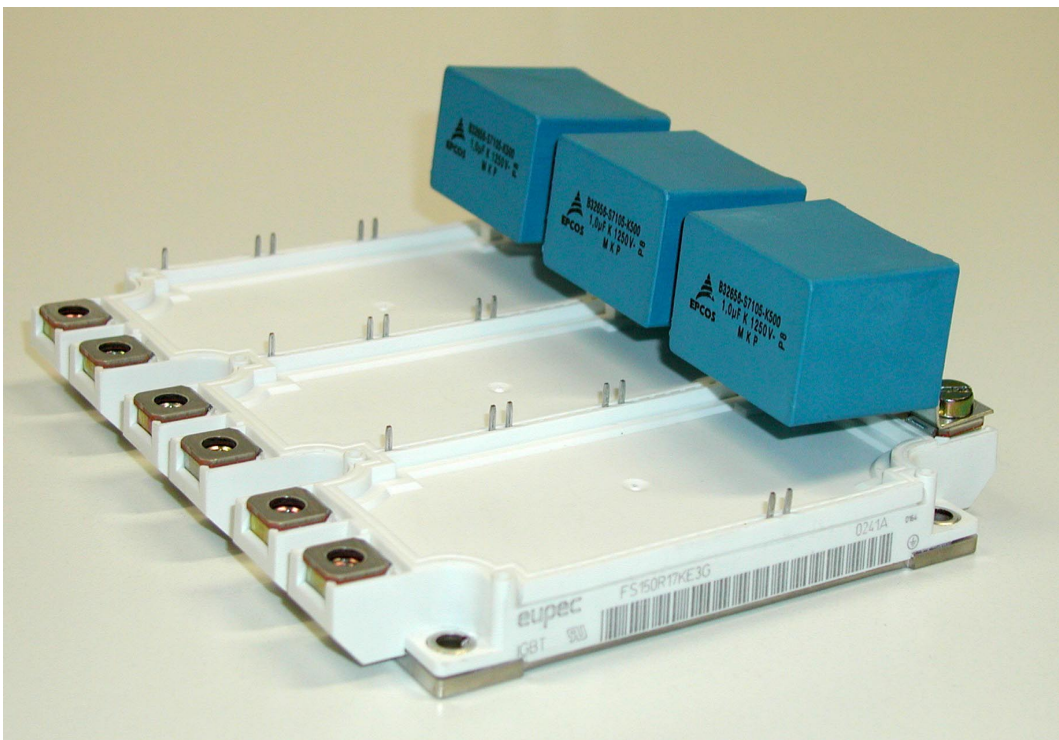




# Cross Reference for IGBT Snubber Capacitors Module / Capacitors



Film Capacitor Division



# IGBT Module / Capacitor Cross

## USER GUIDE

1 : Choose a modul	<b>1</b> →	<u>Modul / Terminal list</u> Fuji Eupec eg.: FS225R12KE Semikron (1200V)
2 : Take a terminal no.	<b>2</b> →	eg.: T5

3 : Choose a C-value	<b>3</b> →	<u>Capacitor list</u> C value eg.: 0.47 $\mu$ F
4 : Combine capacitor value, voltage and terminal	<b>4</b> →	Voltage $\geq$ module value eg.: 1200 V Terminal no. eg.: T5 Box size eg.: 18x39,5x41,5

Remark:

if the desired terminal is not available in the requested voltage.  
--> Go for next higher voltage.

EPCOS Ordering Code  
eg: T5 : B32656S7474K565



# IGBT - Module List

MODUL DATA		Voltage				Data		Terminal configuration				Terminal (Capacitor) fitting on the Module									
MFGR	Type	600	1200	1400	1700	V	I	Case	Screw	Lead space	Dimensions	T1	T2	T3	T4	T5	T6	T7	T8		
						(V)	(A)	(mm)	(mm)	(mm)											
EUPEC	Half Bridge	BSM50GB60DLC				600	50	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
		BSM75GB60DLC				600	75	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
		BSM100GB60DLC				600	100	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
		BSM150GB60DLC				600	150	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
		BSM200GB60DLC				600	200	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
		BSM300GB60DLC				600	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
	Chopper						1200	25	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5				
							1200	50	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5				
							1200	75	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5				
							1200	75	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5				
							1200	100	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	100	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	100	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5				
							1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
		Half Bridge						1200	25	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5			
								1200	35	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5			
								1200	50	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5			
								1200	75	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5			
								1200	75	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4				
							1200	100	34mm	M5	23	94x34x30.5	T1	T2		T4	T5				
							1200	100	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
							1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4					
						1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	35	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
						1200	50	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
						1200	75	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
						1200	100	34mm	M5	23	94 x 34 x 30.5	T1	T2		T4	T5					
						1200	100	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	150	62mm	M5	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	200	62mm	M5	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	400	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	400	62mm	M5	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	100	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	150	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	150	62mm	M5	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	200	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						
						1200	300	62mm	M6	28	6.4 x 61.4 x 30.5	T1			T4						







