

F 6 – 25 R 06 KF

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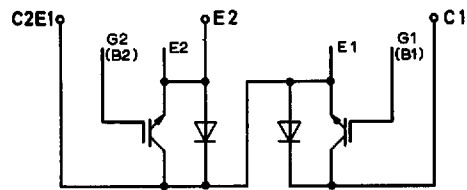
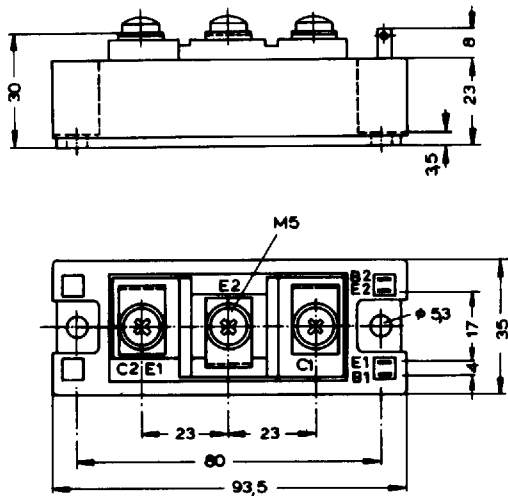
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Transistor				Thermische Eigenschaften		Thermal properties	
Elektrische Eigenschaften				R_{thJC}	DC, pro Baustein / per module DC, pro Zweig / per arm	0,21 °C/W 1,25 °C/W	
Höchstzulässige Werte				Höchstzulässige Werte		Maximum rated values	
V_{CES}			600 V	t_{vjmax}		150 °C	
I_C			25 A	t_{vjop}		-40 / + 150 °C	
I_{CRM}	$t_p = 1 \text{ ms}$		50 A	t_{stg}		-40 / + 125 °C	
P_{tot}	$t_C = 25^\circ\text{C}$		100 W	Inversdiode		Inverse diode	
V_{GE}			20 V	Elektrische Eigenschaften		Electrical properties	
V_{EG}			20 V	Höchstzulässige Werte		Maximum rated values	
Charakteristische Werte				$I_F(\text{max})$		25 A	
$V_{CE \text{ sat}}$	$i_{CM} = 25 \text{ A}, v_{GE} = 15 \text{ V}, t_{vj} = 25^\circ\text{C}$	typ.	3 V	I_{FRM}	$t_p = 1 \text{ ms}$	50 A	
	$i_{CM} = 25 \text{ A}, v_{GE} = 15 \text{ V}, t_{vj} = 25^\circ\text{C}$	max.	4 V	Charakteristische Werte		Characteristic values	
$V_{GE}(\text{th})$	$V_{CE} = 5 \text{ V}, i_C = 25 \text{ mA}, t_{vj} = 25^\circ\text{C}$	min.	3 V	V_F	$i_F = 25 \text{ A}, v_{GE} = 0 \text{ V}, t_{vj} = 25^\circ\text{C}$	typ.	1,5 V
	$V_{CE} = 5 \text{ V}, i_C = 25 \text{ mA}, t_{vj} = 25^\circ\text{C}$	max.	6 V		$i_F = 25 \text{ A}, v_{GE} = 0 \text{ V}, t_{vj} = 25^\circ\text{C}$	max.	2,5 V
