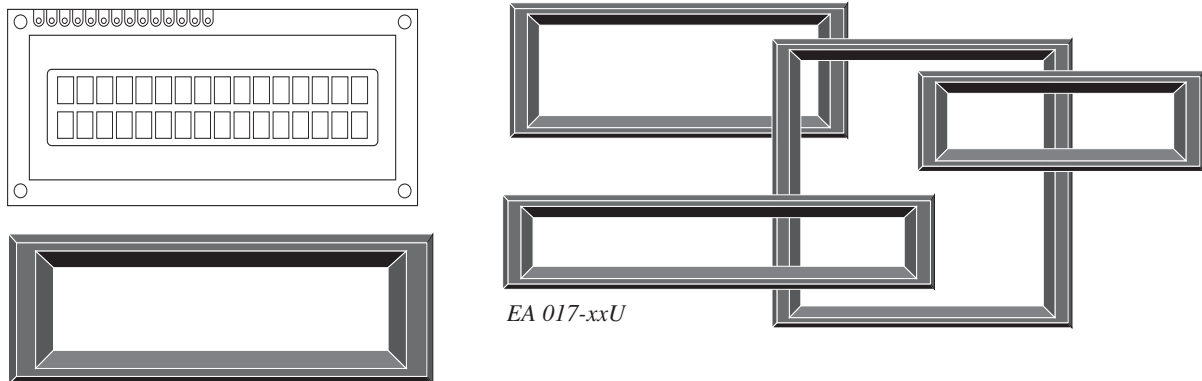


# BEZEL FOR DOTMATRIX MODULES

Issue 4.2016

**MMS**<sup>M</sup><sup>M</sup><sup>S</sup>**E**  
ELECTRONICS



## BEZELS EA 017-XXU SERIES

These bezels give your equipment a professional design without extra tooling. The bezels are made of black ABS-material (UL listed) with a scratch-resistant and structured surface. They include a snap-in appliance for easy mounting of different 1 mm windows. They are available with glass or acrylicglass window, both clear or antiglare version. The bezels are glued into the frontpanel of your equipment.

bezel version	ordering information
without window	EA 017-xxU
clear acrylicglass	EA 017-xxUK
antiglare acrylicglass	EA 017-xxUKE
clear glass	EA 017-xxUG
antiglare glass	EA 017-xxUGE

## BEZELS EA 017-XX SERIES

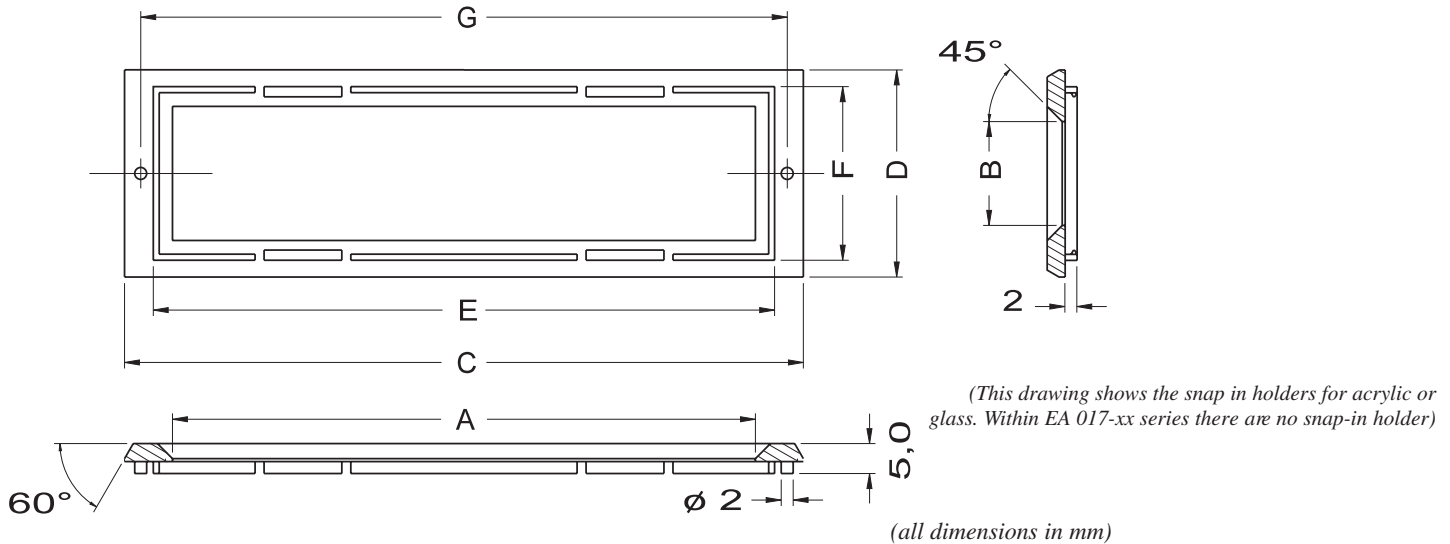
These bezels are similar in design (not UL listed), the surface is mat black coated. Acrylicglass windows are available clear or antiglare.