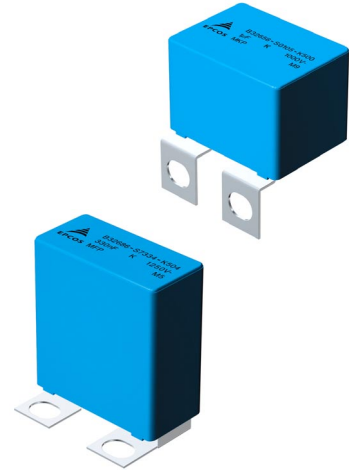


# IGBT - Module List

MODUL DATA		Voltage				Data		Terminal configuration			Terminal (Capacitor) fitting on the Module															
MFGR	Type	600	1200	1400	1700	V	I	Case	Screw	Lead	Dimensions	T1	T2	T3	T4	T5	T6	T7	T8							
						(V)	(A)	(mm)		space	(mm)															
TOSHIBA	IGBT Plus 2-109C1A 2-95A1A		MG 50 Q2Y S50 MG 75 Q2Y S50 MG 100 Q2Y S51 MG 100 Q2Y S50 MG 150 Q2Y S51 MG 150 Q2Y S50 MG 200 Q2Y S50 MG 300 Q2Y S50			1200	50	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5										
						1200	75	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5										
						1200	100	35	M5	28	108 x 62 x 35	T1			T4											
						1200	100	36	M5	23	94 x 48 x 29.7	T1	T2		T4	T5										
						1200	150	35	M5	28	108 x 62 x 35	T1			T4											
						1200	150	36	M5	23	94 x 48 x 29.7	T1	T2		T4	T5										
						1200	200	35	M5	28	108 x 62 x 35	T1			T4											
						1200	300	35	M5	28	108 x 62 x 35	T1			T4											
							600	50	9	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							600	75	9	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							600	100	8	M5	23	94 x 48 x 29.7	T1	T2		T4	T5									
							600	50	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							600	75	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							600	100	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							600	150	36	M5	23	94 x 48 x 29.7	T1	T2		T4	T5									
							600	200	36	M5	23	94 x 48 x 29.7	T1	T2		T4	T5									
							600	300	35	M5	28	108 x 62 x 35	T1			T4										
							1200	25	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							1200	50	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							1200	75	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							1200	100	35	M5	28	108 x 62 x 35	T1			T4										
							1200	150	35	M5	28	108 x 62 x 35	T1			T4										
							1200	200	35	M5	28	108 x 62 x 35	T1			T4										
							1700	30	33	M5	23	93.5 x 35 x 32	T1	T2		T4	T5									
							1700	90	35	M5	28	108 x 62 x 35	T1			T4										
							1700	120	35	M5	28	108 x 62 x 35	T1			T4										
	MITSUBISHI	Singl U-pack					600	75	D	M5	23	94 x 48 x 30	T1	T2		T4	T5									
							600	75	D	M5	23	94 x 48 x 30	T1	T2		T4	T5									
600							100	D	M5	23	94 x 48 x 30	T1	T2		T4	T5										
600							100	D	M5	23	94 x 48 x 30	T1	T2		T4	T5										
600							150	D	M5	23	94 x 48 x 30	T1	T2		T4	T5										
600							150	D	M5	23	94 x 48 x 30	T1	T2		T4	T5										
600							200	D	M5	23	94 x 48 x 30	T1	T2		T4	T5										
600							200	D	M6	25	108 x 62 x 29	T1			T4											
600							300	D	M6	25	108 x 62 x 29	T1			T4											
600							300	D	M6	25	108 x 62 x 29	T1			T4											
600							400	D	M6	25	108 x 62 x 29	T1			T4											
4 pack												600	75	B	M4	20	91 x 72 x 26		T2			T5				
												600	100	B	M4	20	91 x 72 x 26		T2			T5				
												600	75	T	M4	20	102 x 91 x 26		T2			T5				
		600	75	T	M4	20						102 x 91 x 26		T2			T5									
		600	100	T	M4	20						102 x 91 x 26		T2			T5									
		600	100	T	M4	20						102 x 91 x 26		T2			T5									
		600	150	T	M5	23						107 x 102 x 86	T1	T2		T4	T5									
		600	150	T	M5	23						107 x 102 x 86	T1	T2		T4	T5									
		600	200	T	M5	23						107 x 102 x 86	T1	T2		T4	T5									
		600	200	T	M5	23						107 x 102 x 86	T1	T2		T4	T5									
6 pack							600	50	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	75	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	100	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	150	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	150	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	200	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	300	D	M5	23	94 x 34 x 31	T1	T2		T4	T5									
							600	400	D	M6	25	108 x 62 x 31	T1			T4										
							Dual						600	50	D	M5	23	94 x 34 x 31	T1	T2		T4	T5			
													600	75	D	M5	23	94 x 34 x 31	T1	T2		T4	T5			
													600	100	D	M5	23	94 x 34 x 31	T1	T2		T4	T5			
													600	150	D	M5	23	94 x 34 x 31	T1	T2		T4	T5			
													600	150	D	M5	23	94 x 34 x 31	T1	T2		T4	T5			
													600	200	D	M5	23	94 x 34 x 31	T1	T2		T4	T5			
600		300	D	M5	23	94 x 34 x 31							T1	T2		T4	T5									
600		400	D	M6	25	108 x 62 x 31							T1			T4										

