

Absolute maximum ratings

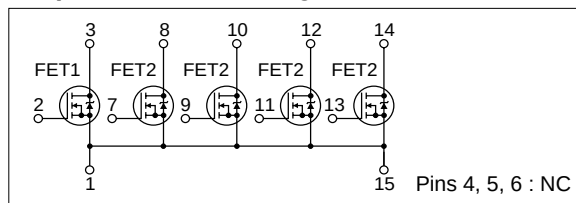
(Ta=25°C)

Symbol	Ratings		Unit
	FET 1	FET 2	
V _{DSS}	150		V
V _{GSS}	+20, -10		V
I _D	±7		A
I _D (pulse)*1	±15		A
E _{AS} *2	100		mJ
P _T	5 (Ta=25°C, with all circuits operating, without heatsink)		W
	47 (Tc=25°C, with all circuits operating, with infinite heatsink)		W
θ _{j-a}	25 (Junction-Air, Ta=25°C, with all circuits operating)		°C/W
θ _{j-c}	2.66 (Junction-Case, Tc=25°C, with all circuits operating)		°C/W
V _{iso}	1000 (Between fin and lead pin, AC)		Vrms
T _{ch}	150		°C
T _{stg}	-40 to +150		°C

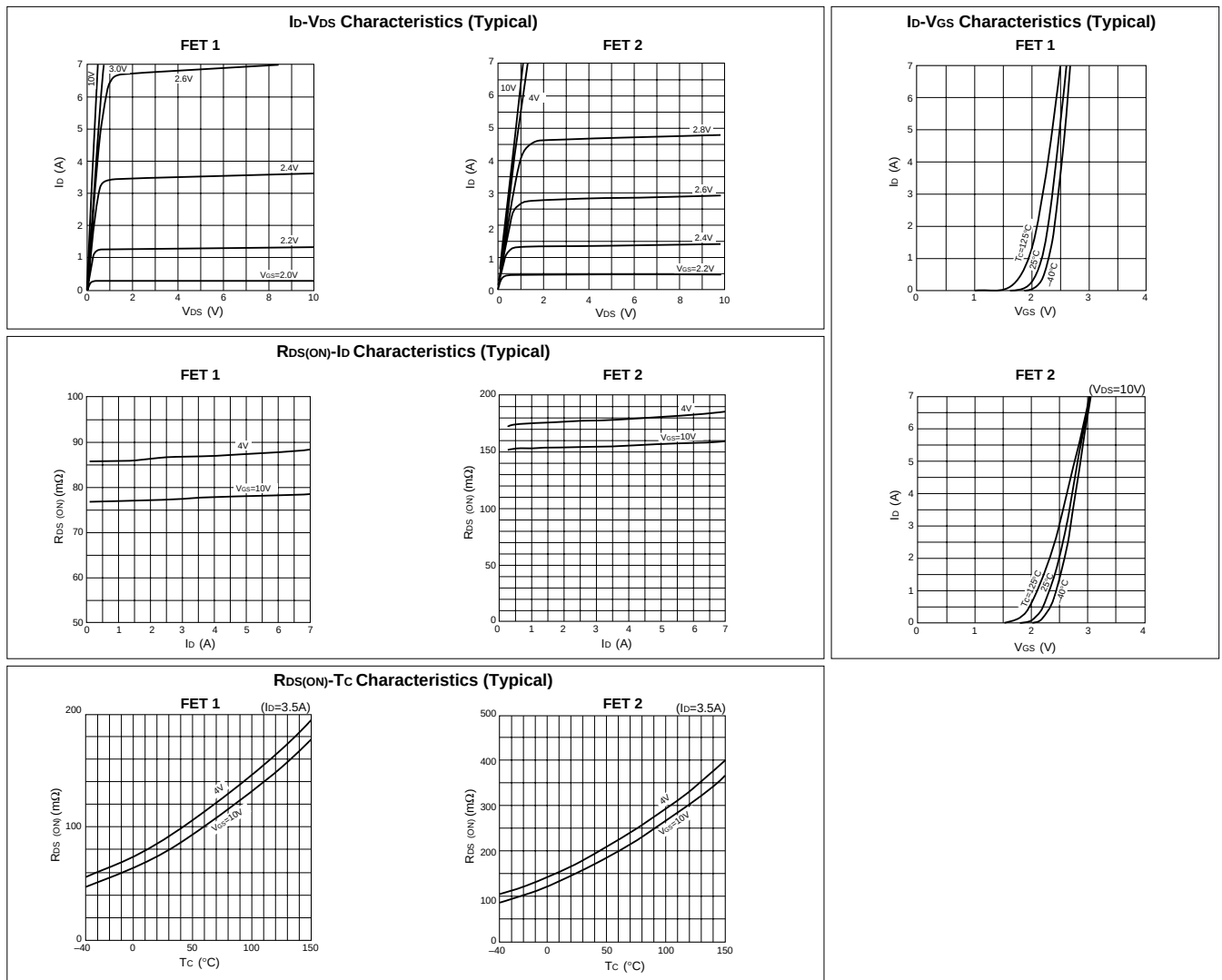
*1 : PW≤100μs, duty≤1%

*2 : V_{DD}=25V, L=3.4mH, I_D=7A, unclamped, R_G=50Ω, see Fig. E on page 15.

Equivalent circuit diagram



Characteristic curves



Electrical characteristics

(Ta=25°C)

Symbol	FET 1					FET 2				
	Specification			Unit	Conditions	Specification			Unit	Conditions
	min	typ	max			min	typ	max		
V(BR)DSS	150			V	Id=100μA, VGS=0V	150			V	Id=100μA, VGS=0V
IGSS			±100	nA	VGS=20V, -10V			±100	nA	VGS=20V, -10V
IDSS			100	μA	VDS=150V, VGS=0V			100	μA	VDS=150V, VGS=0V
VTH	1.0		2.0	V	VDS=10V, Id=250μA	1.0		2.0	V	VDS=10V, Id=250μA
Re(yfs)	7	12		S	VDS=10V, Id=3.5A	4	9		S	VDS=10V, Id=3.5A
RDS(ON)		80	105	mΩ	VGS=10V, Id=3.5A		150	200	mΩ	VGS=10V, Id=3.5A
		85	115	mΩ	VGS=4V, Id=3.5A		170	230	mΩ	VGS=4V, Id=3.5A
Ciss		1600		pF	VDS=10V,		870		pF	VDS=10V
Coss		380		pF	f=1.0MHz,		320		pF	f=1.0MHz
Crss		90		pF	VGS=0V		210		pF	VGS=0V
td(on)		35		ns	Id=3.5A,		25		ns	Id=3.5A
tr		70		ns	VDD÷70V,		55		ns	VDD÷70V
td(off)		125		ns	RL=20Ω,		80		ns	RL=20Ω
tf		90		ns	VGS=5V, see Fig.3 on page 16.		50		ns	VGS=5V, see Fig.3 on page 16.
VSD		1.0	1.5	V	ISD=7A, VGS=0V		1.0	1.5	V	ISD=7A, VGS=0V
trr		320		ns	IF=±100mA		500		ns	IF=±100mA

Characteristic curves