bezel version	ordering information
without window	EA 017-xx
clear acrylicglass	EA 017-xxK
antiglare acrylicglass	EA 017-xxKE

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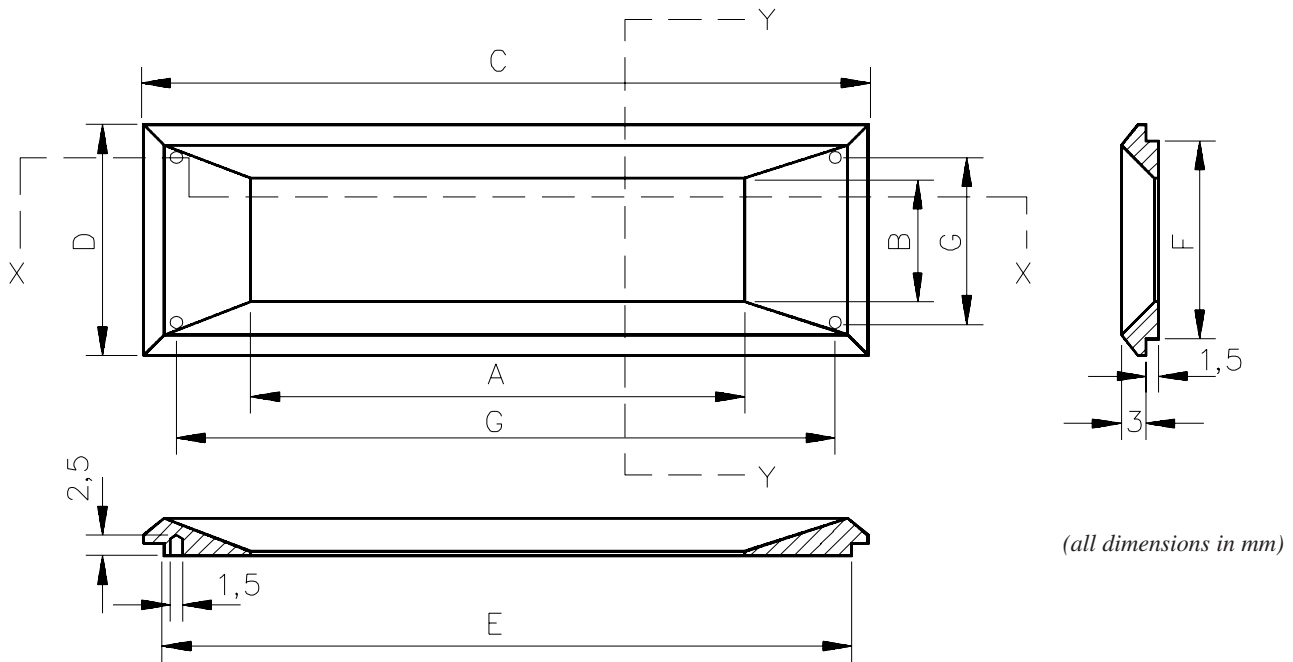
# BEZELS FOR DOTMATRIX MODULES EA 017-xxU AND EA 017-xx SERIES



