







### **Swiss Manufacturing Plant**





This building served for the production of Swiss precision watches for a period of 70 years.

In 1984 the facility was purchased, completely renovated and high technology fully automated production equipment was installed for the production of precision interconnection products.

In 1992 the trademark

### E-tec

was registered to cover the complete interconnect product range.

As of 1993 a world-wide sales & distribution network was established to offer fast and efficient service regardless of location.

In addition to the interconnection products E-tec also supplies high quality screw machine parts as well as customized injection moulded and machined products. Our innovative approach to new product development allows us to offer the service, quality and competitive prices our customers demand. Whatever your requirement, be it high volume commodity product or low quantity custom special, **E-tec**, the "Swiss Connection" will endeavour to satisfy your requirements.

For any further details please contact E-tec or your closest sales office.

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## Burn-In Sockets MPS Series OPEN TOP eMMC SOCKET





Open Top Style. Accommodates Chip Scale Package with 0.5mm pitch.

Compact size and low actuation force.

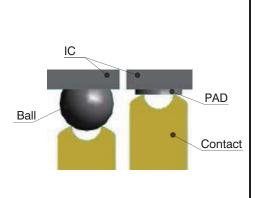
4-point pinch design for enhanced electrical contact.

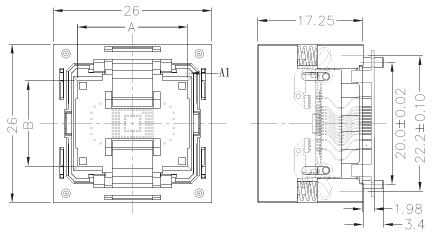
Field exchangeable package location plate.

"U" contact supports any pad or solder ball shape and composition.

### Please note, we will always request the chip data to ensure we offer a compatible socket.



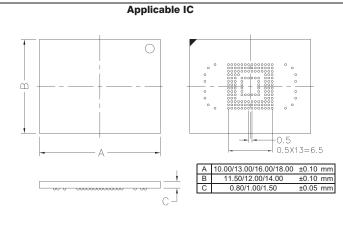




You may request any specific socket dimension from <a href="mailto:info@e-tec.com">info@e-tec.com</a>

For top view socket dimension pls. ref. to separate catalog page

### **Contact Tip Detail**



### Specifications

### Mechanical data

Contact life 25,000 cycles
Contact Normal Force 3-5g Per Pin
Operation Force 2.0Kg max.

### Material

Insulator (RoHS compliant) PES , PEI

Contact (RoHS compliant) Beryllium Copper Alloy

Contact plating Gold cover Nickel

### **Electrical data**

 $\begin{array}{ll} \text{Contact resistance} & < 30 \text{ m}\Omega \\ \text{Current rating} & 1\text{A} \\ \text{Insulation resistance at 500V DC} & 1,000 \text{ m}\Omega \end{array}$ 

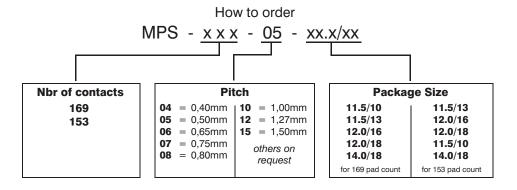
Operating temperature -55°C to +175°C

### Recommendations:

Solder paste - Please use a solder paste w/o any silver!

Solder profile – Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!



### Burn-In Sockets MPS Series **OPEN TOP eMMC SOCKET**





Open Top Style. Accommodates Chip Scale Package with 0.5mm pitch. Compact size and low actuation force.

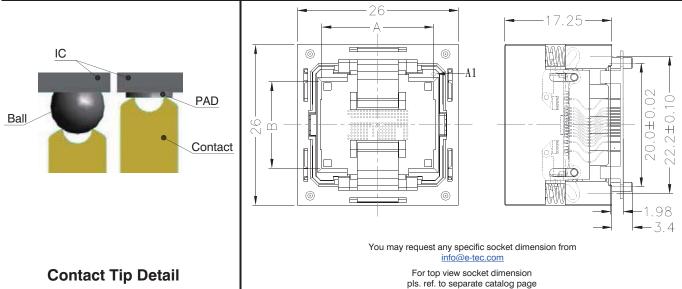
4-point pinch design for enhanced electrical contact.

Field exchangeable package location plate.

"U" contact supports any pad or solder ball shape and composition.

### Please note, we will always request the chip data to ensure we offer a compatible socket.





### **Specifications**

### Mechanical data

Contact life 25,000 cycles Contact Normal Force 3-5g Per Pin Operation Force 2.0Kg max.

### Material

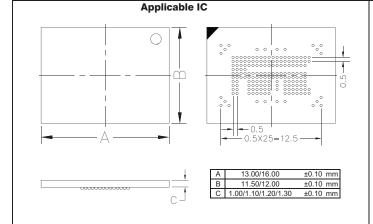
Insulator (RoHS compliant) PES . PEI

Beryllium Copper Alloy Contact (RoHS compliant) Gold cover Nickel Contact plating

### **Electrical data**

Contact resistance < 30 m $\Omega$ Current rating Insulation resistance at 500V DC  $1,000~\text{m}\Omega$ 

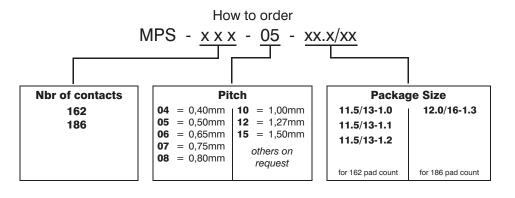
**Operating temperature** -55°C to +175°C



### **Recommendations:**

Solder paste - Please use a solder paste w/o any silver! Solder profile - Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

