing of Metal Contact Domes for Electronic Industry

An audit was performed, Report No. **019126**.

Proof has been furnished that the requirements according to

**DIN EN ISO 9001:2000**

are fulfilled.

The certificate is valid until **2008-02-28**.

Certificate Registration No. **01 100 019126**



Cologne, 2005-04-21

First certification 2002

TÜV Rheinland Group

TÜV CERT Certification Body of  
TÜV Industrie Service GmbH

# PART NUMBER DEFINITION

## STAINLESS STEEL METAL DOMES

12-TDF-400

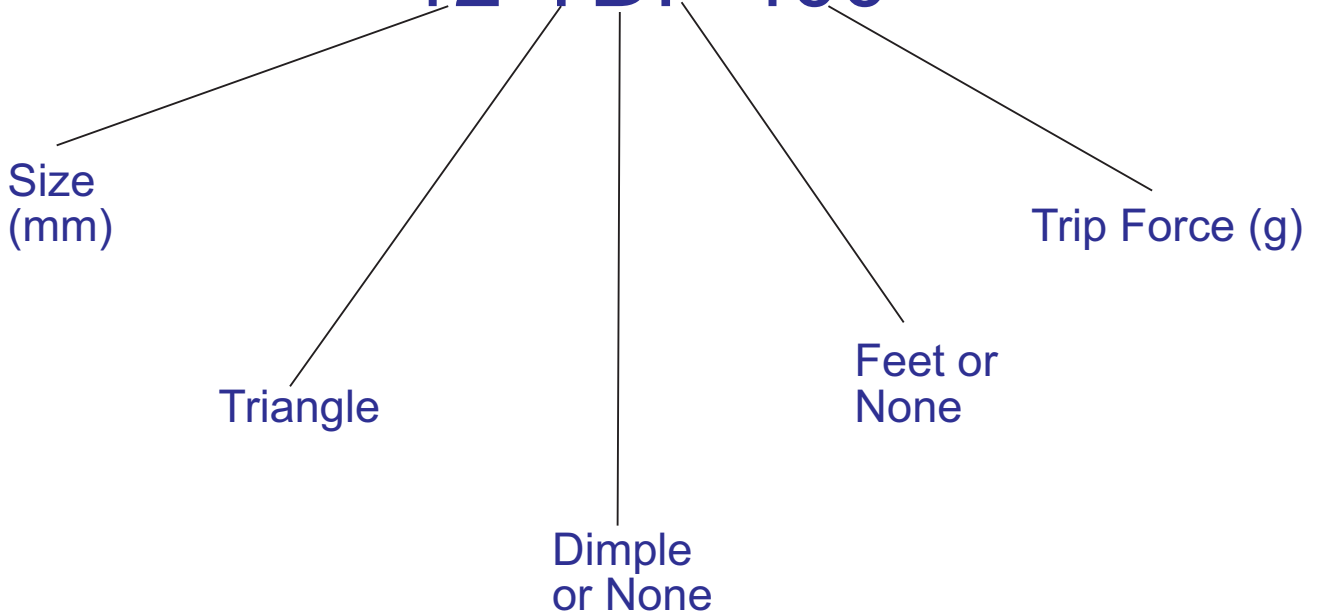
Size  
(mm)

Triangle

Dimple  
or None

Feet or  
None

Trip Force (g)



# Catalog Table of Contents

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# INTRODUCTION

True Tone Industries Limited has been in the business of manufacturing stainless steel domes for the membrane switch industry for over 20 years. We produce more metal domes, have a wider variety, and maintain a larger inventory than anyone else in the business.

## METAL DOME SPECIFICATION

### MATERIAL

Our stainless steel tactile domes are made from type 304 Stainless Steel. We selected this material because of its low carbon content (0.08%) which offers the best oxidation resistance. Material thickness is .00315", .00395", and .00470". Material is Vickers Hardness Hv-380 to Hv-420, We purchase our stainless steel from the United States and Japan.

### TOOLING

We have four (4) different tools for each dome size. We offer a wide range of actuation force (tactile pressure) for our domes. With four different tools we can compensate for the material thickness and hardness variations and better meet your actuation force requirements. Our standard range of actuation force is from 8 +/- 2.0 oz. Average (220 grams) to 20 +/- 2.0 oz. average (570 grams). Tactile pressure variations within a given lot of domes will be an average of 1.5 oz. From nominal. Upon request we can supply domes with actuation forces outside of our standard range, and custom dome designs are also available. We maintain our own in-house tool and die shop.

### LIFE EXPECTANCY

Life expectancy of our Metal Domes (domes only, using an ASTM approved rubber tip) exceeds 1,000,000 actuations. You may get different results in your life testing depending on :

1. The type and condition of the surface to which the dome is mounted.
2. The design of the tip that contacts the dome.
3. The amount of force and overtravel you apply to the dome.

## WHAT NEW IN 2005

### ISO 9001

ISO 9001:2000 Qualified.

### E-MAIL

We now have an E-mail address in place. If you are connected to the Internet, you can send information including : purchase orders, drawings, or any type of correspondence.

Our E-Mail address is : [Info@true-tone.com](mailto:Info@true-tone.com)

Our Home page is : <http://www.true-tone.com>

If you have any questions regarding e-mail or the Internet, please call us.

### NEW LABELS

As some of you may have noticed, we have changed the labels on our containers of domes to include :

Our Part Number

Our Lot Number

Quantity

Bag Number

### NEW PARTS

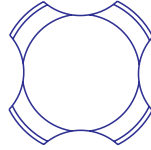
We have added a lot of new domes to our product line in the past year.

Please review the parts list for more information. Please call us if you need a custom dome or have a special requirement.

# AVAILABLE PARTS LIST

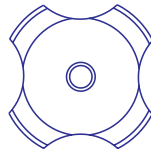
Part Number                      Size                      Shape                      Force (+/- 30g)

## 4 LEG DOMES



6-4-LEG-170	6mm	4 Leg (Star Shape), No Dimple	170g
6-4-LEG-230	6mm	4 Leg (Star Shape), No Dimple	230g
8.4-4-LEG-200	8mm	4 Leg (Star Shape), No Dimple	200g
8.4-4-LEG-280	8mm	4 Leg (Star Shape), No Dimple	280g
8.4-4-LEG-350	8mm	4 Leg (Star Shape), No Dimple	350g
10-4-LEG-320	10mm	4 Leg (Star Shape), No Dimple	320g
12.2-4-LEG-150	12mm	4 Leg (Star Shape), No Dimple	150g
12.2-4-LEG-200	12mm	4 Leg (Star Shape), No Dimple	200g
12.2-4-LEG-240	12mm	4 Leg (Star Shape), No Dimple	240g
12.2-4-LEG-280	12mm	4 Leg (Star Shape), No Dimple	280g
12.2-4-LEG-350	12mm	4 Leg (Star Shape), No Dimple	350g
12.2-4-LEG-400	12mm	4 Leg (Star Shape), No Dimple	400g
12.2-4-LEG-450	12mm	4 Leg (Star Shape), No Dimple	450g
16-4-LEG-400	16mm	4 Leg (Star Shape), No Dimple	400g
20-4-LEG-400	20mm	4 Leg (Star Shape), No Dimple	400g

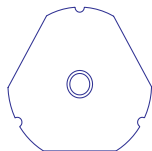
## 4 LEG WITH DIMPLE DOMES



8.4-4-LEG-D-280	8mm	4 Leg (Star Shape), With Dimple	280g
8.4-4-LEG-D-320	8mm	4 Leg (Star Shape), With Dimple	320g
8.4-4-LEG-D-350	8mm	4 Leg (Star Shape), With Dimple	350g
8.4-4-LEG-D-400	8mm	4 Leg (Star Shape), With Dimple	400g
12.2-4-LEG-D-250	12mm	4 Leg (Star Shape), With Dimple	250g
12.2-4-LEG-D-280	12mm	4 Leg (Star Shape), With Dimple	280g
12.2-4-LEG-D-350	12mm	4 Leg (Star Shape), With Dimple	350g
12.2-4-LEG-D-400	12mm	4 Leg (Star Shape), With Dimple	400g
16-4-LEG-D-350	16mm	4 Leg (Star Shape), With Dimple	350g
20-4-LEG-D-400	20mm	4 Leg (Star Shape), With Dimple	400g

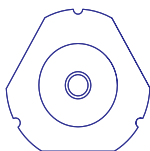
**Part Number**                      **Size**                      **Shape**                      **Force (+/- 30g)**