Ordering information	viewing area		bezel size		cutout		studs G	matching lcd-module dotmatrix / graphic
	A	B	C	D	E	F		
EA 017-1U	63,5	12,8	79,5	25,0	69,7	19,2	74,5	EA 7161-A 1x16
EA 017-2U	60,0	14,8	76,0	27,0	66,2	21,2	71,0	EA 7162 2x16
EA 017-3	131,5	13,0	147,5	25,2	137,7	19,4	142,5	(EA 7321) 1x32
EA 017-4U	153,0	14,8	169,0	27,0	159,2	21,2	164,0	EA 7402 2x40
EA 017-5	140,0	15,8	156,0	28,0	146,2	22,2	151,0	EA 7322-B 2x32
EA 017-6U	98,5	12,8	114,5	25,0	104,7	19,2	109,5	EA 7161-E 1x16
EA 017-7U	81,5	17,2	97,5	29,4	87,7	23,6	92,5	EA 7202 2x20
EA 017-8U	60,8	24,2	76,8	36,4	67,0	30,6	71,8	EA 7164 4x16
EA 017-9U	75,0	24,2	91,0	36,4	81,2	30,6	86,0	EA 7204 4x20
EA 017-10U	131,0	38,0	147,0	50,2	137,2	44,4	142,0	EA 7240-6 240x64
EA 017-12U	97,4	22,4	113,4	34,6	103,6	28,8	108,4	EA 7162-B 2x16
EA 017-13U	145,0	28,0	161,0	40,2	151,2	34,4	156,0	EA 7404 4x40
EA 017-14U	92,0	14,8	108,0	27,0	98,4	21,2	103,0	EA 7242 2x24
EA 017-15U	68,0	68,0	84,0	80,2	74,2	74,4	79,0	EA VK-2128 128x128
EA 017-16U	75,0	39,0	91,0	51,2	81,2	45,4	86,0	EA VK-2080 160x80
EA 017-17U	58,0	32,5	74,0	44,7	64,2	38,9	69,0	EA VK-2064 128x64
EA 017-18U	99,5	80,5	115,5	92,7	105,7	86,9	110,5	EA VK-5160 160x128
EA 017-23	121,0	12,0	137,0	24,2	127,2	18,4	132,0	EA 8201-B 1x20
EA 017-25	121,0	41,5	137,0	53,7	127,2	47,9	132,0	EA 8204-B 4x20
EA 017-27	145,0	33,8	161,0	46,0	151,2	40,2	156,0	EA 8202-C 2x20
EA 017-28	145,0	63,9	161,0	76,1	151,2	70,3	156,0	EA 8204-C 4x20

The panel cutout should be 0.2 to 0.5 mm larger than dimension EF. The bezel is centered to the cutout by 2 studs with 2mm diameter.

# BEZELS FOR DOTMATRIX MODULES EA 07 SERIES

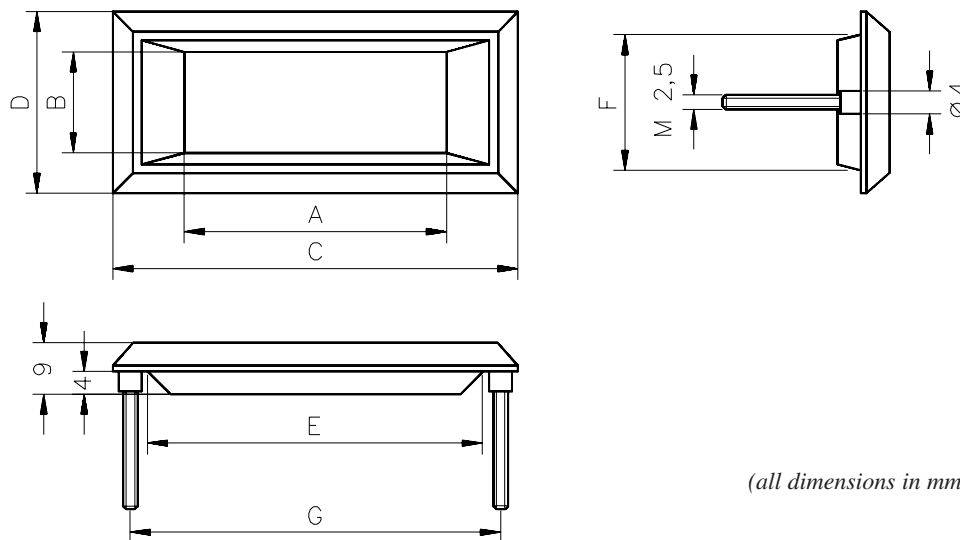


Ordering information	viewing area		bezel size		cutout		mounting G	matching module
	A	B	C	D	E	F		
EA 07-B	97,0	12,0	122,0	25,0	118,0	21,0	114 x 17	EA 7161-E/-F
EA 07-C	60,0	15,0	88,0	28,0	84,0	24,0	80 x 20	EA 7162 a.o.
EA 07-D	82,0	17,0	107,0	30,0	103,0	26,0	99 x 20	EA 7202 a.o.
EA 07-E	151,0	15,0	176,0	28,0	174,0	24,0	169 x 20	EA 7402 a.o.