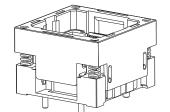


### Burn-In Sockets MPS Series **OPEN TOP LGA SOCKET**

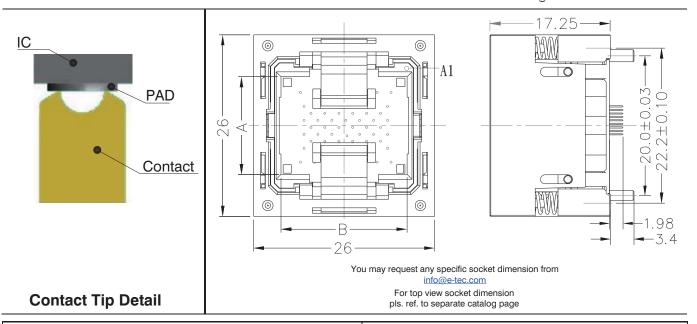


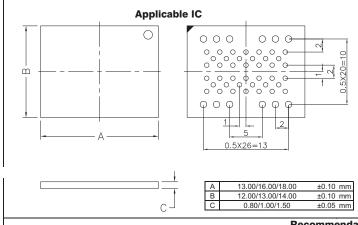


Open Top Style. Accommodates LGA package with 1.0mm pitch. Compact size and low actuation force. 4-Point pinch design for enhanced electrical contact. Field exchangeable package location plate.



### Please note, we will always request the chip data to ensure we offer a compatible socket.





### **Specifications**

### **Mechanical data**

Contact life 25,000 cycles Contact Normal Force 3-5g Per Pin Operation Force 2.0Kg max.

### Material

Insulator (RoHS compliant) PES . PEI Contact

Beryllium Copper Allov (RoHS compliant) Gold cover Nickel Contact plating

### **Electrical data**

< 30 m $\Omega$ Contact resistance Current rating Insulation resistance at 500V DC  $1,000~\text{m}\Omega$ 

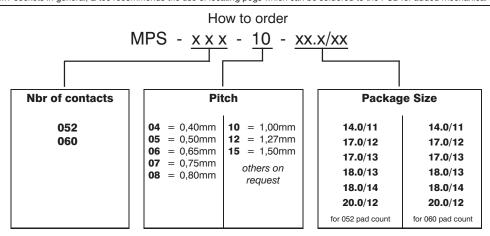
**Operating temperature** -55°C to +175°C

### **Recommendations:**

Solder paste – Please use a solder paste w/o any silver!

Solder profile – Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!



# Burn-In Sockets MPS Series OPEN TOP BGA SOCKET



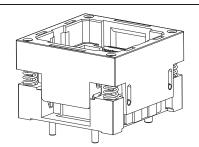


Open Top Style. Accommodates Chip Scale package with 1.0mm pitch. Compact size and low Actuation Force.

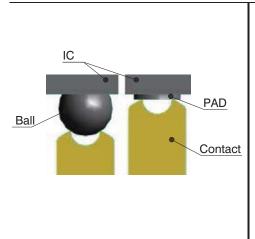
4-Point pinch design for enhanced electrical contact.

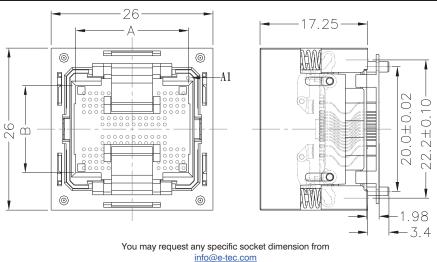
Field exchangeable package location plate.

"U" contact supports any type of solder ball shape and composition.



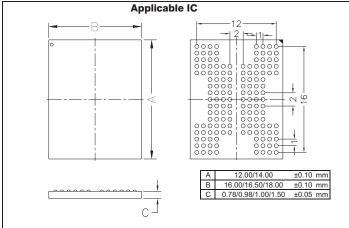
### Please note, we will always request the chip data to ensure we offer a compatible socket.





### **Contact Tip Detail**

For top view socket dimension pls. ref. to separate catalog page



### Specifications

### **Mechanical data**

Contact life 25,000 cycles
Contact Normal Force 3-5g Per Pin
Operation Force 2.0Kg max.

### Material

Insulator (RoHS compliant) PES , PEI

Contact (RoHS compliant) Beryllium Copper Alloy Contact plating Gold cover Nickel

### Electrical data

Contact resistance  $< 30 \text{ m}\Omega$ Current rating 1A Insulation resistance at 500V DC 1,000 mΩ

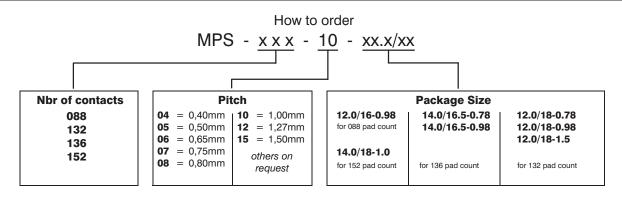
Operating temperature -55°C to +175°C

### **Recommendations:**

Solder paste - Please use a solder paste w/o any silver!

Solder profile – Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

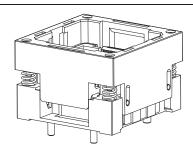


### Burn-In Sockets MPS Series **OPEN TOP BGA SOCKET**

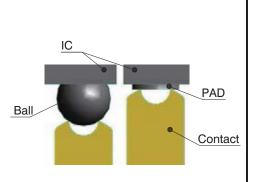


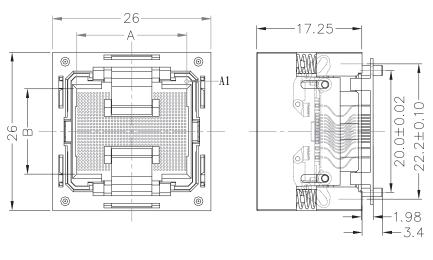


Open Top Style. Compact size and low Actuation Force. Accommodates BGA chip package with 0.50/0.65/0.80/1.00mm pitch. 4-Point pinch design for enhanced electrical contact. Unique mechanism to eliminate solder ball sticking. Field replaceable package location plate.