**TRIANGLE DOMES**



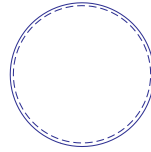
6-TDF-300	6mm	Triangle, With Dimple, With Feet	300g
6-TDF-350	6mm	Triangle, With Dimple, With Feet	350g
6-TDF-400	6mm	Triangle, With Dimple, With Feet	400g
7-TDF-200	7mm	Triangle, With Dimple, With Feet	200g
7-TDF-230	7mm	Triangle, With Dimple, With Feet	230g
8-TDF-240	8mm	Triangle, With Dimple, With Feet	240g
8-TDF-280	8mm	Triangle, With Dimple, With Feet	280g
8-TDF-350	8mm	Triangle, With Dimple, With Feet	350g
8-TDF-380	8mm	Triangle, With Dimple, With Feet	380g
8-TDF-450	8mm	Triangle, With Dimple, With Feet	450g
9-TDF-150	9mm	Triangle, With Dimple, With Feet	150g
9-TDF-240	9mm	Triangle, With Dimple, With Feet	240g
9-TDF-280	9mm	Triangle, With Dimple, With Feet	280g
9-TDF-350	9mm	Triangle, With Dimple, With Feet	350g
9-TDF-400	9mm	Triangle, With Dimple, With Feet	400g
9-TDF-450	9mm	Triangle, With Dimple, With Feet	450g
9-TDF-480	9mm	Triangle, With Dimple, With Feet	480g
10-TDF-180	10mm	Triangle, With Dimple, With Feet	180g
10-TDF-240	10mm	Triangle, With Dimple, With Feet	240g
10-TDF-280	10mm	Triangle, With Dimple, With Feet	280g
10-TDF-350	10mm	Triangle, With Dimple, With Feet	350g
10-TDF-400	10mm	Triangle, With Dimple, With Feet	400g
10-TDF-550	10mm	Triangle, With Dimple, With Feet	550g
12-TDF-240	12mm	Triangle, With Dimple, With Feet	240g
12-TDF-280	12mm	Triangle, With Dimple, With Feet	280g
12-TDF-350	12mm	Triangle, With Dimple, With Feet	350g
12-TDF-400	12mm	Triangle, With Dimple, With Feet	400g

**TRIANGLE FLAT TOP DOMES**

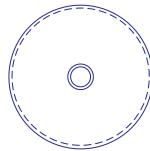


8-TDF-TOP-400	8mm	Triangle Flat Top, With Dimple, With Feet	400g
9-TDF-TOP-400	9mm	Triangle Flat Top, With Dimple, With Feet	400g
10-TDF-TOP-320	10mm	Triangle Flat Top, With Dimple, With Feet	320g
10-TDF-TOP-400	10mm	Triangle Flat Top, With Dimple, With Feet	400g
12-TDF-TOP-400	12mm	Triangle Flat Top, With Dimple, With Feet	400g

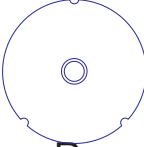


**PART NUMBER****SIZE****SHAPE**  
**RNN DOMES****FORCE (+/- 30g)**

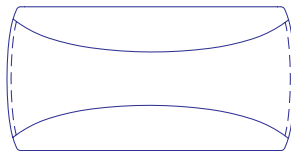
5-RNN-180	5.0mm	Round, No Dimple, No Feet	180g
5-RNN-280	5.0mm	Round, No Dimple, No Feet	280g
5-RNN-350	5.0mm	Round, No Dimple, No Feet	350g
5.6-RNN-200	5.6mm	Round, No Dimple, No Feet	200g
5.6-RNN-280	5.6mm	Round, No Dimple, No Feet	280g
6-RNN-280	6.0mm	Round, No Dimple, No Feet	280g
6.9-RNN-180	6.9mm	Round, No Dimple, No Feet	180g
6.9-RNN-280	6.9mm	Round, No Dimple, No Feet	280g
6.9-RNN-350	6.9mm	Round, No Dimple, No Feet	350g
8.8-RNN-240	8.8mm	Round, No Dimple, No Feet	240g
8.8-RNN-280	8.8mm	Round, No Dimple, No Feet	280g
8.8-RNN-350	8.8mm	Round, No Dimple, No Feet	350g
12.7-RNN-280	12.7mm	Round, No Dimple, No Feet	280g
16-RNN-350	16.0mm	Round, No Dimple, No Feet	350g

**RDN DOMES**

8-RDN-240	8.0mm	Round, With Large Dimple, No Feet	240g
8-RDN-280	8.0mm	Round, With Large Dimple, No Feet	280g
8-RDN-350	8.0mm	Round, With Large Dimple, No Feet	350g
9-RDN-240	9.0mm	Round, With Large Dimple, No Feet	240g
9-RDN-280	9.0mm	Round, With Large Dimple, No Feet	280g
9-RDN-350	9.0mm	Round, With Large Dimple, No Feet	350g
9-RDN-400	9.0mm	Round, With Large Dimple, No Feet	400g
10-RDN-240	10.0mm	Round, With Large Dimple, No Feet	240g
10-RDN-280	10.0mm	Round, With Large Dimple, No Feet	280g
10-RDN-350	10.0mm	Round, With Large Dimple, No Feet	350g
10-RDN-400	10.0mm	Round, With Large Dimple, No Feet	400g
12-RDN-240	12.0mm	Round, With Large Dimple, No Feet	240g
12-RDN-280	12.0mm	Round, With Large Dimple, No Feet	280g
12-RDN-350	12.0mm	Round, With Large Dimple, No Feet	350g
12-RDN-400	12.0mm	Round, With Large Dimple, No Feet	400g
12.7-RDN-280	12.7mm	Round, With Large Dimple, No Feet	280g
12.7-RDN-350	12.7mm	Round, With Large Dimple, No Feet	350g
12.7-RDN-400	12.7mm	Round, With Large Dimple, No Feet	400g

Part Number	Size	Shape RDF DOMES	Force (+/-30g)
			
8-RDF-240	8mm	Round, With Dimple, With Feet	240g
8-RDF-280	8mm	Round, With Dimple, With Feet	280g
8-RDF-350	8mm	Round, With Dimple, With Feet	350g
8-RDF-400	8mm	Round, With Dimple, With Feet	400g
9-RDF-240	9mm	Round, With Dimple, With Feet	240g
9-RDF-280	9mm	Round, With Dimple, With Feet	280g
9-RDF-350	9mm	Round, With Dimple, With Feet	350g
9-RDF-400	9mm	Round, With Dimple, With Feet	400g
10-RDF-150	10mm	Round, With Dimple, With Feet	150g
10-RDF-240	10mm	Round, With Dimple, With Feet	240g
10-RDF-280	10mm	Round, With Dimple, With Feet	280g
10-RDF-350	10mm	Round, With Dimple, With Feet	350g
10-RDF-400	10mm	Round, With Dimple, With Feet	400g
12-RDF-240	12mm	Round, With Dimple, With Feet	240g
12-RDF-280	12mm	Round, With Dimple, With Feet	280g
12-RDF-350	12mm	Round, With Dimple, With Feet	350g
12-RDF-400	12mm	Round, With Dimple, With Feet	400g
12.7-RDF280	12.7mm	Round, With Dimple, With Fee	280g
12.7-RDF-350	12.7mm	Round, With Dimple, With Feet	350g
12.7-RDF-400	12.7mm	Round, With Dimple, With Feet	400g
13-RDF-280	13mm	Round, With Dimple, With Feet	280g
13-RDF-350	13mm	Round, With Dimple, With Fee	350g
13-RDF-400	13mm	Round, With Dimple, With Feet	400g
13-RDF-480	13mm	Round, With Dimple, With Feet	480g

### ONN DOMES



8.89X17.78-ONN-280	8.89X17.78mm	Oblong, No Dimple, No Feet	280g
8.89X17.78-ONN-350	8.89x17.78mm	Oblong, No Dimple, No Feet	350g
12.7X25.4-ONN-150	12.7X25.4mm	Oblong, No Dimple, No Feet	150g
12.7X25.4-ONN-280	12.7X25.4mm	Oblong, No Dimple, No Feet	280g
12.7X25.4-ONN-350	12.7X25.4mm	Oblong, No Dimple, No Feet	350g

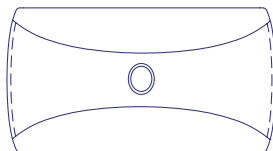
**Part Number**

**Size**

**Shape**

**Force(+/- 30g)**

**ODN DOMES**



8.89X17.78-ODN-280	8.89X17.78mm	Oblong, With Dimple, No Feet	280g
8.89X17.78-ODN-350	8.89X17.78mm	Oblong, With Dimple, No Feet	350g
12.7X25.4-ODN-280	12.7X25.4mm	Oblong, With Dimple, No Feet	280g
12.7X25.4-ODN-350	12.7X25.4mm	Oblong, With Dimple, No Feet	350g
12.7X38.1-ODN-350	12.7X38.1mm	Oblong, With Dimple, No Feet	350g

## ACTIVATION FORCE CONVERSION

### Ounces

8.00  
10.00  
12.00  
14.00  
16.00  
18.00  
20.00

### Grams

227.00  
284.00  
340.00  
397.00  
454.00  
510.00  
567.00

### Newtons

2.22  
2.78  
3.33  
3.89  
4.44  
4.99  
5.54

## SIZE CONVERSION

### Millimeters

4.10  
5.00  
5.60  
6.00  
6.90  
8.00  
8.80  
9.00  
10.00  
11.00  
12.00  
12.70  
16.00  
19.00  
20.00  
38.10  
50.80

### Inches

0.16  
0.20  
0.22  
0.24  
0.27  
0.31  
0.35  
0.36  
0.39  
0.43  
0.47  
0.50  
0.63  
0.75  
0.79  
1.50  
2.00