The bezels from the EA 07 series are always delivered without acrylicglass window.

# BEZELS FOR FRONTPANEL DESIGN AND MOUNTING

## STANDARD BEZELS WITH SCREWPINS M2,5 FOR LCD-MODULES FROM SERIES EA 11xx, EA 21xx, EA 31xx, 41xx AND EA 61xx



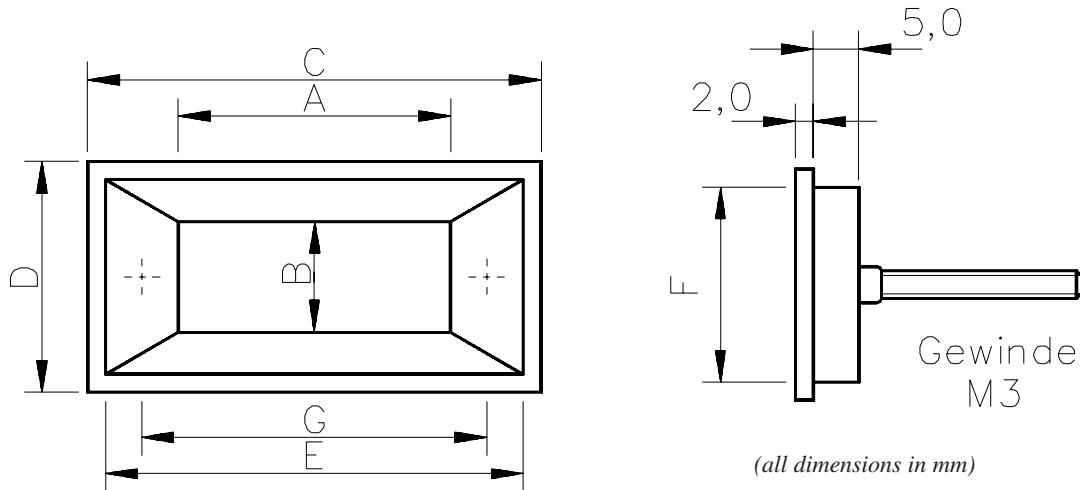
*(all dimensions in mm)*

Ordering information	viewing area		bezel size		cutout		mounting	matching module
	A	B	C	D	E	F	G	
EA 03	45,6	17,7	70,0	32,0	54,5	22,0	61 / M2,5	13mm 4digit
EA 08-N	62,2	22,6	87,0	36,6	72,7	28,2	80,3/ M2,5	18mm 4digit
EA 09	86,2	17,7	113,0	32,0	96,0	22,0	104 / M2,5	13mm 8digit
EA 050-N	160,0	56,0	189,0	73,0	173,2	62,3	180,3 x 61	50mm 4digit

The bezels have two (EA 050-N: four) screwpins M2,5 for mounting the LCD-module on the frontpanel. The delivery includes the matching nuts.

At 5 pcs off we can deliver these bezels (excl. EA 050-N) with pasted acrylicglass (thickness 1mm).

# FRONTPANEL AND MOUNTING BEZELS FOR LED-MODULES WITH 12, 19, 25mm DIGIT HEIGHT



Ordering information	viewing area		bezel size		cutout		mounting G	matching module
	A	B	C	D	E	F		
EA 074-R	42,7	12,2	63,0	25,5	59,0	21,5	48,5/ M3	4 Digit (LED)
EA 079-R	106,0	12,2	125,5	25,5	121,5	21,5	114,5/ M3	9 Digit (LED)
EA 083-R	43,0	25,0	62,5	38,0	58,5	34,0	50 / M3	3 Digit (LED)
EA 087-K/-R	93,0	25,0	114,0	38,0	110,0	34,0	101	8 Digit (LED)
EA 093-R	38,0	19,5	59,0	32,0	55,0	28,0	45 / M3	3 Digit (LED)
EA 094-R	50,0	19,5	70,5	32,0	66,5	28,0	58 / M3	4 Digit (LED)
EA 096-R	77,0	19,5	97,0	32,0	93,0	28,0	84 / M3	6 Digit (LED)

These bezels are usually delivered with a red acrylicglass window. Alternatively you can order a clear acrylicglass window. The ordering information is now e.g: **EA 096-K** insted of **EA 096-R**.