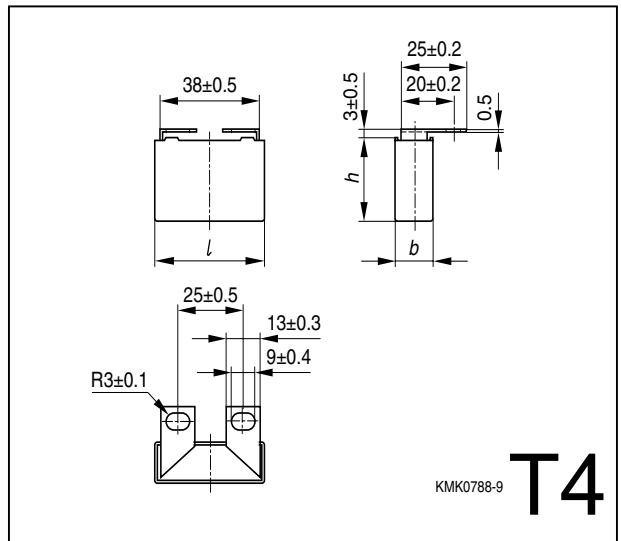
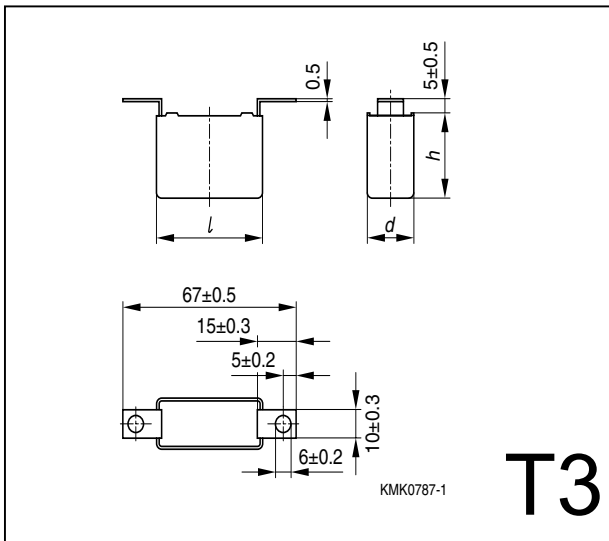
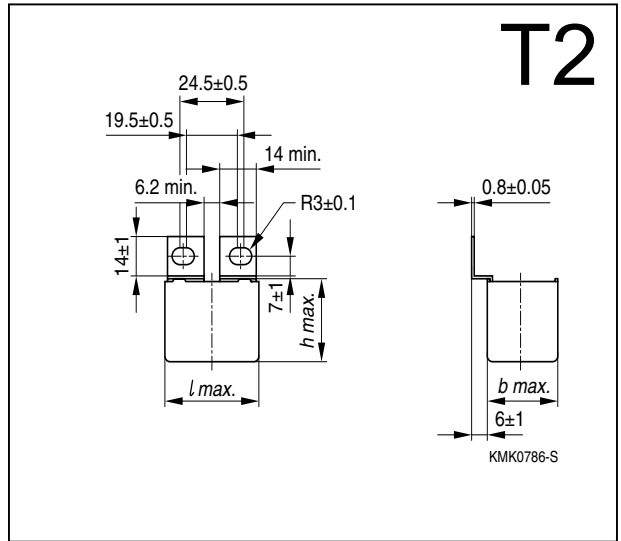
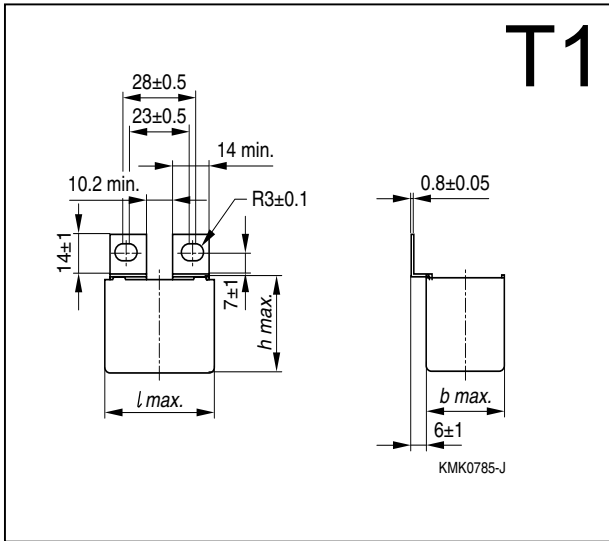