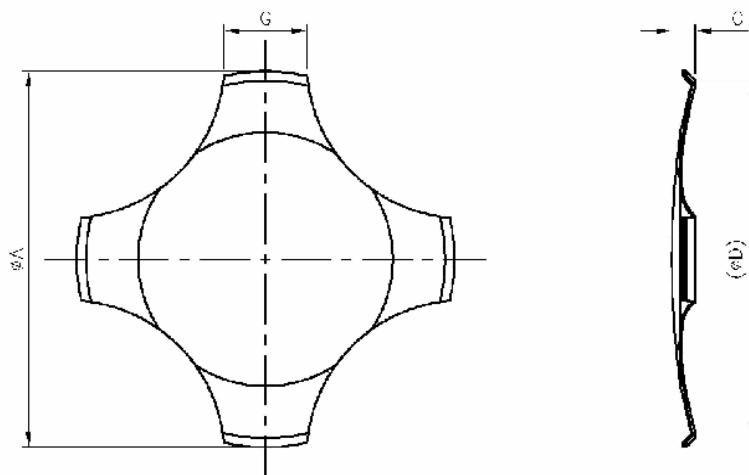
# 4-LEG FAMILY

Part No.	Material Thickness	Outer Dia. $\varnothing A$	Height C	Foot Print $\varnothing D$	Leg Width G	Trip Force
6-4-LEG-170	0.06	6.00	0.38	(5.70)	1.23	170g
6-4-LEG-200	0.06	6.00	0.40	(5.70)	1.23	200g
6-4-LEG-230	0.06	6.00	0.47	(5.70)	1.23	230g
6-4-LEG-250	0.06	6.00	0.50	(5.70)	1.23	250g
6-4-LEG-280	0.06	6.00	0.53	(5.70)	1.23	280g
7-4-LEG-180	0.06	7.00	0.43	(6.40)	1.58	180g
7-4-LEG-200	0.06	7.00	0.44	(6.40)	1.58	200g
7-4-LEG-350	0.08	7.00	0.44	(6.40)	1.58	350g
7-4-LEG-400	0.08	7.00	0.48	(6.40)	1.58	400g
8.4-4-LEG-150	0.08	8.40	0.41	(7.70)	1.79	150g
8.4-4-LEG-200	0.08	8.40	0.44	(7.70)	1.49	200g
8.4-4-LEG-280	0.08	8.40	0.48	(7.70)	1.49	280g
8.4-4-LEG-350	0.08	8.40	0.54	(7.70)	1.49	350g
8.4-4-LEG-400	0.08	8.40	0.58	(7.70)	1.49	400g
8.4-4-LEG-450	0.08	8.40	0.69	(7.70)	1.49	450g
10-4-LEG-150	0.08	10.00	0.47	(9.50)	2.35	150g
10-4-LEG-200	0.08	10.00	0.49	(9.40)	2.35	200g
10-4-LEG-280	0.10	10.00	0.51	(9.40)	2.35	280g
10-4-LEG-320	0.10	10.00	0.54	(9.40)	2.35	320g
10-4-LEG-400	0.10	10.00	0.60	(9.40)	2.35	400g
12.2-4-LEG-150	0.10	12.00	0.49	(11.40)	2.60	150g
12.2-4-LEG-200	0.10	12.00	0.51	(11.40)	2.60	200g
12.2-4-LEG-280	0.10	12.00	0.58	(11.40)	2.65	280g
12.2-4-LEG-350	0.10	12.00	0.67	(11.40)	2.65	350g
12.2-4-LEG-400	0.10	12.00	0.71	(11.40)	2.65	400g
12.2-4-LEG-420	0.10	12.00	0.72	(11.40)	2.65	420g
14-4-LEG-400	0.12	14.00	0.74	(13.50)	2.80	400g
16-4-LEG-400	0.12	16.00	0.82	(14.80)	3.25	400g
20-4-LEG-400	0.12	19.85	1.05	(19.20)	4.02	400g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.



### Dome Specifications

Contact Configuration _____	SPST, Normally Open
Contact Bounce (on) _____	<.3 ms
Contact Bounce (off) _____	<.6 ms
Operating Temperature _____	-55 C to 125 C
Storage Temperature _____	-55 C to 125 C
Humidity _____	0 - 97% (no condensation)
Contact Resistance _____	<100 ohms
with gold or silver plating _____	<1 ohm
Voltage/Current Maximums _____	12 ma @ 24 volts DC, RL
Breakdown Voltage _____	Over 200 volts

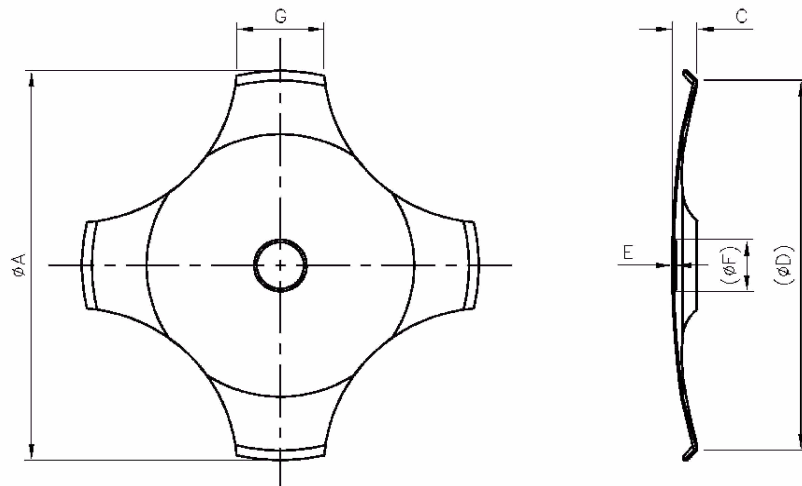
# 4-LEG-D FAMILY

Part No.	Material Thickness	Outer Diameter $\phi A$	Height C	Foot Print $\phi D$	Dimple Depth E	Dimple Dia. $\phi F$	Leg Width G	Trip Force
6-4-LEG-D-170	0.06	6.00	0.43	(5.70)	0.08	1.20	1.23	170g
6-4-LEG-D-230	0.06	6.00	0.45	(5.70)	0.05	1.20	1.23	230g
6-4-LEG-D-250	0.06	6.00	0.49	(5.70)	0.08	1.20	1.23	250g
8-4-4-LEG-D-150	0.08	8.40	0.41	(7.70)	0.08	(1.40)	1.90	150g
8-4-4-LEG-D-200	0.08	8.40	0.47	(7.70)	0.08	(1.40)	1.90	200g
8-4-4-LEG-D-280	0.08	8.40	0.51	(7.70)	0.08	(1.40)	1.90	280g
8-4-4-LEG-D-350	0.08	8.40	0.56	(7.70)	0.08	(1.40)	1.90	350g
8-4-4-LEG-D-450	0.08	8.40	0.62	(7.70)	0.08	(1.40)	1.90	450g
10-4-LEG-D-200	0.08	10.00	0.52	(9.40)	0.08	(1.50)	2.35	200g
10-4-LEG-D-280	0.08	10.00	0.60	(9.40)	0.08	(1.50)	2.35	280g
10-4-LEG-D-320	0.08	10.00	0.62	(9.40)	0.08	(1.50)	2.35	320g
10-4-LEG-D-350	0.08	10.00	0.63	(9.40)	0.08	(1.50)	2.35	350g
10-4-LEG-D-400	0.08	10.00	0.70	(9.40)	0.08	(1.50)	2.35	400g
12.2-4-LEG-D-200	0.10	12.00	0.55	(11.4)	0.08	(1.60)	2.65	200g
12.2-4-LEG-D-220	0.10	12.00	0.57	(11.4)	0.08	(1.60)	2.65	220g
12.2-4-LEG-D-250	0.10	12.00	0.58	(11.4)	0.08	(1.60)	2.65	250g
12.2-4-LEG-D-280	0.10	12.00	0.63	(11.4)	0.08	(1.60)	2.65	280g
12.2-4-LEG-D-300	0.10	12.00	0.65	(11.4)	0.08	(1.60)	2.65	300g
12.2-4-LEG-D-320	0.10	12.00	0.66	(11.4)	0.08	(1.60)	2.65	320g
12.2-4-LEG-D-350	0.10	12.00	0.69	(11.4)	0.08	(1.60)	2.65	350g
12.2-4-LEG-D-400	0.10	12.00	0.75	(11.4)	0.08	(1.60)	2.65	400g
12.2-4-LEG-D-450	0.10	12.00	0.77	(11.4)	0.08	(1.60)	2.65	450g
12.2-4-LEG-D-480	0.10	12.00	0.81	(11.4)	0.08	(1.60)	2.65	480g
12.2-4-LEG-D-700	0.11	12.00	0.92	(11.4)	0.08	(1.60)	2.65	700g
14-4-LEG-D-400	0.12	14.10	0.77	(13.0)	0.08	(2.00)	2.80	400g
16-4-LEG-D-350	0.10	16.00	0.93	(14.8)	0.11	(2.90)	3.26	350g
16-4-LEG-D-400	0.10	16.00	0.95	(14.8)	0.11	(2.90)	3.26	400g
16-4-LEG-D-600	0.12	16.00	1.07	(14.8)	0.11	(2.90)	3.26	600g
20-4-LEG-D-400	0.12	19.85	1.05	(19.2)	0.11	(2.80)	4.02	400g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.