#### Please note, we will always request the chip data to ensure we offer a compatible socket.





**Contact Tip Detail** 

info@e-tec.com For top view socket dimension pls. ref. to separate catalog page

You may request any specific socket dimension from

### **Specifications**

### Mechanical data

Contact life 25,000 cycles Contact Normal Force 3-5g Per Pin 2.0kg min. Operation Force

### Material

Insulator (RoHS compliant) Contact (RoHS compliant)

PES, PEI Beryllium Copper Alloy Contact plating Gold cover Nickel

### **Electrical data**

Contact resistance

 $< 30 \text{ m}\Omega$ Current rating 1,000 mΩ Insulation resistance at 500V DC

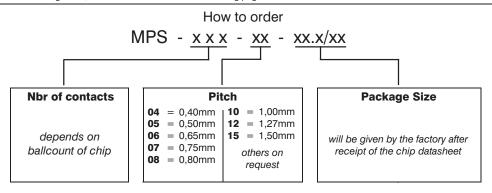
**Operating temperature** -55°C to +175°C

### **Recommendations:**

Solder paste - Please use a solder paste w/o any silver!

Solder profile - Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

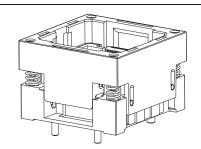


# Burn-In Sockets MPS Series OPEN TOP BGA SOCKET





Open Top Style. Compact size and low Actuation Force.
Accommodates BGA chip package with 0.50/0.65/0.80/1.00mm pitch.
4-Point pinch design for enhanced electrical contact.
Unique mechanism to eliminate solder ball sticking.
Field replaceable package location plate.



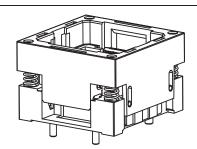
Pitch	No. of Contacts	Package Size(mm)	Part Number
	40	8x9.2	MPS-040-05-8.0/9.2
	48	6x4	MPS-048-05-6.0/4
	56	6x6	MPS-056-05-6.0/6
0.5	64	5x5	MPS-064-05-5.0/5
	84	6x6	MPS-084-05-6.0/6
	88	7x7	MPS-088-05-8.0/8
	105	6x6	MPS-105-05-6.0/6
	141	11.5x13	MPS-141-05-11.5/13
	25	5x5	MPS-025-08-5.0/5
	30	5x5	MPS-030-08-5.0/5
	48	6x10	MPS-048-08-6.0/10
	48	6x11	MPS-048-08-6.0/11
	48	6x8	MPS-048-08-6.0/8
	48	6x9	MPS-048-08-6.0/9
	48	6.15x8.15	MPS-048-08-6.15/8.15
	48	8x10	MPS-048-08-8.0/10
	48	9x11	MPS-048-08-9.0/11
	48	9.5x12	MPS-048-08-9.5/12
	48	10.95x11.95	MPS-048-08-10.95/11.95
	48	11x12	MPS-048-08-11/12
0.0	54	8x8	MPS-054-08-8.0/8
8.0	56	7x9	MPS-056-08-7.0/9
	56	8x10	MPS-056-08-8.0/10
	56	8x11.6	MPS-056-08-8.0/11.6
	56	8x11.6	MPS-056-08-8/11.6
	56	8x13	MPS-056-08-8.0/13
	59	8x11.6	MPS-056-08-8.0/11.6
	60	8x10	MPS-060-08-8.0/10
	60	8x11.6	MPS-060-08-8.0/11.6
	60	11x13	MPS-060-08-11.0/13
	63	7x11	MPS-063-08-7.0/11
	64	7x7	MPS-064-08-7.0/7
	64	8x11	MPS-064-08-8.0/11
	64	8.1x11.1	MPS-064-08-8.1/11.1

# Burn-In Sockets MPS Series OPEN TOP BGA SOCKET





Open Top Style. Compact size and low Actuation Force.
Accommodates BGA chip package with 0.50/0.65/0.80/1.00mm pitch.
4-Point pinch design for enhanced electrical contact.
Unique mechanism to eliminate solder ball sticking.
Field replaceable package location plate.



Pitch	No. of Contacts	Package Size(mm)	Part Number
	64	7.95x8.95	MPS-064-10-7.95/8.95
	64	9x9	MPS-064-10-9.0/9
	64	9x11.5	MPS-064-10-9.0/11.5
	64	10.95x11.95	MPS-064-10-10.95/11.95
	66	7.47x11.02	MPS-066-10-7.47/11.02
	72	10x10	MPS-072-10-10.0/10
1.0	80	7x9	MPS-080-10-7.0/09
	80	8x8	MPS-080-10-8.0/08
	80	8x10	MPS-080-10-8.0/10
	80	8x11	MPS-080-10-8.0/11
	80	9x11.5	MPS-080-10-9.0/11.5
	81	8x8	MPS-081-10-8.0/08
	81	14x18	MPS-081-10-14.0/18

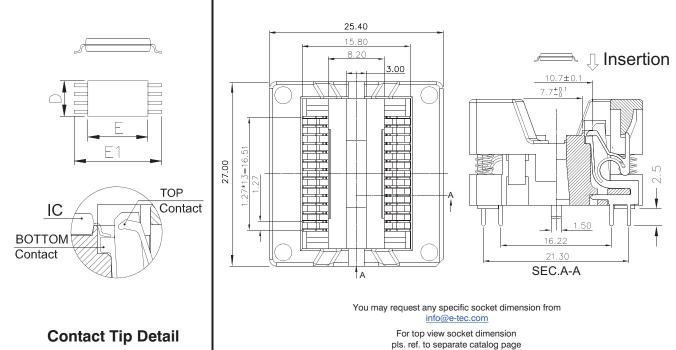




Open top thru-hole style for Small Outline chip Packages. Zero Insertion Force designed for automatic loading. Highly reliable, dual pinch, pre-loaded contacts. Live bug insertion for 0.65/1.27mm pitch packages. High force contact version available for Pb-free devices (single beam type).



### Please note, we will always request the chip data to ensure we offer a compatible socket.



### **Specifications** Mechanical data

PES, PEI

15.000 cycles Contact life 18g Per Pin Contact Normal Force Operation Force 1.0Kg max.