C_{GE}	$V_{CE} = 10 \text{ V}, v_{GE} = 0 \text{ V}, f_o = 1 \text{ MHz}, t_{vj} = 25^\circ\text{C}$	typ.	1,4 nF	I_{RM}	$i_{FM} = 25 \text{ A}, -di_F/dt = 50 \text{ A}/\mu\text{s}$	typ.	6 A
i_{CES}	$V_{CE} = 600 \text{ V}, v_{GE} = 0 \text{ V}, t_{vj} = 25^\circ\text{C}$	typ.	0,2 mA		$v_{EG} = 10 \text{ V}, t_{vj} = 25^\circ\text{C}$		
	$V_{CE} = 600 \text{ V}, v_{GE} = 0 \text{ V}, t_{vj} = 125^\circ\text{C}$	typ.	1 mA		$i_{FM} = 25 \text{ A}, -di_F/dt = 50 \text{ A}/\mu\text{s}$	typ.	10 A
i_{GES}	$V_{GE} = 20 \text{ V}, t_{vj} = 25^\circ\text{C}$	typ.	50 nA		$v_{EG} = 10 \text{ V}, t_{vj} = 125^\circ\text{C}$	typ.	1 μAs
	$V_{GE} = 20 \text{ V}, t_{vj} = 25^\circ\text{C}$	max.	500 nA		$i_{FM} = 25 \text{ A}, -di_F/dt = 50 \text{ A}/\mu\text{s}$	typ.	3 μAs
i_{EGS}	$V_{EG} = 20 \text{ V}, t_{vj} = 25^\circ\text{C}$	typ.	50 nA		$v_{EG} = 10 \text{ V}, t_{vj} = 25^\circ\text{C}$		
	$V_{EG} = 20 \text{ V}, t_{vj} = 25^\circ\text{C}$	max.	500 nA		$i_{FM} = 25 \text{ A}, -di_F/dt = 50 \text{ A}/\mu\text{s}$		
t_{on}	$i_{CM} = 25 \text{ A}, V_{CE} = 300 \text{ V}, V_{LF} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 25^\circ\text{C}$	typ.	0,4 μs		$v_{EG} = 10 \text{ V}, t_{vj} = 125^\circ\text{C}$		
	$i_{CM} = 25 \text{ A}, V_{CE} = 300 \text{ V}, V_{LF} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 125^\circ\text{C}$	typ.	0,5 μs				