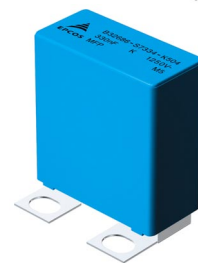
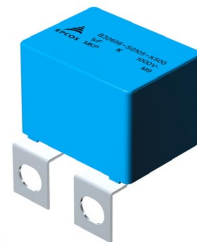
# IGBT Terminal

(Versions Available)



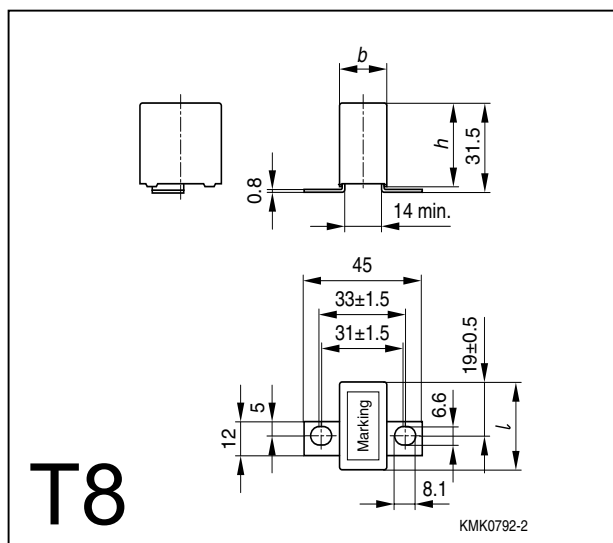
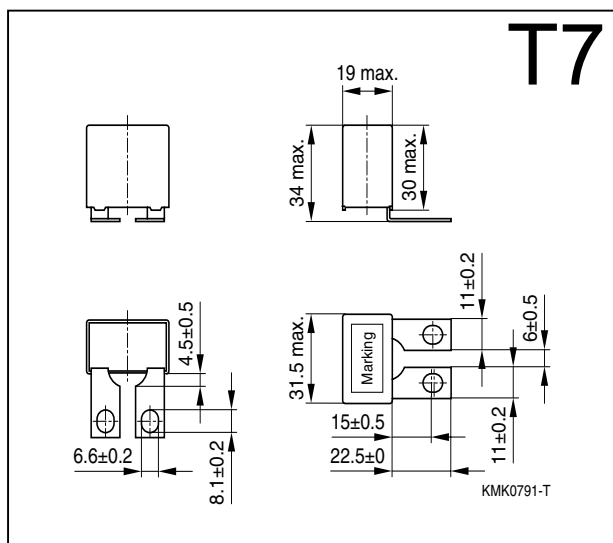
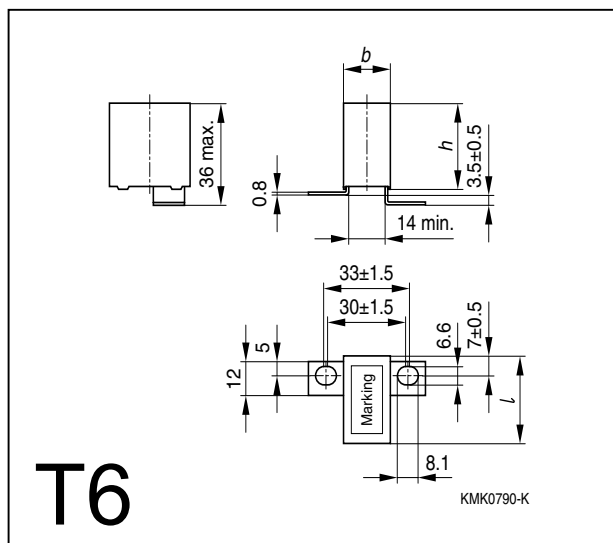
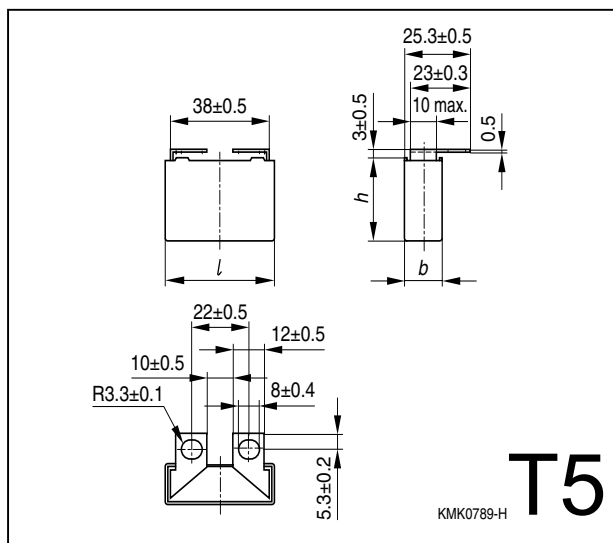
Special layouts upon request