Material

Insulator (RoHS compliant) Contact (RoHS compliant)

Beryllium Copper Alloy Contact plating Gold cover Nickel

**Electrical data** 

< 30 mΩ Contact resistance Current rating 10mA Insulation resistance at 500V DC 1,000 mΩ

**Operating temperature** -55°C to +175°C

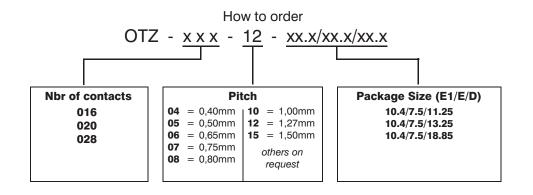
### Recommendations:

Solder paste - Please use a solder paste w/o any silver!

Solder profile - Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first! For high pincount SMT sockets, E-tec recommends the use of a pluggable thru-hole socket mounted into a MiniGrid Adapter (see also page 10, 11 & 12 for more details)

For SMT sockets in general, E-tec recommends the use of locating pegs which can be soldered to the PCB for added mechanical strength.



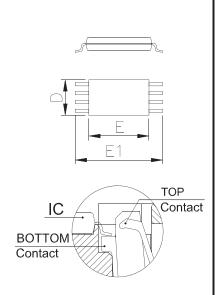


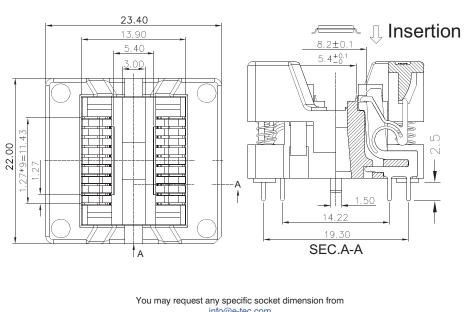


Open top thru-hole style for Small Outline chip Packages.
Zero Insertion Force designed for automatic loading.
Highly reliable, dual pinch, pre-loaded contacts.
Live bug insertion for 0.65/1.27mm pitch packages.
High force contact version available for Pb-free devices (single beam type).



### Please note, we will always request the chip data to ensure we offer a compatible socket.





**Contact Tip Detail** 

info@e-tec.com

For top view socket dimension pls. ref. to separate catalog page

### Specifications

Mechanical data

Contact life 15,000 cycles
Contact Normal Force 18g Per Pin
Operation Force 1.0Kg max.

Material

 Insulator Contact
 (RoHS compliant)
 PES , PEI

 Contact (RoHS compliant)
 Beryllium Copper Alloy

 Contact plating
 Gold cover Nickel

Electrical data

 Contact resistance
 < 30 mΩ

 Current rating
 10mA

 Insulation resistance at 500V DC
 1,000 mΩ

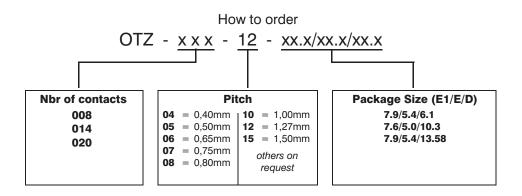
Operating temperature -55°C to +175°C

### Recommendations:

Solder paste - Please use a solder paste w/o any silver!

Solder profile – Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!



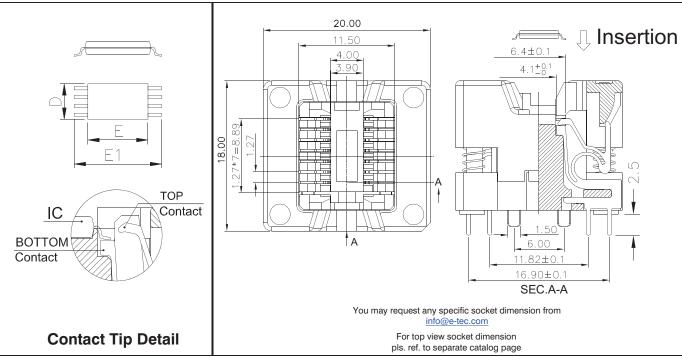




Open top thru-hole style for Small Outline chip Packages.
Zero Insertion Force designed for automatic loading.
Highly reliable, dual pinch, pre-loaded contacts.
Live bug insertion for 0.65/1.27mm pitch packages.
High force contact version available for Pb-free devices (single beam type).



### Please note, we will always request the chip data to ensure we offer a compatible socket.



#### 

Material

Insulator (RoHS compliant) PES , PEI
Contact (RoHS compliant) Beryllium Copper Alloy
Contact plating Gold cover Nickel

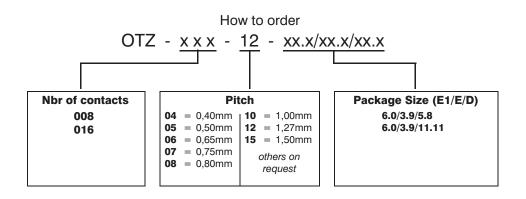
Recommendations:

Solder paste – Please use a solder paste w/o any silver! Solder profile – Please refer to our website www.e-tec.com

**Operating temperature** 

-55°C to +175°C

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!



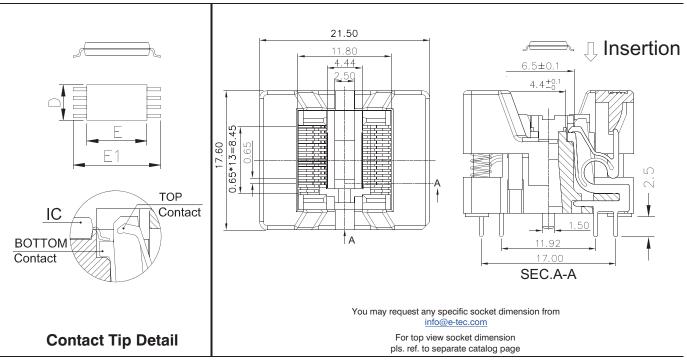




Open top thru-hole style for Small Outline chip Packages.
Zero Insertion Force designed for automatic loading.
Highly reliable, dual pinch, pre-loaded contacts.
Live bug insertion for 0.65/1.27mm pitch packages.
High force contact version available for Pb-free devices (single beam type).