t_s	$i_{CM} = 25 \text{ A}, V_{CE} = 300 \text{ V}, V_{LF} = 15 \text{ V}, V_{LR} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 25^\circ\text{C}$	typ.	0,4 μs	Thermische Eigenschaften		Thermal properties	
	$i_{CM} = 25 \text{ A}, V_{CE} = 300 \text{ V}, V_{LF} = 15 \text{ V}, V_{LR} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 125^\circ\text{C}$	typ.	0,5 μs	R_{thJC}	DC, pro Baustein / per module DC, pro Zweig / per arm	0,26 °C/W 1,56 °C/W	
t_f	$i_{CM} = 25 \text{ A}, V_{CE} = 300 \text{ V}, V_{LF} = 15 \text{ V}, V_{LR} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 25^\circ\text{C}$	typ.	0,15 μs				
	$i_{CM} = 25 \text{ A}, V_{CE} = 300 \text{ V}, V_{LF} = 15 \text{ V}, V_{LR} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 125^\circ\text{C}$	typ.	0,25 μs	t_{vjmax}		125 °C	
Bedingungen für den Kurzschlußschutz				t_{vjop}		-40 / + 125 °C	
Conditions for protection against short circuits				t_{stg}		-40 / + 125 °C	
$t_{ig} = 10 \mu\text{s}, V_{LF} = V_{LR} = 15 \text{ V}, R_G = 100 \Omega, t_{vj} = 125^\circ\text{C},$				Innere Isolation		Internal insulation	
$V_{CC} = 350 \text{ V}, V_{CEM} = 500 \text{ V}, i_{CMK1} \approx 120 \text{ A}, i_{CMK2} \approx 70 \text{ A}$				Isoliermaterial: AlN		Insulating material: AlN	
				V_{ISOL}	RMS	2,5 kV	
				Mechanische Eigenschaften		Mechanical properties	