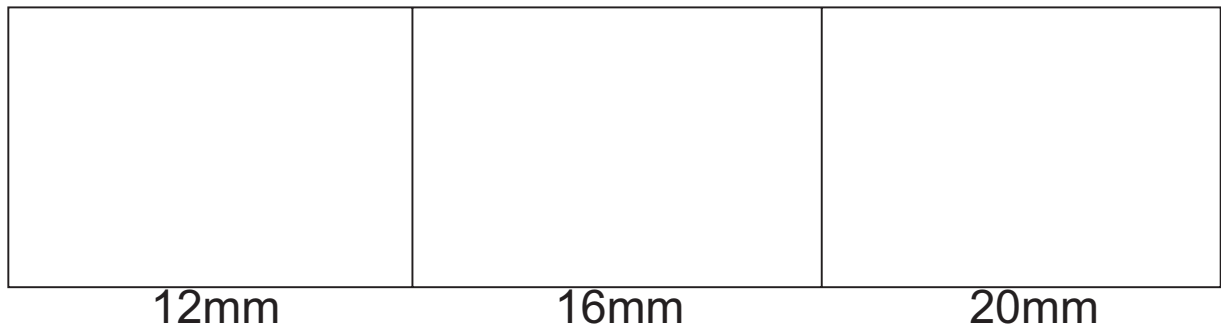
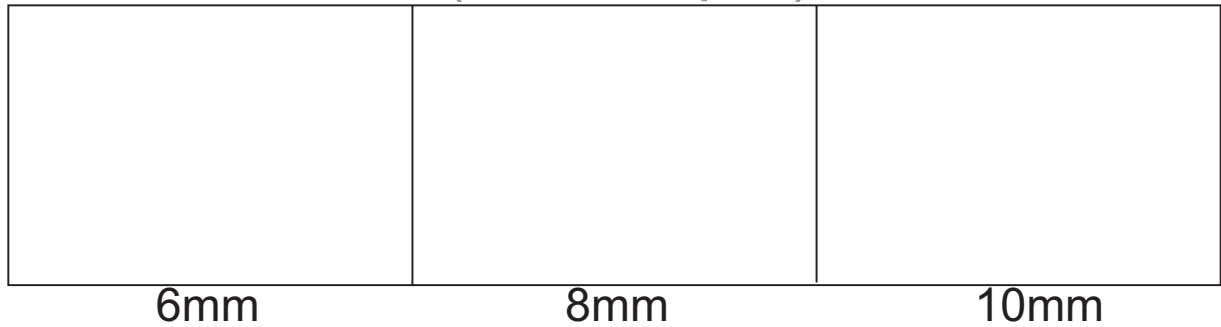


### Dome Specifications

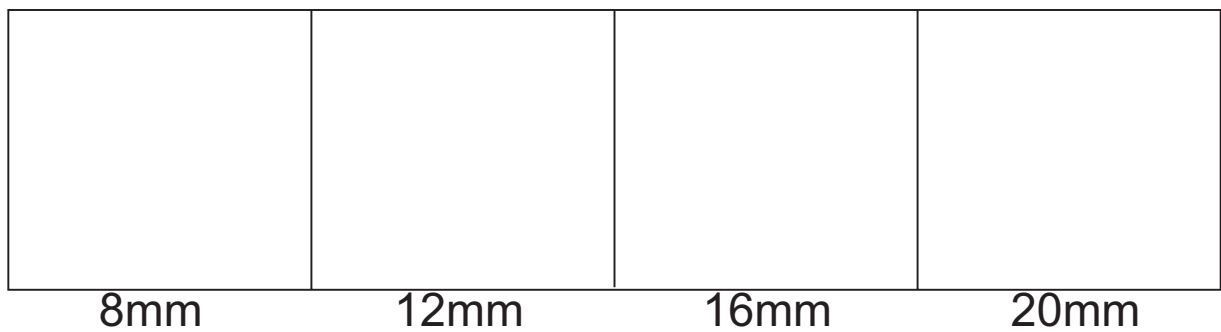
Contact Configuration	_____	SPST, Normally Open
Contact Bounce (on)	_____	<.3 ms
Contact Bounce (off)	_____	<.6 ms
Operating Temperature	_____	-55 C to 125 C
Storage Temperature	_____	-55 C to 125 C
Humidity	_____	0 - 97% (no condensation)
Contact Resistance	_____	<100 ohms
with gold or silver plating	_____	<1 ohm
Voltage/Current Maximums	_____	12 ma @ 24 volts DC, RL
Breakdown Voltage	_____	Over 200 volts



### 4-LEG DOMES (No Dimple)



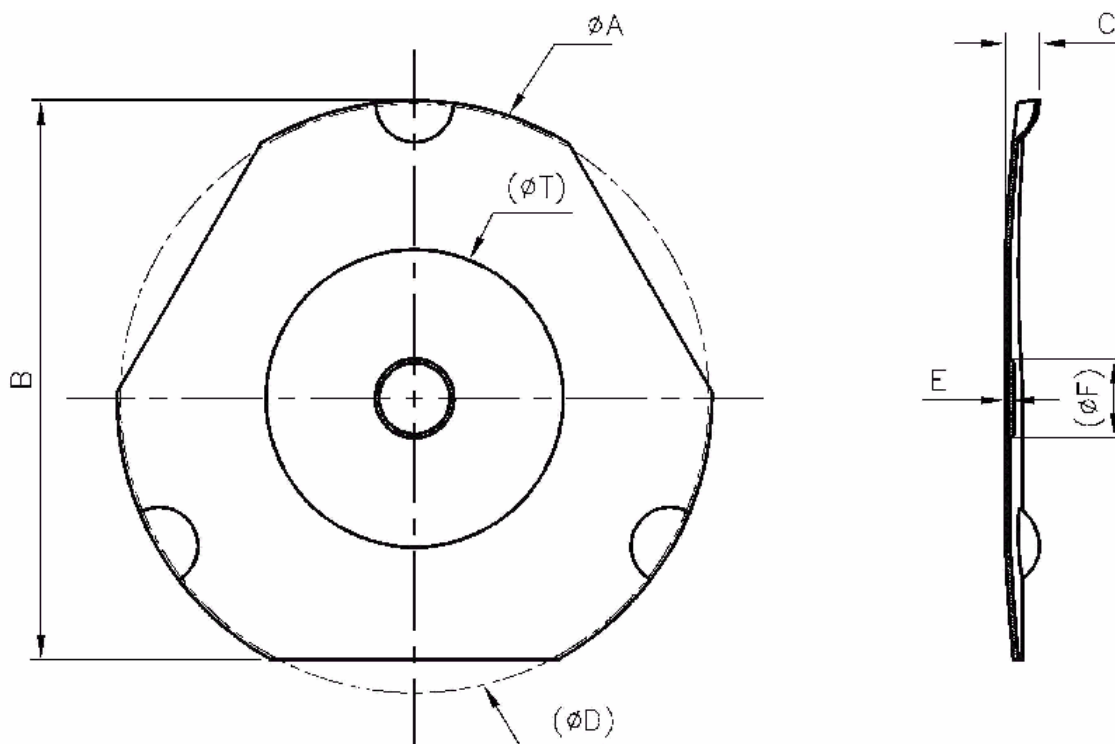
### 4-LEG DOMES (With Dimple)



# TDF TOP FAMILY

Part No.	Material Thickness	Outer Dia. $\phi A$	Body Width B	Height C	Foot Print $\phi D$	Dimple Depth E	Dimple Dia $\phi F$	Flat Top Dia. $\phi T$	Trip Force
6-TDF-TOP-400	0.08	6.00	5.60	0.48	(5.80)	0.08	(1.2)	(4.0)	400g
8-TDF-LTOP-400	0.08	8.00	7.45	0.54	(7.80)	0.08	(1.6)	(6.0)	400g
9-TDF-TOP-400	0.08	9.00	8.25	0.61	(8.80)	0.08	(1.6)	(6.0)	400g
10-TDF-TOP-400	0.10	10.0	9.25	0.61	(9.80)	0.08	(1.6)	(7.0)	400g
12-TDF-TOP-400	0.10	12.0	11.0	0.69	(11.8)	0.08	(1.6)	(8.0)	400g
12.7-TDF-TOP-400	0.10	12.7	11.2	0.65	(11.0)	0.08	(2.0)	(8.8)	400g

- \* All measurements in millimeters.
- \* Dimensions in bracket are just for reference only.
- \* All dimensions subjected to change without any notice.