### Please note, we will always request the chip data to ensure we offer a compatible socket.



### Specifications

Mechanical data

Contact life 15,000 cycles
Contact Normal Force 18g Per Pin
Operation Force 1.0Kg max.

Material

 Insulator Contact
 (RoHS compliant)
 PES , PEI

 Contact (RoHS compliant)
 Beryllium Copper Alloy

 Contact plating
 Gold cover Nickel

Electrical data

 Contact resistance
 < 30 mΩ

 Current rating
 10mA

 Insulation resistance at 500V DC
 1,000 mΩ

Operating temperature -55°C to +175°C

### Recommendations:

Solder paste - Please use a solder paste w/o any silver!

Solder profile – Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

For high pincount SMT sockets, E-tec recommends the use of a pluggable thru-hole socket mounted into a MiniGrid Adapter (see also page 10, 11 & 12 for more details)

For SMT sockets in general, E-tec recommends the use of locating pegs which can be soldered to the PCB for added mechanical strength.

How to order OTZ - x x x - 06 - xx.x/xx.x/xx.x**Nbr of contacts Pitch** Package Size (E1/E/D) 800 **04** = 0,40mm 110 = 1.00mm 6.4/4.4/3.35 **05** = 0,50mm 6.4/4.4/5.95 12 = 1,27mm 016 = 0,65mm**15** = 1,50mm 6.4/4.4/9.85 028 07 = 0.75mm others on 08 = 0.80mm reauest

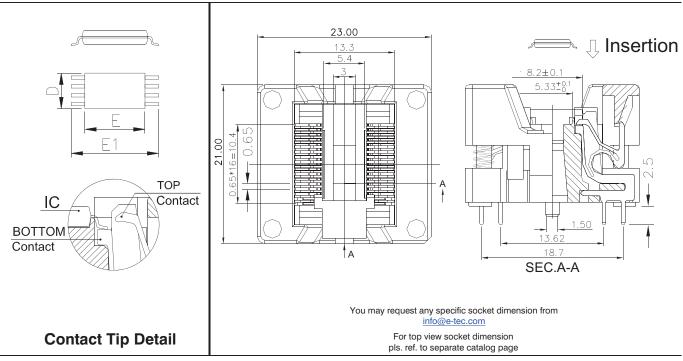




Open top thru-hole style for Small Outline chip Packages.
Zero Insertion Force designed for automatic loading.
Highly reliable, dual pinch, pre-loaded contacts.
Live bug insertion for 0.65/1.27mm pitch packages.
High force contact version available for Pb-free devices (single beam type).



### Please note, we will always request the chip data to ensure we offer a compatible socket.



### **Specifications**

**Mechanical data** 

Contact life 15,000 cycles
Contact Normal Force 18g Per Pin
Operation Force 1.0Kg max.

Material

 Insulator Contact
 (RoHS compliant)
 PES , PEI

 Contact (RoHS compliant)
 Beryllium Copper Alloy

 Contact plating
 Gold cover Nickel

| Electrical data

Operating temperature -55°C to +175°C

### Recommendations:

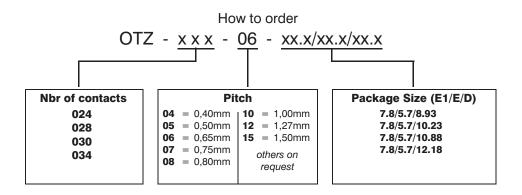
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Solder profile – Please refer to our website www.e-tec.com

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For SMT sockets in general, E-tec recommends the use of locating pegs which can be soldered to the PCB for added mechanical strength.



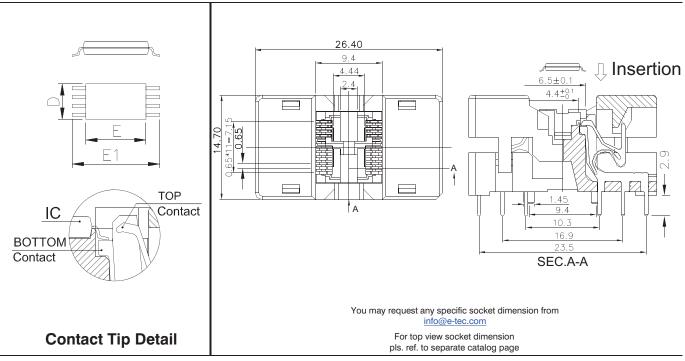




Open top thru-hole style for Small Outline chip Packages.
Zero Insertion Force designed for automatic loading.
Highly reliable, dual pinch, pre-loaded contacts.
Live bug insertion for 0.65/1.27mm pitch packages.
High force contact version available for Pb-free devices (single beam type).



### Please note, we will always request the chip data to ensure we offer a compatible socket.



#### **Specifications** Mechanical data **Electrical data** 15.000 cycles < 30 mΩ Contact life Contact resistance Contact Normal Force 18g Per Pin Current rating 10mA Insulation resistance at 500V DC 1,000 mΩ Operation Force 1.0Kg max. **Operating temperature** -55°C to +175°C Material Insulator (RoHS compliant) Contact (RoHS compliant) Beryllium Copper Alloy

### Recommendations:

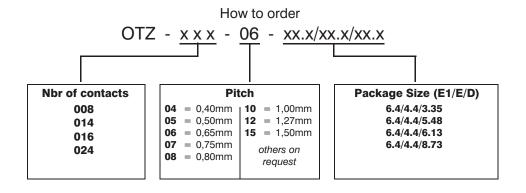
Gold cover Nickel

Solder paste – Please use a solder paste w/o any silver! Solder profile – Please refer to our website www.e-tec.com

E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

For high pincount SMT sockets, E-tec recommends the use of a pluggable thru-hole socket mounted into a MiniGrid Adapter (see also page 10, 11 & 12 for more details)

For SMT sockets in general, E-tec recommends the use of locating pegs which can be soldered to the PCB for added mechanical strength.



