AH& H& H&

H A X Y

YU Y

B f lc a M=L i h ca ol nc h dn al n

dn mdha f j e a

Bca b nb lg f i h o npcs = dn mof nc h i l r ff hn

b n cmmj nc h

P oog mi f ldn a n bhi fi as i l hb h l fc dcs

VU

B mdha i hnli f

Fca b n i hnli f ms mn g

= g i ni l

D X WG U

V YAU FU : N= 7 , / = ohf mmi nb lq cn mj cc

DU U YY	X	G V	JU Y	I
L j mcp j ei mn n pi fn a	Npd7 , / =	P LG	,	P
L j mcp j el p lm pi fn a	Npd7 , / =	PLLG	,	P
Hi h l j mcp j ei mn n pi fn a	Npd7 , / =	P MG	, +	P
Hi h l j mcp j el p lm pi fn a	Npd7 , / =	PLMG	, +	P
p l a i lq l oll hn	N= 7 2/ =	N P	,	
@lq l mola oll hn	+), s f Mdn q p / Bt Npd7 , / °C	NMG	/.	
,np fo i l omdha		,n	+. / 2	,m
=lcc fl n i lcn i i h mn n oll hn	A7, AN	c) n	+/	) m
LGM cmi f nc h pi fn a	(= / Bt +m)+g dn	P MI	- 0)-	P
Doh nc h n g j l nol l ha		ND	. x +, /	°C
Mni l a n g j l nol l ha		Nmma	. x +, /	°C

YW WU U UWY W : N= 7 , / = ohf mmi nb lq cn mj cc

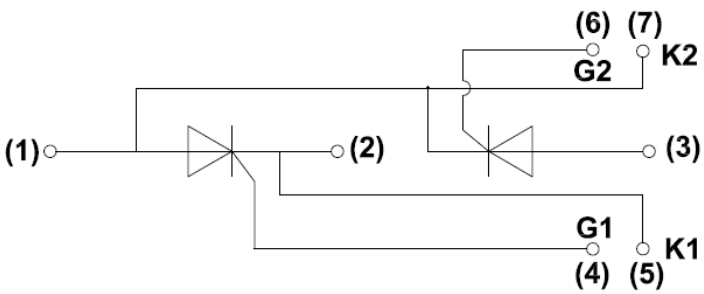
DU U YY	X	G V	JU Y			I
			A	H	AU	
J e i lq l pi fn a	N70 nJ7-2 m	PN			+(2	P
L j mcp j ei mn n oll hn	P 7 P LG Npd 7 , / ℃	LG			+	
	P 7 P LG Npd 7 +, / ℃				0	g
L p lm f e a oll hn	PL 7 PLLG Npd 7 , / ℃	LLG			+	
	PL 7 PLLG Npd 7 +, / ℃				0	g
Nbl mbi f pi fn a	@l j i q l fi mm f of nc h i hfs Npd 7 +, / ℃	PNI			(21	P
sh g c l mcm h	Npd 7 +, / ℃	IN			+(- /	g
Nlcaa lcha a n oll hn	P 7+, P LF7-	AN	,		+,	g
Bi f cha oll hn	N7+	B			, /	g
F n bcha oll hn	A7+(, AN	F			-	g
=lcc fl n i lcm i pi fn a	P 7,)-P LG Npd7+, / ℃ A n l j h	p) n	+			P) m