Dome Specifications	
Contact Configuration	SPST, Normally Open
Contact Bounce (on)	<3 ms
Contact Bounce (off)	<6 ms
Operating Temperature	-55 C to 125 C
Storage Temperature	-55 C to 125 C
Humidity	0 - 97% (no condensation)
Contact Resistance	<100 ohms
with gold or silver plating	<1 ohm
Voltage/Current Maximums	12 ma @ 24 volts DC, RL
Breakdown Voltage	Over 200 volts



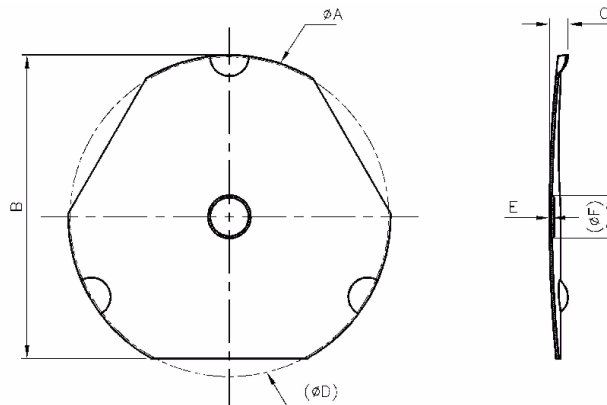
## TDF FAMILY

Part No.	Material Thickness	Outer Dia. $\varnothing A$	Body Width B	Height C	Foot Print $\varnothing D$	Dimple Depth E	Dimple Dia. $\varnothing F$	Tip Force
5-TDF-160	0.06	5.00	4.55	0.43	(4.8)	0.08	(1.2)	160g
5-TDF-200	0.06	5.00	4.55	0.46	(4.8)	0.05	(1.2)	200g
5-TDF-300	0.06	5.00	4.55	0.50	(4.8)	0.08	(1.2)	300g
6-TDF-200	0.06	6.00	5.35	0.48	(5.8)	0.08	(1.2)	200g
6-TDF-280	0.08	6.00	5.35	0.52	(5.8)	0.08	(1.2)	280g
6-TDF-300	0.08	6.00	5.35	0.52	(5.8)	0.08	(1.2)	300g
6-TDF-350	0.08	6.00	5.35	0.54	(5.8)	0.08	(1.2)	350g
6-TDF-500	0.08	6.00	5.35	0.57	(5.8)	0.08	(1.2)	500g
7-TDF-120	0.06	7.00	6.25	0.39	(6.8)	0.08	(1.4)	120g
7-TDF-200	0.08	7.00	6.25	0.44	(6.8)	0.08	(1.4)	200g
7-TDF-230	0.08	7.00	6.25	0.47	(6.8)	0.08	(1.4)	230g
7-TDF-280	0.08	7.00	6.25	0.54	(6.8)	0.08	(1.4)	280g
7-TDF-400	0.08	7.00	6.25	0.57	(6.8)	0.08	(1.4)	400g
8-TDF-120	0.06	8.00	7.25	0.40	(7.8)	0.08	(1.6)	120g
8-TDF-200	0.08	8.00	7.25	0.57	(7.8)	0.08	(1.6)	200g
8-TDF-240	0.08	8.00	7.25	0.52	(7.8)	0.08	(1.6)	240g
8-TDF-280	0.08	8.00	7.20	0.55	(7.8)	0.08	(1.6)	280g
8-TDF-300	0.08	8.00	7.20	0.57	(7.8)	0.08	(1.6)	300g
8-TDF-350	0.08	8.00	7.20	0.58	(7.8)	0.08	(1.6)	350g
8-TDF-400	0.08	8.00	7.20	0.63	(7.8)	0.08	(1.6)	400g
8-TDF-450	0.08	8.00	7.15	0.65	(7.8)	0.08	(1.6)	450g
9-TDF-150	0.08	9.00	8.25	0.47	(8.8)	0.08	(1.6)	180g
9-TDF-240	0.08	9.00	8.25	0.54	(8.8)	0.08	(1.6)	240g
9-TDF-280	0.08	9.00	8.25	0.59	(8.8)	0.08	(1.6)	280g
9-TDF-300	0.08	9.00	8.25	0.59	(8.8)	0.08	(1.6)	300g
9-TDF-350	0.08	9.00	8.25	0.62	(8.8)	0.08	(1.6)	350g
9-TDF-400	0.08	9.00	8.25	0.66	(8.8)	0.08	(1.6)	400g
9-TDF-480	0.10	9.00	8.25	0.67	(8.8)	0.08	(1.6)	480g
10-TDF-180	0.08	10.0	9.25	0.52	(9.8)	0.08	(1.6)	180g
10-TDF-240	0.10	10.0	9.25	0.53	(9.8)	0.08	(1.6)	240g
10-TDF-280	0.10	10.0	9.25	0.55	(9.8)	0.08	(1.6)	280g
10-TDF-350	0.10	10.0	9.25	0.57	(9.8)	0.08	(1.6)	350g
10-TDF-400	0.10	10.0	9.25	0.59	(9.8)	0.08	(1.6)	400g
10-TDF-550	0.10	10.0	9.25	0.70	(9.8)	0.08	(1.6)	550g
12-TDF-200	0.12	12.0	11.25	0.57	(11.8)	0.08	(1.6)	200g
12-TDF-240	0.12	12.0	11.25	0.59	(11.8)	0.08	(1.6)	240g
12-TDF-280	0.12	12.0	11.25	0.62	(11.8)	0.08	(1.6)	280g
12-TDF-340	0.12	12.0	11.25	0.65	(11.8)	0.08	(1.6)	340g
12-TDF-350	0.12	12.0	11.25	0.65	(11.8)	0.08	(1.6)	350g
12-TDF-400	0.12	12.0	11.25	0.66	(11.8)	0.08	(1.6)	400g
12-TDF-480	0.12	12.0	11.25	0.66	(11.8)	0.08	(1.6)	480g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.

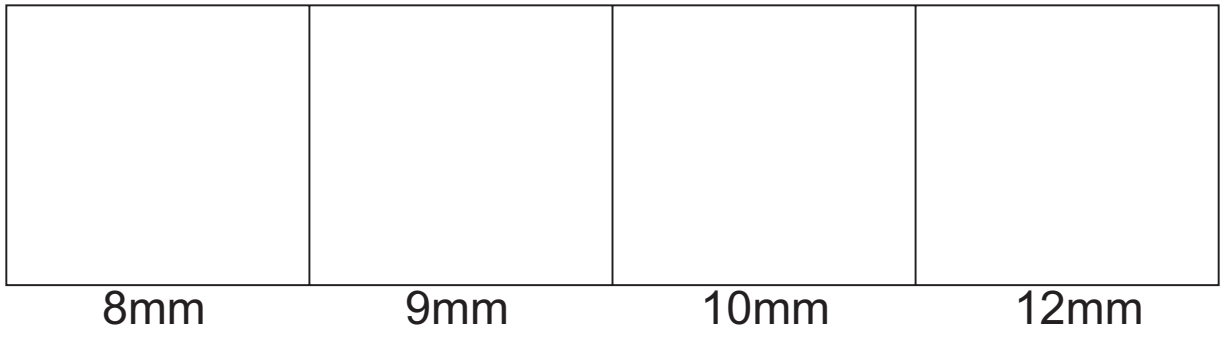


### Dome Specifications

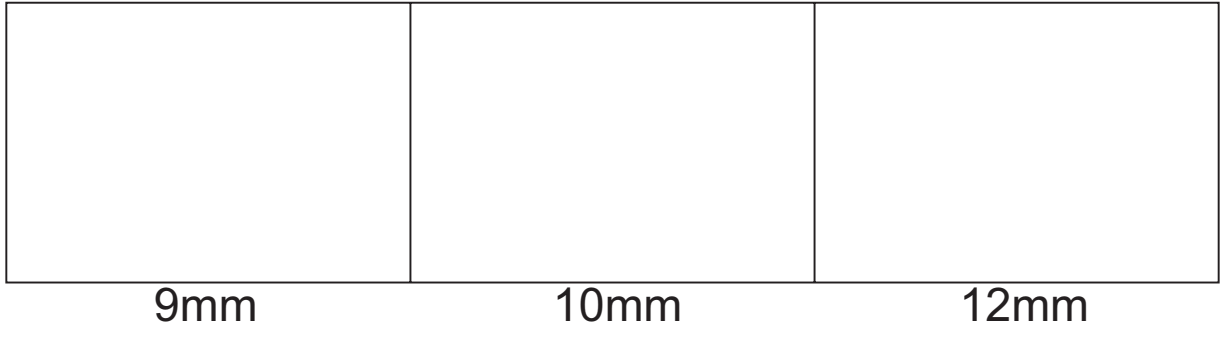
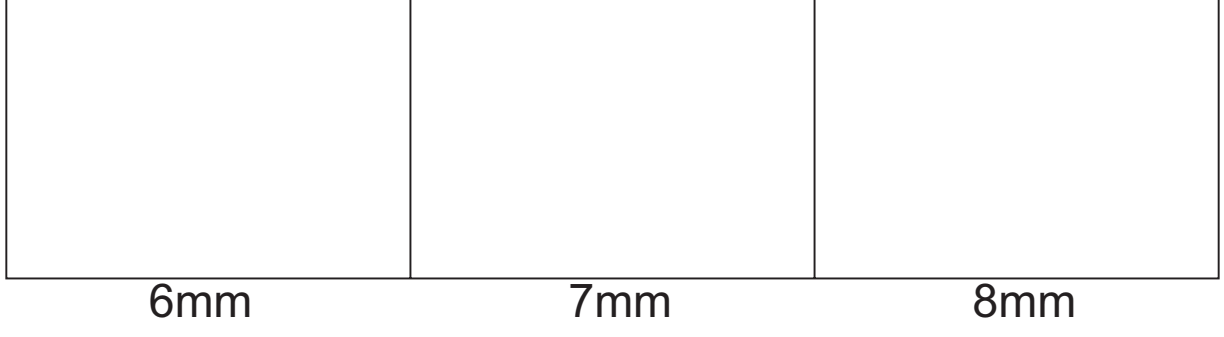
Contact Configuration	SPST, Normally Open
Contact Bounce (on)	<3 ms
Contact Bounce (off)	<6 ms
Operating Temperature	-55 C to 125 C
Storage Temperature	-55 C to 125 C
Humidity	0 - 97% (no condensation)
Contact Resistance	<100 ohms
with gold or silver plating	<1 ohm
Voltage/Current Maximums	12 ma @ 24 volts DC, RL
Breakdown Voltage	Over 200 volts