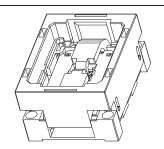
Contact plating

### Burn-In Sockets QOT Series **OPEN TOP QFN SOCKET**

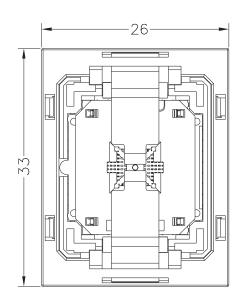


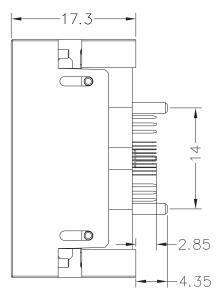


Universal Open Top Style for Thru-Hole mount Individual spring loaded pressure pad per device type Inexpensive GP insert accommodates many package sizes X-shape stand-off prevents package from sticking Accommodate 0.5~1.2mm thick packages (See pages 16/17 for ClamShell style)



Please note, we will always request the chip data to ensure we offer a compatible socket.





You may request any specific socket dimension from info@e-tec.com

> For top view socket dimension pls. ref. to separate catalog page

### **Specifications**

### Mechanical data

Material

Contact life Contact Normal Force Operation Force

Insulator (RoHS compliant)

15,000 cycles 5-8g Per Pin 2.0Kg max

PES, PEI

Contact (RoHS compliant) Beryllium Copper Alloy Contact plating Gold cover Nickel

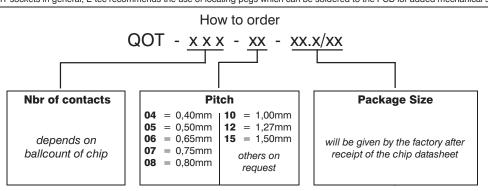
< 30 mΩ Contact resistance Current rating
Insulation resistance at 500V DC 1,000 mΩ

**Electrical data** 

**Operating temperature** -55°C to +175°C

### **Recommendations:**

Solder paste - Please use a solder paste w/o any silver! Solder profile – Please refer to our website www.e-tec.com E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

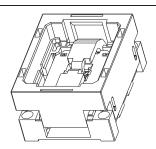


# Burn-In Sockets QOT Series OPEN TOP QFN SOCKET





Universal Open Top Style for Thru-Hole mount Individual spring loaded pressure pad per device type Inexpensive GP insert accommodates many package sizes X-shape stand-off prevents package from sticking Accommodate 0.5~1.2mm thick packages (See pages 16/17 for ClamShell style)



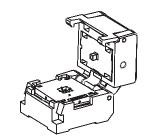
Pitch	No. of Contacts	Pad Matrix	Package Size(mm)	Part Number
	12	odd	2x2	QOT-012-04-2.0/2
	16	even	3x3	QOT-016-04-3.0/3
	20	odd	3x3	QOT-020-04-3.0/3
	24	even	4x4	QOT-024-04-4.0/4
	28	odd	4x4	QOT-028-04-4.0/4
	32	even	5x5	QOT-032-04-5.0/5
	36	odd	5x5	QOT-036-04-5.0/5
	40	even	5x5	QOT-040-04-5.0/5
	44	odd	6x6	QOT-044-04-6.0/6
0.4	48	even	6x6	QOT-048-04-6.0/6
0.4	52	odd	7x7	QOT-052-04-7.0/7
	56	even	7x7	QOT-056-04-7.0/7
	60	odd	8x8	QOT-060-04-8.0/8
	64	even	8x8	QOT-064-04-8.0/8
	76	odd	9x9	QOT-076-04-9.0/9
	80	even	9x9	QOT-080-04-9.0/9
	84	odd	10x10	QOT-084-04-10.0/10
	88	even	10x10	QOT-088-04-10.0/10
	104	even	12x12	QOT-104-04-12.0/12
	108	odd	12x12	QOT-108-04-12.0/12
	12	odd	2x2	QOT-012-05-2.0/2
	16	even	3x3	QOT-016-05-3.0/3
	12	odd	3x3	QOT-012-05-3.0/3
	20	odd	3x3	QOT-020-05-3.0/3
	24	even	4x4	QOT-024-05-4.0/4
	20	odd	4x4	QOT-020-05-4.0/4
	32	even	5x5	QOT-032-05-5.0/5
	28	odd	5x5	QOT-028-05-5.0/5
	40	even	6x6	QOT-040-05-6.0/6
0.5	36	odd	6x6	QOT-036-05-6.0/6
0.5	48	even	7x7	QOT-048-05-7.0/7
	44	odd	7x7	QOT-044-05-7.0/7
	56	even	8x8	QOT-056-05-8.0/8
	52	odd	8x8	QOT-052-05-8.0/8
	64	even	9x9	QOT-064-05-9.0/9
	60	odd	9x9	QOT-060-05-9.0/9
	72	even	10x10	QOT-072-05-10.0/10
	68	odd	10x10	QOT-068-05-10.0/10
	88	even	12x12	QOT-088-05-12.0/12
	84	odd	12x12	QOT-084-05-12.0/12

## Burn-In Sockets QMC Series CLAMSHELL QFN SOCKET

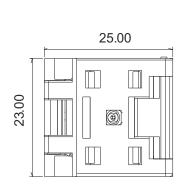


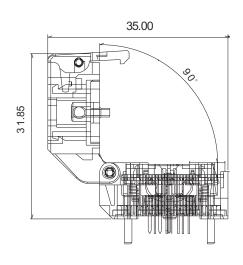


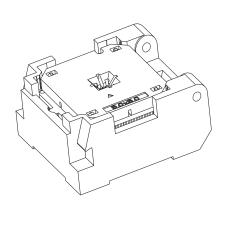
Universal ClamShell Style for Thru-Hole mount Individual spring loaded pressure pad per device type Inexpensive GP insert accommodates many package sizes Opening provided on top for sensor placement X-shape stand-off prevents package from sticking Accommodate 0.5~1.2mm thick packages (See pages 14/15 for Open Top style)



Please note, we will always request the chip data to ensure we offer a compatible socket.