Lead space		Boxes									
Terminal	Code	b x h x l	b x h x l	b x h x l	b x h x l	b x h x l	b x h x l	b x h x l	b x h x l	b x h x l	b x h x l
T1	561	23 - 28	20 x 39.5 x 41.5	28 x 37 x 42	30 x 45 x 42						
T2	562	19 - 24	20 x 39.5 x 41.5	28 x 37 x 42	30 x 45 x 42						
T3	563	57	12 x 22.5 x 41.5	14 x 25 x 41.5	16 x 28.5 x 41.5	18 x 32.5 x 41.5	20 x 39.5 x 41.5	28 x 37 x 42	30 x 45 x 42	31 x 26 x 43.6	
T4	564	23 - 28	14 x 25 x 41.5	16 x 28.5 x 41.5	18 x 32.5 x 41.5	20 x 39.5 x 41.5					
T5	565	20 - 24	14 x 25 x 41.5	16 x 28.5 x 41.5	18 x 32.5 x 41.5	20 x 39.5 x 41.5					
T6	566	30 - 33	19 x 30 x 32								
T7	567	17 - 18	19 x 30 x 32								
T8	568	31 - 33	19 x 30 x 32								
T9	569	25	18 x 32.5 x 41.5	20 x 39.5 x 41.5							



# IGBT Terminal

(Versions Available)



Special layouts upon request

Terminal	Code	Lead space (mm)	Boxes																																							
			b	x	h	x	l	b	x	h	x	l	b	x	h	x	l	b	x	h	x	l	b	x	h	x	l															
T1	561	23 - 28	20	x	39.5	x	41.5	28	x	37	x	42	30	x	45	x	42																									
T2	562	19 - 24	20	x	39.5	x	41.5	28	x	37	x	42	30	x	45	x	42																									
T3	563	57	12	x	22.5	x	41.5	14	x	25	x	41.5	16	x	28.5	x	41.5	18	x	32.5	x	41.5	20	x	39.5	x	41.5	28	x	37	x	42	30	x	45	x	42	31	x	26	x	43.6
T4	564	23 - 28	14	x	25	x	41.5	16	x	28.5	x	41.5	18	x	32.5	x	41.5	20	x	39.5	x	41.5																				
T5	565	20 - 24	14	x	25	x	41.5	16	x	28.5	x	41.5	18	x	32.5	x	41.5	20	x	39.5	x	41.5																				
T6	566	30 - 33	19	x	30	x	32																																			
T7	567	17 - 18	19	x	30	x	32																																			
T8	568	31 - 33	19	x	30	x	32																																			
T9	569	25	18	x	32.5	x	41.5	20	x	39.5	x	41.5																														



# IGBT - Capacitor Questionnaire

**Please fill in your requirements:**

**Application:**

Start of production:

Quantity / year:

**Module:**

Mfgr:

Voltage:

Current:

Lead space:

Screw diameter:

**Capacitor:**

Lead space:

Dimensions:

Capacitance value:

Tolerance:

Voltage (Vdc):

Voltage (Vac):

Current (A):

dv/dt:

Switching frequency:

Load diagramm: if available (curve forms)  
or your specification...