## TRIANGLE DOMES (Flat Top)



## TRIANGLE DOMES



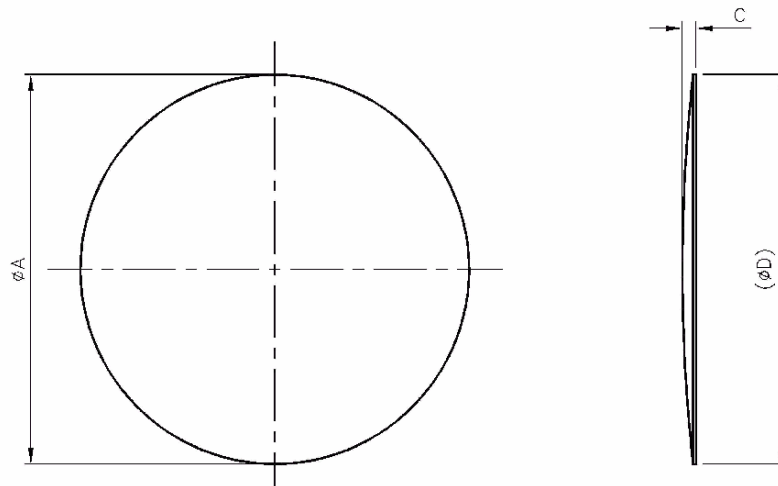
# RNN FAMILY

Part No.	Material Thickness	Outer Dia. $\phi A$	Height C	Foot Print $\phi D$	Trip Force
4-RNN-200	0.06	4.00	0.21	(4.0)	200g
4-RNN-250	0.06	4.00	0.23	(4.0)	250g
4.5-RNN-200	0.06	4.50	0.23	(4.5)	200g
5-RNN-150	0.06	5.00	0.21	(5.0)	150g
5-RNN-180	0.06	5.00	0.22	(5.0)	180g
5-RNN-250	0.06	5.00	0.26	(5.0)	250g
5-RNN-280	0.06	5.00	0.27	(5.0)	280g
5-RNN-350	0.08	5.00	0.28	(5.0)	350g
5.6-RNN-300	0.08	5.60	0.28	(5.6)	300g
6-RNN-180	0.06	6.00	0.26	(6.0)	180g
6-RNN-280	0.08	6.00	0.27	(6.0)	280g
6-RNN-300	0.08	6.00	0.29	(6.0)	300g
6.9-RNN-180	0.08	6.90	0.27	(6.9)	180g
6.9-RNN-280	0.08	6.90	0.30	(6.9)	280g
6.9-RNN-300	0.08	6.90	0.32	(6.9)	300g
6.9-RNN-350	0.08	6.90	0.35	(6.9)	350g
8.8-RNN-280	0.08	8.80	0.35	(8.8)	280g
8.8-RNN-350	0.08	8.80	0.40	(8.8)	350g
8.8-RNN-400	0.08	8.80	0.43	(8.8)	400g
10.8-RNN-350	0.10	10.8	0.40	(10.8)	350g
12.7-RNN-280	0.10	12.7	0.43	(12.7)	280g
12.7-RNN-350	0.10	12.7	0.47	(12.7)	350g
16-RNN-350	0.12	16.0	0.55	(16.0)	350g
16-RNN-400	0.12	16.0	0.58	(16.0)	400g
19-RNN-400	0.12	19.0	0.65	(19.0)	400g
20-RNN-400	0.12	20.0	0.60	(20.0)	400g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.



### Dome Specifications

Contact Configuration	_____	SPST, Normally Open
Contact Bounce (on)	_____	<.3 ms
Contact Bounce (off)	_____	<.6 ms
Operating Temperature	_____	-55 C to 125 C
Storage Temperature	_____	-55 C to 125 C
Humidity	_____	0 - 97% (no condensation)
Contact Resistance	_____	<100 ohms
with gold or silver plating	_____	<1 ohm
Voltage/Current Maximums	_____	12 ma @ 24 volts DC, RL
Breakdown Voltage	_____	Over 200 volts

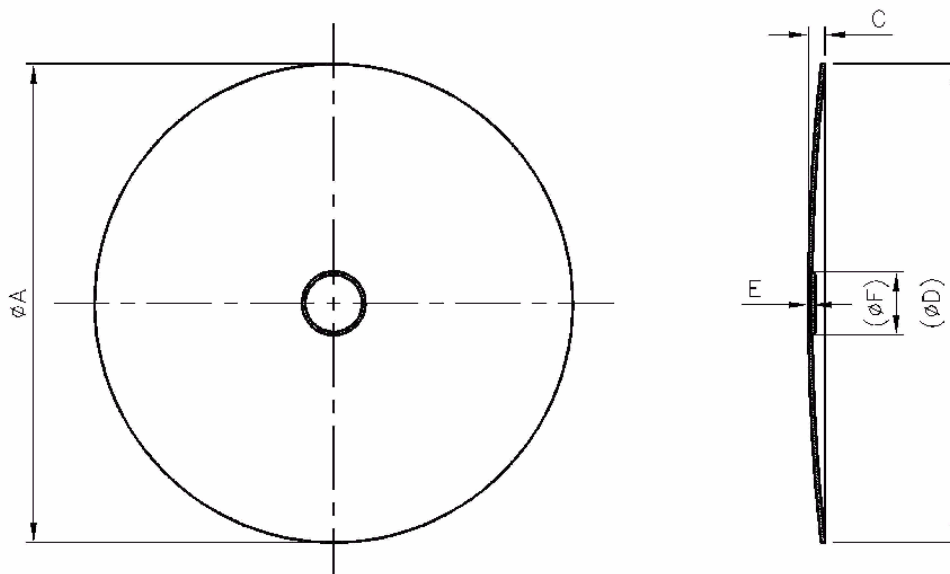
# RDN FAMILY

Part No.	Material Thickness	Outer Dia. $\varnothing A$	Height C	Foot Print $\varnothing D$	Dimple Depth E	Dimple Dia. $\varnothing F$	Trip Force
4-RDN-180	0.05	4.00	0.22	(4.0)	0.01	(0.06)	180g
5-RDN-160	0.06	5.00	0.22	(5.0)	0.01	(1.0)	160g
5-RDN-180	0.06	5.00	0.23	(5.0)	0.08	(1.0)	180g
8-RDN-280	0.08	8.00	0.33	(8.0)	0.08	(2.5)	280g
9-RDN-220	0.08	9.00	0.35	(9.0)	0.08	(3.2)	220g
9-RDN-240	0.08	9.00	0.36	(9.0)	0.08	(3.2)	240g
9-RDN-280	0.08	9.00	0.38	(9.0)	0.08	(3.2)	280g
9-RDN-350	0.08	9.00	0.40	(9.0)	0.08	(3.2)	350g
9-RDN-400	0.08	9.00	0.42	(9.0)	0.08	(3.2)	400g
10-RDN-240	0.10	10.0	0.36	(10.0)	0.08	(3.2)	240g
10-RDN-280	0.10	10.0	0.36	(10.0)	0.08	(3.2)	280g
10-RDN-350	0.10	10.0	0.39	(10.0)	0.08	(3.2)	350g
10-RDN-400	0.10	10.0	0.42	(10.0)	0.08	(3.2)	400g
11-RDN-400	0.10	11.0	0.43	(11.0)	0.08	(3.8)	400g
12-RDN-240	0.10	12.0	0.41	(12.0)	0.08	(3.0)	240g
12-RDN-280	0.10	12.0	0.43	(12.0)	0.08	(3.0)	280g
12-RDN-350	0.10	12.0	0.46	(12.0)	0.08	(3.0)	350g
12.7-RDN-280	0.10	12.7	0.40	(12.7)	0.08	(3.0)	280g
12.7-RDN-350	0.10	12.7	0.43	(12.7)	0.08	(3.0)	350g
12.7-RDN-400	0.10	12.7	0.45	(12.7)	0.08	(3.0)	400g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.