## FRONTPANEL AND MOUNTING BEZELS FOR SPECIAL MODULES



(all dimensions in mm)

Ordering information	viewing area		bezel size		cutout		mounting	matching module
EA 033-K	45,7	18,2	72,0	36,0	68,0	33,0	62 x 27	EA 4060-DP
EA 033-R	45,7	18,2	72,0	36,0	68,0	33,0	62 x 27	EA 4040-DP
EA 044	32,5	13,0	48,0	24,0	45,0	22,5	snap-in	EA 4044
EA 055	42,5	17,5	60,0	30,0	57,0	27,0	snap-in	EA 4055/-S
EA 055-31	42,5	17,5	60,0	30,0	57,0	27,0	snap-in	EA 1031-N,EA 4050

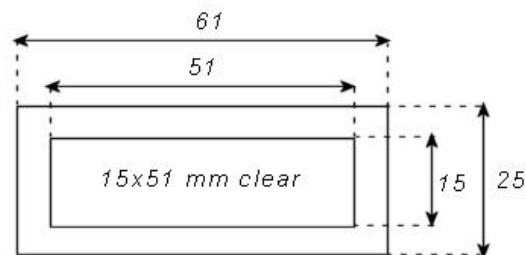
The snap-in bezel is delivered in two parts: the bezel and the window. The bezel is pressed from the frontside into the frontpanel and the corresponding module is snapped in from the rearside of the frontpanel. Finally the window is pasted up to the bezel.



This bezel is designed for use with the EA DOGM081, EA DOGM162, EA DOGM163 and EA DOGM132-5 displays.

## TECHNICAL DATA

- Bezel size : 25 x 61 x 1.1mm (HxWxD), Clear window : 15 x 51mm
- Non-glare medium finish to overcome front surface reflections
- All windows have black printed border 5mm wide
- 3M adhesive on the rear with carrier paper for removal before fitting
- HSR (High Scratch Resistant) optical grade filter
- Robust, high temperature, high scratch and impact resistant material
- Outstanding abrasion resistance, up to 20 times that of acrylics
- Chemical resistant, being immune to the effects of virtually all common solvents
- Maximum continuous operating temperature is in excess of 100°C, Intermittent up to 150°C
- Windows are fully cleaned and inspected
- Windows are supplied with protective film on front and rear of window



## ORDERING INFORMATION

BDOGMTXT

Visit [www.MMS-e.co.uk](http://www.MMS-e.co.uk)  
For LCD bezel selection



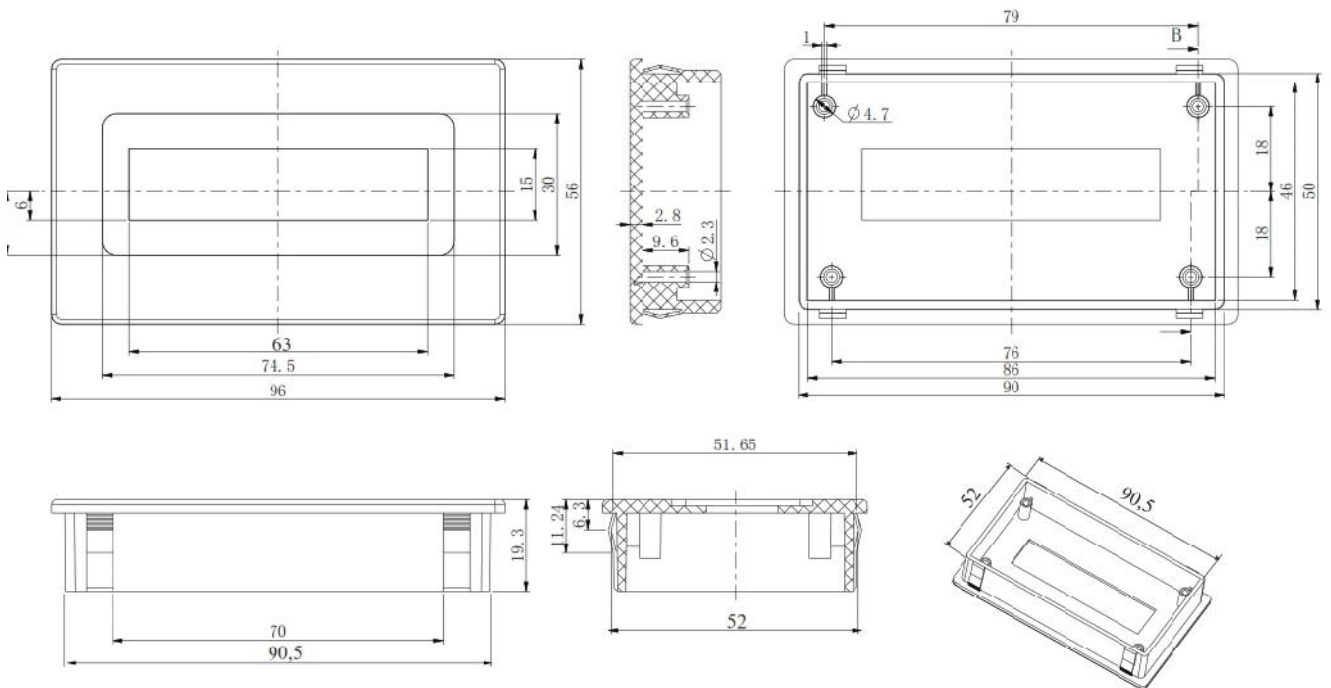
MMS Electronics Ltd  
Unit 3, Whiteley Court  
Pool Road  
Pool in Wharfedale  
Leeds LS21 1FR  
Tel : 01943 877 668