You may request any specific socket dimension from info@e-tec.com

For top view socket dimension pls. ref. to separate catalog page

### **Specifications**

Mechanical data

Contact life Contact Normal Force Operation Force 15,000 cycles 5-8g Per Pin 2.0Kg max

Material

Insulator (RoHS compliant)
Contact (RoHS compliant)
Contact plating

PES , PEI Beryllium Copper Alloy Gold cover Nickel Electrical data

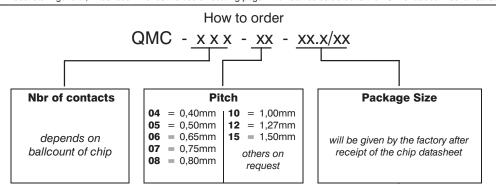
 $\begin{array}{ll} \text{Contact resistance} & <30 \text{ m}\Omega \\ \text{Current rating} & 1\text{A} \\ \text{Insulation resistance at 500V DC} & 1,000 \text{ m}\Omega \end{array}$ 

Operating temperature -55°C to +175°C

### **Recommendations:**

Solder paste – Please use a solder paste w/o any silver!

Solder profile – Please refer to our website <a href="https://www.e-tec.com">www.e-tec.com</a>
E-tec solderless sockets are adapted to a standard PCB thickness of 1.60mm. For a different PCB thickness, please inform E-tec first!

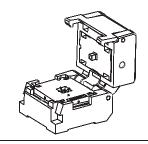


# Burn-In Sockets QMC Series CLAMSHELL QFN SOCKET





Universal ClamShell Style for Thru-Hole mount Individual spring loaded pressure pad per device type Inexpensive GP insert accommodates many package sizes Opening provided on top for sensor placement X-shape stand-off prevents package from sticking Accommodate 0.5~1.2mm thick packages (See pages 14/15 for Open Top style)



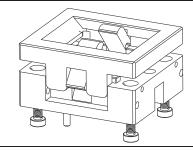
Pitch	No. of Contacts	Pad Matrix	Package Size(mm)	Part Number
	12	odd	2x2	QMC-012-04-2.0/2
	16	even	3x3	QMC-016-04-3.0/3
	20	odd	3x3	QMC-020-04-3.0/3
	24	even	4x4	QMC-024-04-4.0/4
	28	odd	4x4	QMC-028-04-4.0/4
	32	even	5x5	QMC-032-04-5.0/5
	36	odd	5x5	QMC-036-04-5.0/5
	40	even	5x5	QMC-040-04-5.0/5
	44	odd	6x6	QMC-044-04-6.0/6
0.4	48	even	6x6	QMC-048-04-6.0/6
0.4	52	odd	7x7	QMC-052-04-7.0/7
	56	even	7x7	QMC-056-04-7.0/7
	60	odd	8x8	QMC-060-04-8.0/8
	64	even	8x8	QMC-064-04-8.0/8
	76	odd	9x9	QMC-076-04-9.0/9
	80	even	9x9	QMC-080-04-9.0/9
	84	odd	10x10	QMC-084-04-10.0/10
	88	even	10x10	QMC-088-04-10.0/10
	104	even	12x12	QMC-104-04-12.0/12
	108	odd	12x12	QMC-108-04-12.0/12
	12	odd	2x2	QMC-012-05-2.0/2
	16	even	3x3	QMC-016-05-3.0/3
	12	odd	3x3	QMC-012-05-3.0/3
	20	odd	3x3	QMC-020-05-3.0/3
	24	even	4x4	QMC-024-05-4.0/4
	20	odd	4x4	QMC-020-05-4.0/4
	32	even	5x5	QMC-032-05-5.0/5
	28	odd	5x5	QMC-028-05-5.0/5
	40	even	6x6	QMC-040-05-6.0/6
0.5	36	odd	6x6	QMC-036-05-6.0/6
0.5	48	even	7x7	QMC-048-05-7.0/7
	44	odd	7x7	QMC-044-05-7.0/7
	56	even	8x8	QMC-056-05-8.0/8
	52	odd	8x8	QMC-052-05-8.0/8
	64	even	9x9	QMC-064-05-9.0/9
	60	odd	9x9	QMC-060-05-9.0/9
	72	even	10x10	QMC-072-05-10.0/10
	68	odd	10x10	QMC-068-05-10.0/10
	88	even	12x12	QMC-088-05-12.0/12
	84	odd	12x12	QMC-084-05-12.0/12

### Burn-In Sockets BPT Series **BGA PROBE PIN OPEN TOP SOCKET**

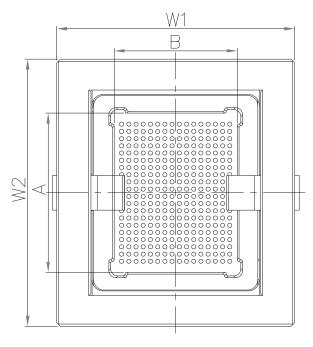


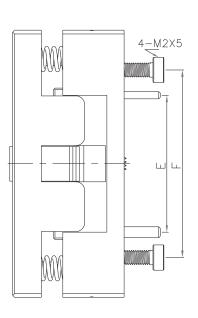


Open Top Style for Solderless Compression mount Accommodates pitch sizes of 0.4/0.5/0.65/0.8/1.0/1.27mm Compact size and low Actuation Force 4-Point pinch design for enhanced electrical contact Unique mechanism to eliminate solder ball sticking Field replaceable package location plate



Please note, we will always request the chip data to ensure we offer a compatible socket.