### Dome Specifications

Contact Configuration	_____	SPST, Normally Open
Contact Bounce (on)	_____	<.3 ms
Contact Bounce (off)	_____	<.6 ms
Operating Temperature	_____	-55 C to 125 C
Storage Temperature	_____	-55 C to 125 C
Humidity	_____	0 - 97% (no condensation)
Contact Resistance	_____	<100 ohms
with gold or silver plating	_____	<1 ohm
Voltage/Current Maximums	_____	12 ma @ 24 volts DC, RL
Breakdown Voltage	_____	Over 200 volts

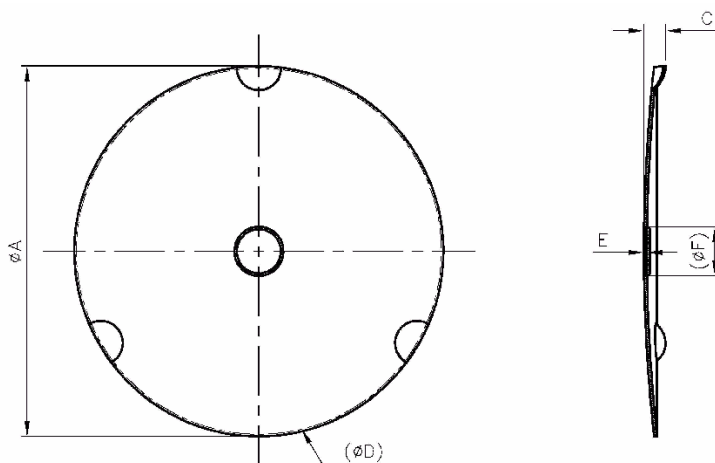
# RDF FAMILY

Part No.	Material Thickness	Outer Dia. $\varnothing A$	Height C	Foot Print $\varnothing D$	Dimple Depth E	Dimple Dia. $\varnothing F$	Trip Force
6-RDF-200	0.06	6.00	0.47	(5.8)	0.08	(1.2)	200g
7-RDF-750	0.10	7.00	0.59	(6.8)	0.08	(1.4)	750g
8-RDF-200	0.08	8.00	0.44	(7.8)	0.08	(1.4)	200g
8-RDF-240	0.08	8.00	0.45	(7.8)	0.08	(1.4)	240g
8-RDF-280	0.08	8.00	0.49	(7.8)	0.08	(1.4)	280g
8-RDF-350	0.08	8.00	0.51	(7.8)	0.08	(1.4)	350g
8-RDF-400	0.08	8.00	0.53	(7.8)	0.08	(1.4)	400g
8-RDF-450	0.10	8.00	0.56	(7.8)	0.08	(1.4)	450g
9-RDF-240	0.08	9.00	0.48	(8.8)	0.08	(1.4)	240g
9-RDF-280	0.08	9.00	0.49	(8.8)	0.08	(1.4)	280g
9-RDF-400	0.10	9.00	0.56	(8.8)	0.08	(1.4)	400g
10-RDF-150	0.08	10.0	0.44	(9.8)	0.08	(1.5)	150g
10-RDF-240	0.10	10.0	0.52	(9.8)	0.08	(1.5)	240g
10-RDF-280	0.10	10.0	0.55	(9.8)	0.08	(1.5)	280g
10-RDF-300	0.10	10.0	0.56	(9.8)	0.08	(1.5)	300g
10-RDF-350	0.10	10.0	0.59	(9.8)	0.08	(1.5)	350g
10-RDF-400	0.10	10.0	0.61	(9.8)	0.08	(1.5)	400g
12-RDF-240	0.12	12.0	0.53	(11.8)	0.08	(1.5)	240g
12-RDF-280	0.12	12.0	0.56	(11.8)	0.08	(1.5)	280g
12-RDF-350	0.12	12.0	0.60	(11.8)	0.08	(1.5)	350g
12-RDF-400	0.12	12.0	0.65	(11.8)	0.08	(1.5)	400g
12.7-RDF-350	0.12	12.7	0.57	(12.5)	0.08	(1.6)	350g
12.7-RDF-480	0.12	12.7	0.61	(12.5)	0.08	(1.6)	480g
13-RDF-350	0.12	13.0	0.57	(12.8)	0.08	(1.6)	350g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.



### Dome Specifications

Contact Configuration _____	SPST, Normally Open
Contact Bounce (on) _____	<.3 ms
Contact Bounce (off) _____	<.6 ms
Operating Temperature _____	-55 C to 125 C
Storage Temperature _____	-55 C to 125 C
Humidity _____	0 - 97% (no condensation)
Contact Resistance _____	<100 ohms
with gold or silver plating _____	<1 ohm
Voltage/Current Maximums _____	12 ma @ 24 volts DC, RL
Breakdown Voltage _____	Over 200 volts



## ROUND DOMES (No Dimple, No Feet)

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4mm

5mm

5.6mm

6mm

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6.9mm

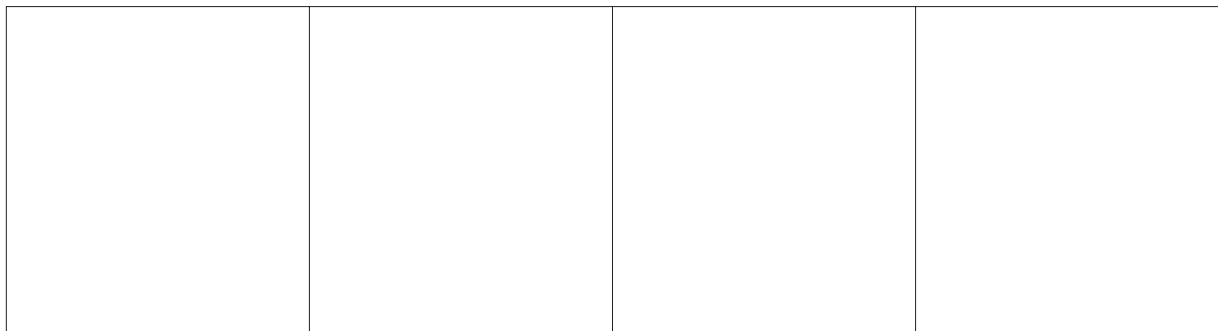
8.8mm

12.7mm

16mm



## ROUND DOMES (Dimple, No Feet)

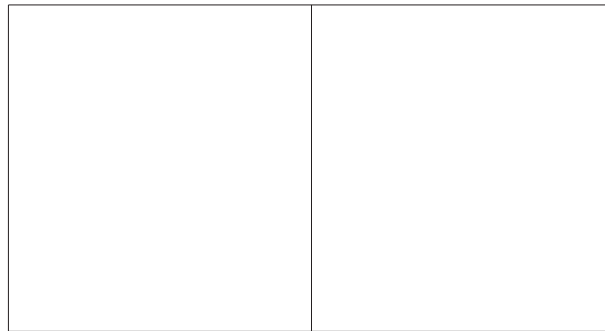


8mm

9mm

10mm

11mm



12mm

12.7mm



## ROUND DOMES (Dimple, Feet)

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6mm

7mm

8mm

9mm

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10mm

12mm

12.7mm

13mm



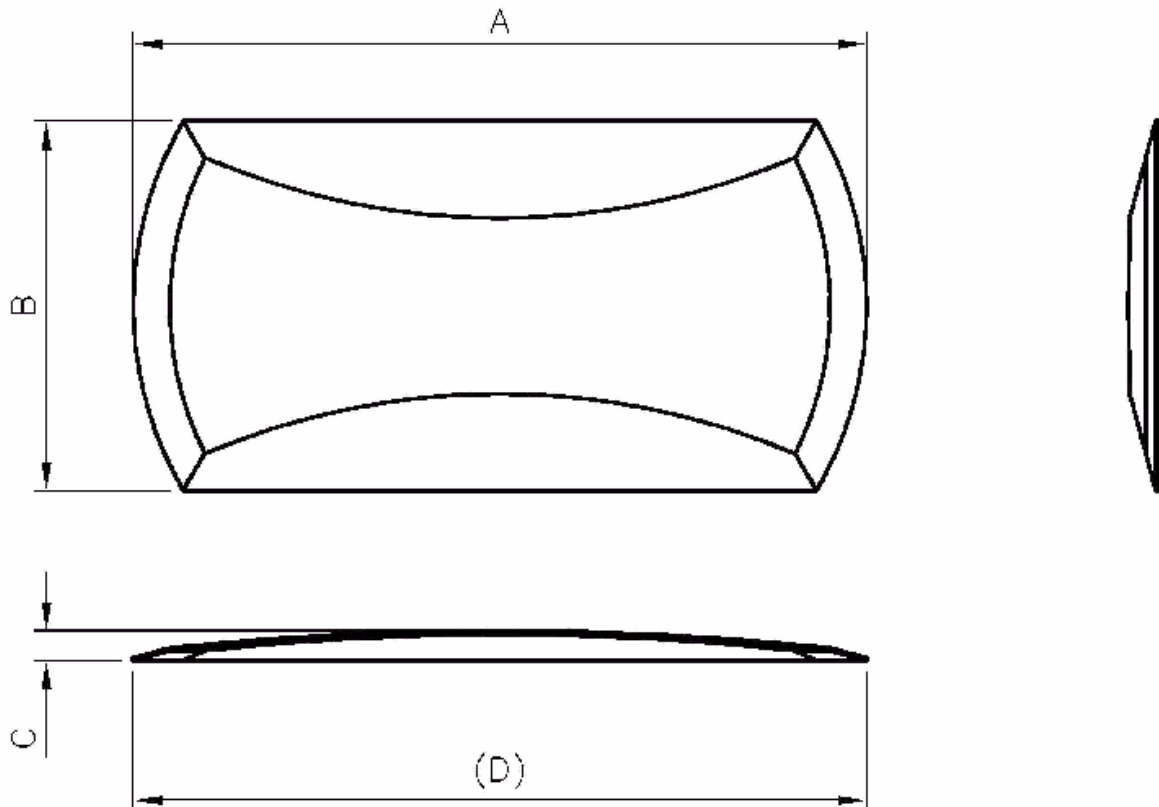
# ONN FAMILY

Part No.	Material Thickness	Body Length ØA	Body Width B	Height C	Foot Print ØD	Trip Force
8.89X17.78-ONN-280	0.08	17.78	8.89	0.82	(17.78)	280g
8.89X17.78-ONN-350	0.08	17.78	9.00	0.84	(17.78)	350g
12.7X25.4-ONN-280	0.10	25.40	12.80	0.85	(25.40)	280g
12.7X25.4-ONN-350	0.10	25.40	12.80	1.03	(25.40)	350g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.