				G		225 g	
				M1		3 Nm	

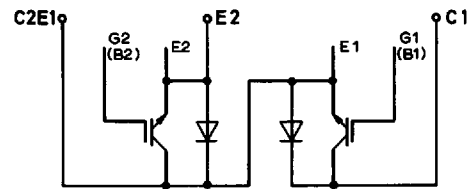
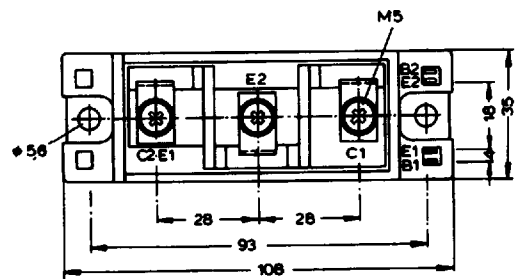
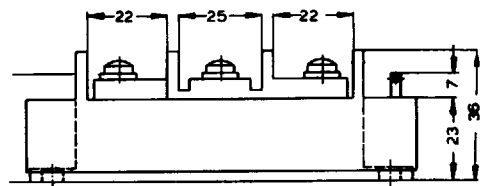
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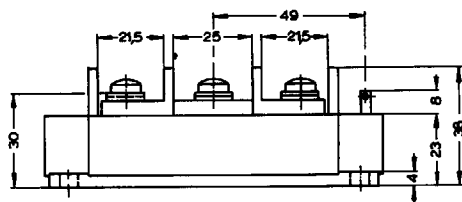
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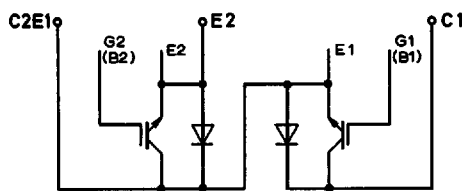
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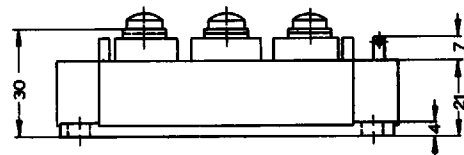


FF 100 R 1000 K

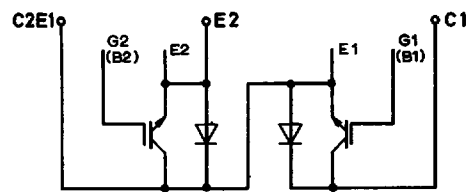


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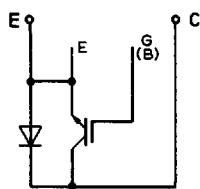
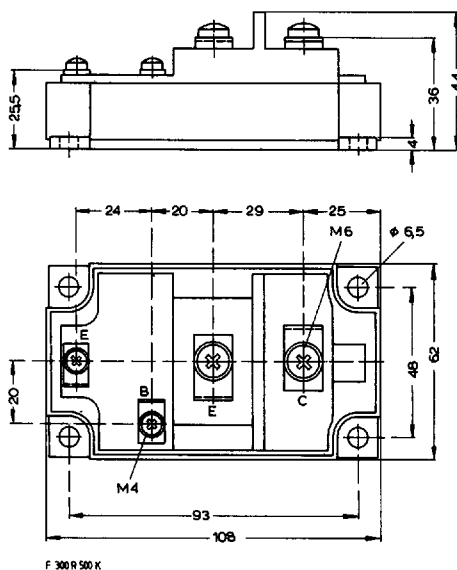
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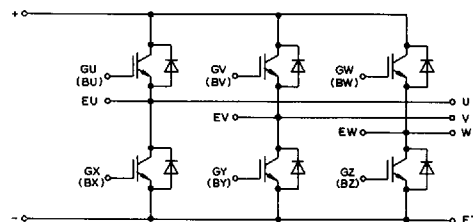
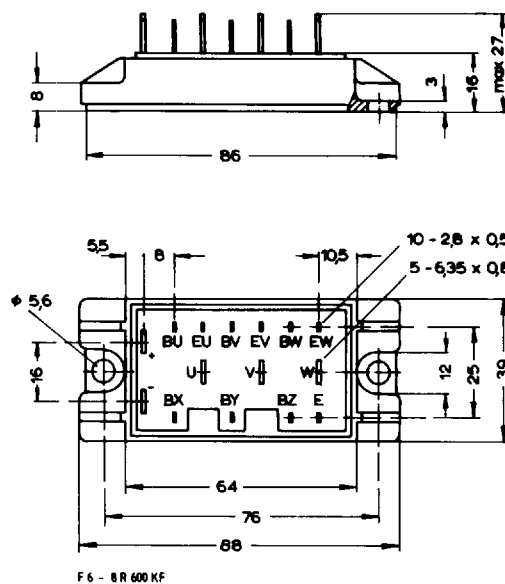
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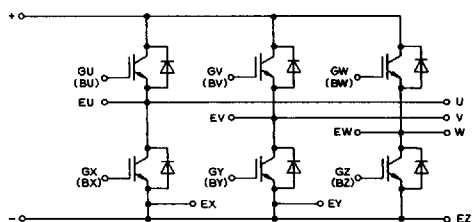
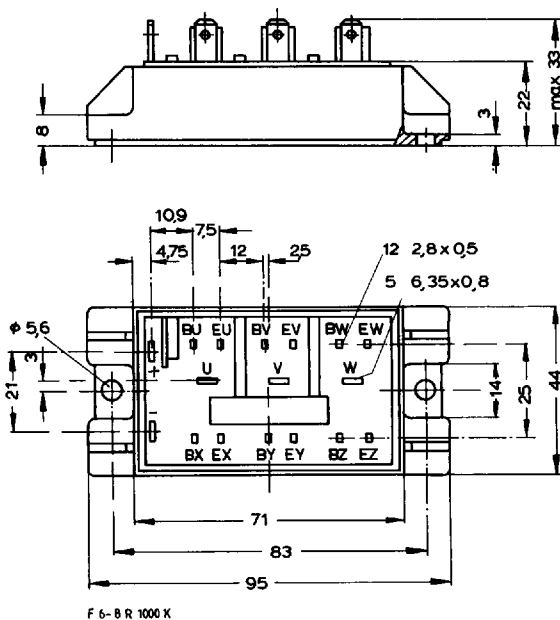
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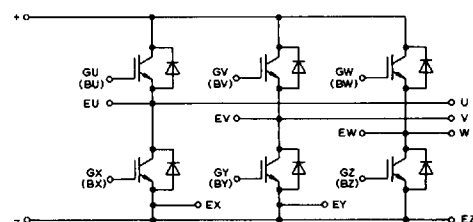
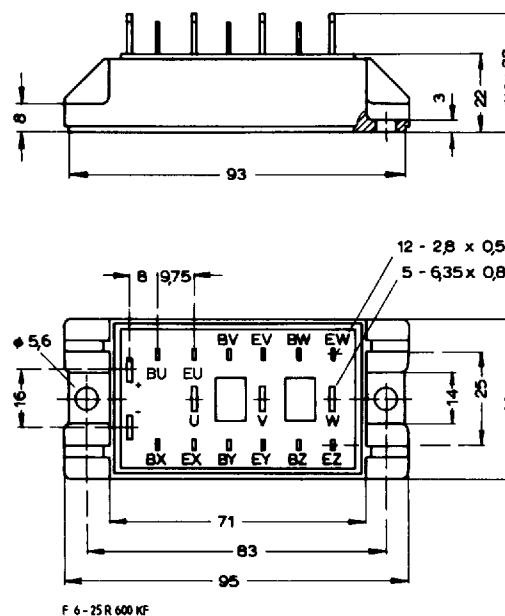
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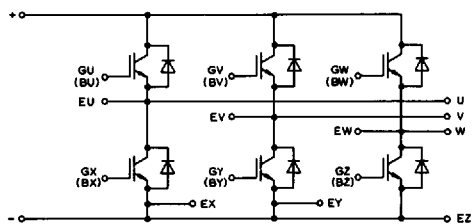
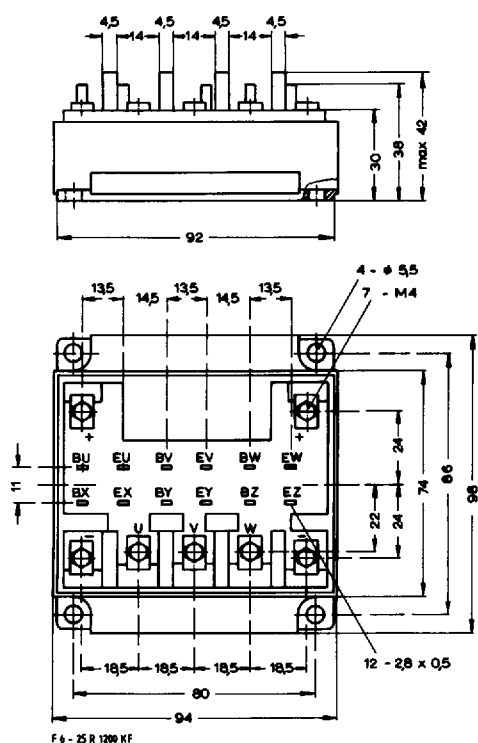
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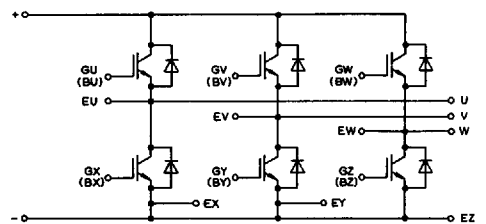
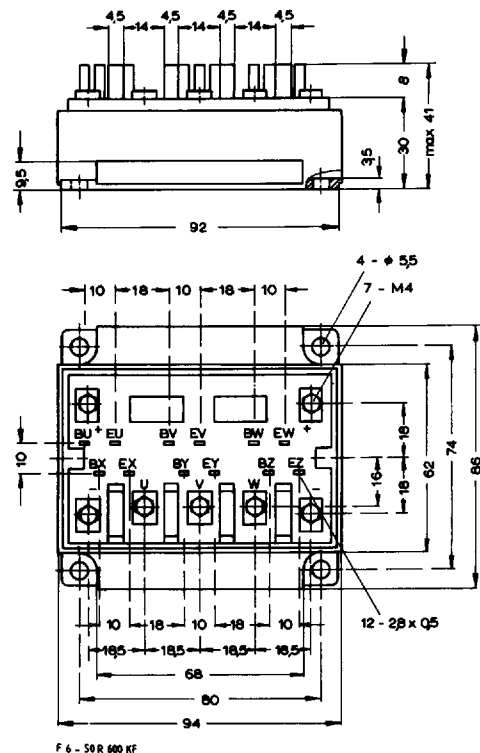
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