Nlcaa lcha a n pi fn a PD7+, P L

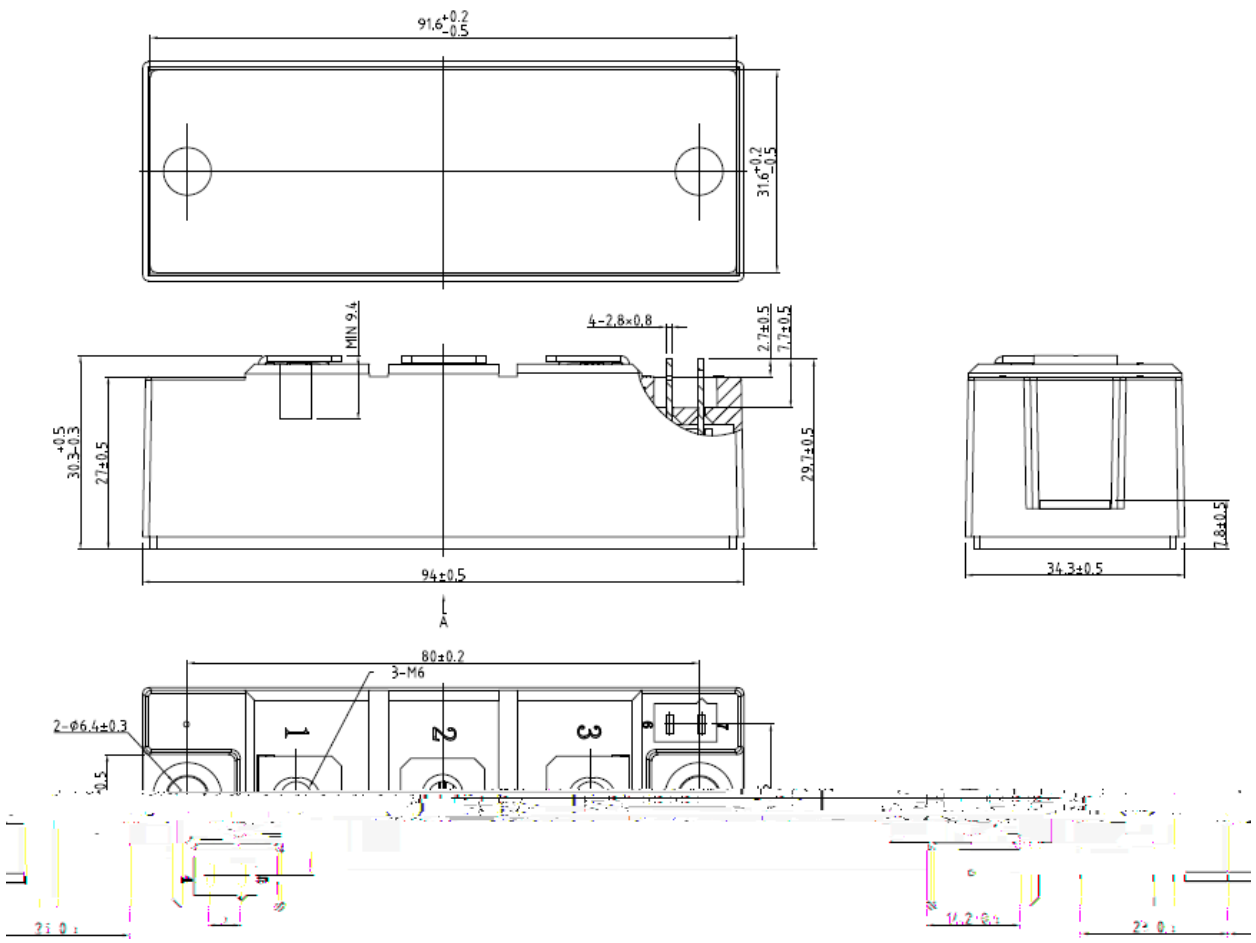
C XY U

Y WY	AU	DUWU Y	K Y	Y	DY U
DGN, EN, N,	DGN, EN, N,	N,	+1 + a)J=M	0 J=M	1, J=M

W U U



DUWU YC Y



Ohcni g mol g hn4g g

h i l g n c h o l h c m b c h r b c m i o g h n c m f c p n i o l n h l f c f (B i q p l
D c h a m o D c D c M g c i h o n i l = i (F n m m o g m h i l m j i h m c d c s i l r b i h m k o h m i o m
q c b i o n i h m c l n c h i l m o b c h i l g n c h h i l o m s i h c (N b c m c h i l g n c h c h r b c m i o g h n
c m m o d n n i b h a q c b i o n j l c i l h i n c (H i n q c b m m h c h a r b c m D c h a m o D c D c q d f o f f s i g j f s
q c b r b n l g m i o n f c h c h m c a h a l g h n (J l i o m m h c h i l g n c h j l i p c c h r b c m
i o g h n b p h i c h l c h a g h n i j n h m m (D c h a m o D c D c m m o g m h i l m j i h m c d c s i l h s
c h l c h a g h n i i r b l l c a b m m i r b c l j l n c m q b c b g s l m o f n l i g r b o m i m o b j l i o m m h
c h i l g n c h (N b c m i o g h n c m r b c h c c f l f m n +. o a o m m , , 0 (N b c m i o g h n
m o j l m m h l j f m f f c h i l g n c h j l p i c o m f s m o j j f c (

c m l a c m m l r l g l e i D c h a m o D c D c M g c i h o n i l = i (F n , , 0 D c h a m o D c D c
M g c i h o n i l = i (F n (f f l c a b m m l m l p (