## Dome Specifications

Contact Configuration	_____	SPST, Normally Open
Contact Bounce (on)	_____	<.3 ms
Contact Bounce (off)	_____	<6 ms
Operating Temperature	_____	-55 C to 125 C
Storage Temperature	_____	-55 C to 125 C
Humidity	_____	0 - 97% (no condensation)
Contact Resistance	_____	<100 ohms
with gold or silver plating	_____	<1 ohm
Voltage/Current Maximums	_____	12 ma @ 24 volts DC, RL
Breakdown Voltage	_____	Over 200 volts

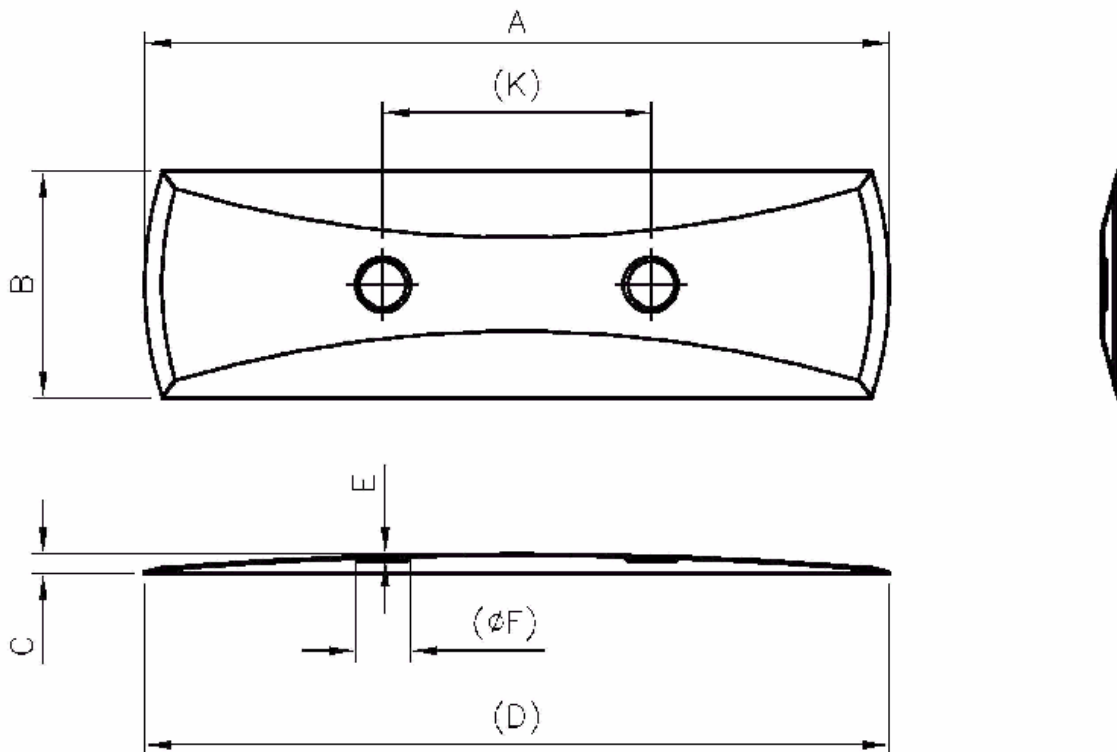
# ODN FAMILY

Part No.	Material Thickness	Body Length	Body Width	Height	Foot Print	Dimple Depth	Dimple Dia.	Distance Between Dimple	Trip Force
		A	B	C	D	E	ØF	K	
8.89X17.78-ODN-280	0.08	17.78	9.00	0.80	(17.78)	0.08	(2.0)	N.A.	280g
8.89X17.78-ODN-350	0.08	17.78	9.00	0.87	(17.78)	0.08	(2.0)	N.A.	350g
12.7X25.4-ODN-280	0.10	25.40	12.80	0.89	(25.40)	0.10	(3.5)	N.A.	280g
12.7X25.4-ODN-350	0.10	25.40	12.80	1.03	(25.40)	0.10	(3.5)	N.A.	350g
12.7X38.1-ODN-350	0.08	38.00	12.80	1.18	(38.00)	0.08	(3.5)	N.A.	350g
12.7X38.1-ODN-400	0.08	38.00	12.80	1.11	(38.00)	0.08	(3.5)	N.A.	400g
12.7X50.8-ODN-400	0.08	50.80	12.80	1.30	(50.80)	0.15	(3.0)	(20.00)	400g

\* All measurements in millimeters.

\* Dimensions in bracket are just for reference only.

\* All dimensions subjected to change without any notice.

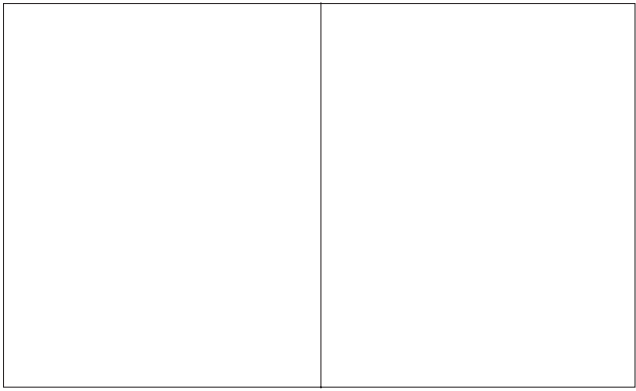


#### Dome Specifications

Contact Configuration	SPST, Normally Open
Contact Bounce (on)	<3 ms
Contact Bounce (off)	<6 ms
Operating Temperature	-55 C to 125 C
Storage Temperature	-55 C to 125 C
Humidity	0 - 97% (no condensation)
Contact Resistance	<100 ohms
with gold or silver plating	<1 ohm
Voltage/Current Maximums	12 ma @ 24 volts DC, RL
Breakdown Voltage	Over 200 volts

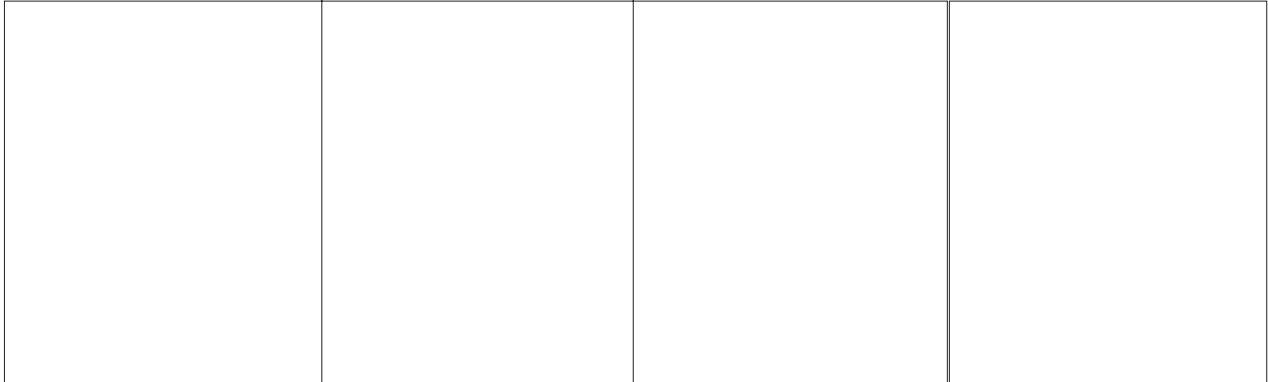


**OBLONG DOMES  
(No Dimple)**



8.89X17.78    12.7x25.4

**OBLONG DOMES  
(With Dimple)**



8.89x17.78    12.7x25.4    12.7x38.1    12.7x50.8

## **SUMMARY**

If you would like samples of any of our domes for building your prototypes, please call us at (852) 2344 8077 and we will gladly ship them to you at no charge!

If you have any questions regarding our stainless steel tactile domes or the information contained in this catalog, please call us.

The information contained in this catalog is, to the best of our knowledge, true and correct. Any inaccurate information is purely accidental. If you find any errors, please call us immediately so that we may take appropriate action. This catalog is updated frequently.