You may request any specific socket dimension from info@e-tec.com

> For top view socket dimension pls. ref. to separate catalog page

### **Specifications**

Mechanical data Contact life

Contact Normal Force Operation Force

Material

Insulator (RoHS compliant) Contact

Contact plating

(RoHS compliant) Beryllium Copper Alloy Gold cover Nickel

25 / 28g Per Pin 2.0Kg max

50,000 / 8,000 cycles

(0.5 / 0.8 pitch)

PES, PEI

### **Electrical data**

Contact resistance Current rating

< 30 m $\Omega$ 1A / 2A (0.5 / 0.8 pitch) Insulation resistance at 500V DC 1,000 mΩ

**Operating temperature** 

-40°C to +155°C

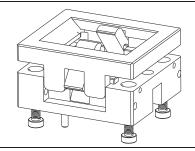
How to order **Nbr of contacts Pitch** Package Size **04** = 0,40mm **10** = 1,00mm **05** = 0,50mm **12** = 1,27mm depends on 06 = 0,65mm**15** = 1,50mm will be given by the factory after 07 = 0.75mm ballcount of chip receipt of the chip datasheet others on **08** = 0,80mm request

# Burn-In Sockets BPT Series BGA PROBE PIN OPEN TOP SOCKET





Open Top Style for Solderless Compression mount Accommodates pitch sizes of 0.4/0.5/0.65/0.8/1.0/1.27mm Compact size and low Actuation Force 4-Point pinch design for enhanced electrical contact Unique mechanism to eliminate solder ball sticking Field replaceable package location plate



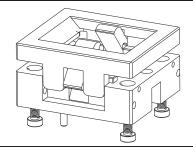
Pitch	No. of Contacts	Package Size(mm)	Part Number
	48	10x12	BPT-048-04-10.0/12
0.4	54	5x5	BPT-054-04-5.0/5
0.4	60	8x10	BPT-060-04-8.0/10
	65	6x8	BPT-065-04-6.0/8
	40	8x9.2	BPT-040-05-8.0/9.2
	48	6x4	BPT-048-05-6.0/4
0.5	56	6x6	BPT-056-05-6.0/6
0.5	64	5x5	BPT-064-05-5.0/5
	105	6x6	BPT-105-05-6.0/6
	141	11.5x13	BPT-141-05-11.5/13
	63	8x10	BPT-063-06-8.0/10
0.65	65	7x11	BPT-065-06-7.0/11
0.65	70	8x8	BPT-070-06-8.0/8
	88	8.1x12	BPT-088-06-8.1/12
	25	5x5	BPT-025-08-5.0/5
	30	5x5	PBT-030-08-5.0/5
	48	9x11	BPT-048-08-9.0/11
	48	9.5x12	BPT-048-08-9.5/12
	54	8x8	BPT-054-08-8.0/8
	56	7x9	BPT-056-08-7.0/9
	56	8x11.6	BPT-056-08-8.0/11.6
	56	8x13	BPT-056-08-8.0/13
0.0	56	8x10	BPT-056-08-8.0/10
0.8	56	8x11.6	BPT-056-08-8.0/11.6
	59	8x11.6	BPT-059-08-8.0/11.6
	60	8x10	BPT-060-08-8.0/10
	60	8x11.6	BPT-060-08-8.0/11.6
	60	11x13	BPT-060-08-11.0/13
	63	7x11	BPT-063-08-7.0/11
	64	7x7	BPT-064-08-7.0/7
	64	8x11.6	BPT-064-08-8.0/11.6
	64	8.1x11.1	BPT-064-08-8.1/11.1

# Burn-In Sockets BPT Series BGA PROBE PIN OPEN TOP SOCKET





Open Top Style for Solderless Compression mount Accommodates pitch sizes of 0.4/0.5/0.65/0.8/1.0/1.27mm Compact size and low Actuation Force 4-Point pinch design for enhanced electrical contact Unique mechanism to eliminate solder ball sticking Field replaceable package location plate

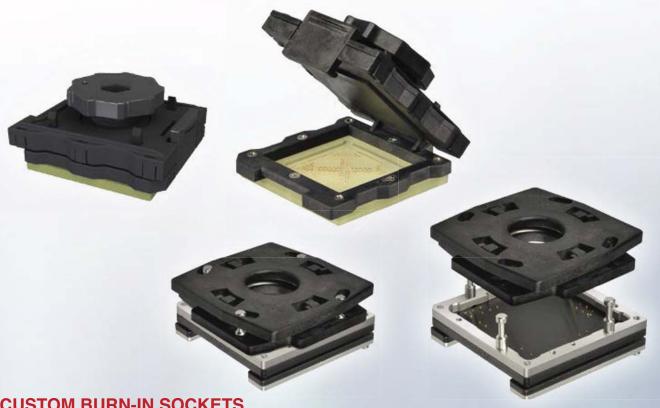


Pitch	No. of Contacts	Package Size(mm)	Part Number
	64	7.95x8.98	BPT-064-10-7.95/8.98
	64	9x9	BPT-064-10-9.0/9
	64	9x11.5	BPT-064-10-9.0/11.5
	64	10.95x11.95	BPT-064-10-10.95/11.95
	66	7.47x11.02	BPT-066-10-7.47/11.02
	72	10x10	BPT-072-10-10.0/10
1.0	80	7x9	BPT-080-10-7.0/9
	80	8x8	BPT-080-10-8.0/8
	80	8x11.6	BPT-080-10-8.0/11.6
	80	8x10	BPT-080-10-8.0/10
	80	9x11.5	BPT-080-10-9.0/11.5
	81	8x8	BPT-081-10-8.0/8
	81	9x9	BPT-081-10-9.0/9
	36	6x6	BPT-036-12-6.0/6
	64	9x9	BPT-064-12-9.0/9
1.27	74	12x12	BPT-074-12-12.0/12
1.21	80	11x11	BPT-080-12-11.0/11
	96	15x15	BPT-096-12-15.0/15
	100	11x11	BPT-100-12-11.0/11

### **CUSTOM BURN-IN SOCKETS**



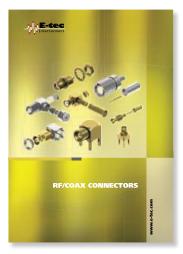


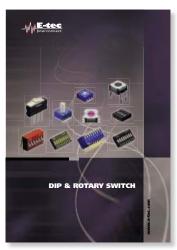


### **CUSTOM BURN-IN SOCKETS**

E-tec Interconnect has over 25 years experience in the design and manufacture of chip test sockets and contactors. This know-how is ideally suited for the fabrication of custom burn-in sockets to satisfy your specific application and we invite you to contact us with your requirements. Your inquiry will receive our prompt review and response.













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