# SnapIN Bezel for 2x16 displays



## TECHNICAL DATA

- Bezel size : 96 x 56 mm (HxW), Clear window VA: 63 x 15 mm
- Grey printed border 10mm wide
- Snap IN, cutout 90.5 x 52mm



## ORDERING INFORMATION

MS B162\_63x15

Matching displays:  
EA P162-NLED ,EA W162B-NLW  
EA W162-XLG (OLED),  
FDCC1602E, MC21605A,



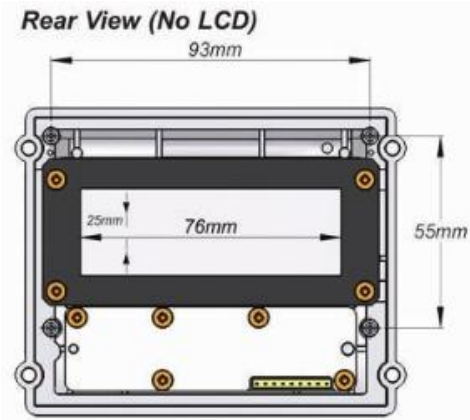
MMS Electronics Ltd  
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# Tough IP65 bezel 20x4 / 100x32



ST50204 (20x4) or ST50100-3 (100x32)



This bezel is designed for tough environments. Supplied with or without display.  
Bezel can be used with 20x4 text display or 100x32 graphic display.

## TECHNICAL DATA

- Bezel size : 114 x 88 x 17mm (HxWxD), Clear window : 25 x 76mm
- Display screw centre 93 x 55mm
- Clear Scratch Resistant, anti-reflective display window
- Can be fitted with 20x4 LCD or OLED display or 100x32 Graphic OLED
- Impact resistant 10J BS EN 60068-2-75:1997
- Weather sealed for outdoor use, supplied with panel gasket
- Robust and impact resistant material
- Resistant to petrochemicals and virtually all-common cleaning solvent
- Bezel temperature range : -20°C (dry) to +60°C
- OLED Display temperature range: -40°C to +80°C with fast reaction t
- 3 navigation keys with 0.1pitch header.
- Navigation keys switch rating 50mA max / 24V max.

### Matrix Keypad Connections

Contact Connections (viewed from rear of keypad)

PINS	*	*	*	*	*	*	*	*	*
PIN NO.	9	8	7	6	5	4	3	2	1

Contact Matrix

PINS	ROW / COLUMN
7	C1
6	C2
5	C3
3	R1

## ORDERING INFORMATION

- OPT ST5001 Bezel only IP65, 3 keys  
 OPT ST50204B Bezel with 20x4 Blue / White char LCD, IP65, 3 keys  
 OPT ST50204G Bezel with 20x4 Green/ Black char LCD, IP65, 3 keys  
 OPT ST50204X Bezel with 20x4 OLED Green/ Black char LCD, IP65, 3 keys  
 OPT ST50100-3X Bezel with 100x32 Green/ Black graphic LCD, IP65, 3 keys

Visit [www.MMS-e.co.uk](http://www.MMS-e.co.uk)  
For LCD bezel selection

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