

# XBP14E5UFN-G

ETR29021-001

## Low Capacitance TVS Diode Array

### FEATURES

<b>Terminal Capacitance</b>	: 0.8pF (Line-to-GND)
<b>ESD Protection</b>	: 8kV Contact (IEC61000-4-2)
<b>Environmentally Friendly</b>	: EU RoHS Compliant, Pb Free

### APPLICATIONS

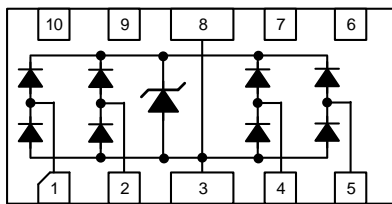
- USB 3.0
- DVI
- Set Top Box

### PRODUCT NAME

PRODUCT NAME	PACKAGE	ORDER UNIT
XBP14E5UFN-G *	DFN2510-10A	5,000pcs/Reel

\* The "-G" suffix denotes Halogen and Antimony free as well as being fully EU RoHS compliant.

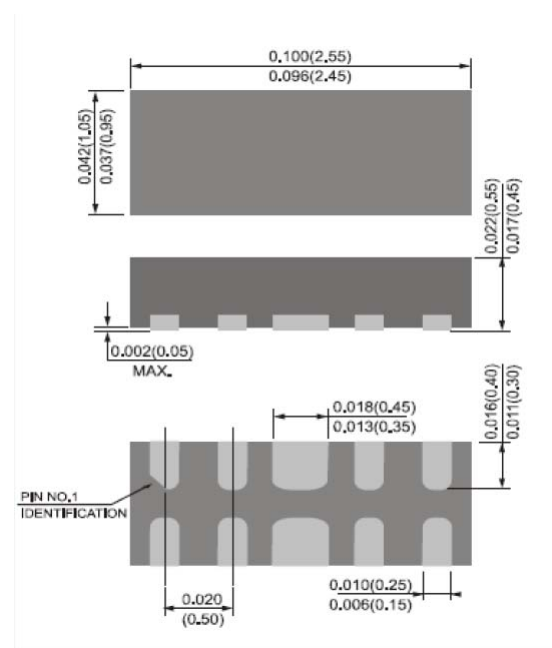
### PIN CONFIGURATION



1. I/O 1
2. I/O 2
3. GND
4. I/O 3
5. I/O 4
6. NC
7. NC
8. GND
9. NC
10. NC

### PACKAGING INFORMATION

- DFN2510-10A
- Unit : inch (mm)



### ABSOLUTE MAXIMUM RATINGS

Ta=25°C

PARAMETER	SYMBOL	RATINGS	UNIT
Junction Temperature	T <sub>j</sub>	125	°C
Storage Temperature	T <sub>stg</sub>	-55 to +150	°C
IEC61000-4-2 (ESD) Air	V <sub>ESD_A</sub>	±15	kV
IEC61000-4-2 (ESD) Contact	V <sub>ESD_C</sub>	±8	kV

## ELECTRICAL CHARACTERISTICS

Ta=25°C

PARAMETER	SYMBOL	TEST CONDITIONS	LIMITS			UNIT
			MIN.	TYP.	MAX.	
Stand-Off Voltage	$V_{RWM}$		-	-	5	V
Breakdown Voltage	$V_{BR}$	$I_R=1mA$ , I/O pin to Pin3	6	-	9	V
Leakage Current	$I_R$	$V_R=5V$ , I/O pin to Pin3	-	-	1	$\mu A$
Clamping Voltage (8/20 $\mu s$ )	$V_C$	$I_{PP}=2.5A$ , I/O pin to Pin3	-	11	13	V
Terminal Capacitance	$C_t$	$V_R=0V$ , f=1MHz Between I/O pin to Pin3	-	0.6	0.8	pF
	$C_t$	$V_R=0V$ , f=1MHz Between I/O pins	-	0.35	0.4	pF

## NOTES ON USE

1. Please use this IC within the absolute maximum ratings.

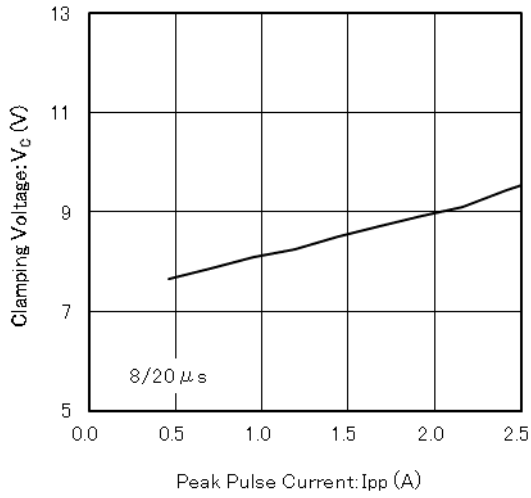
Even within the ratings, in case of high load use continuously such as high temperature, high voltage, high current and thermal stress may cause reliability degradation of the IC.

2. Torex places an importance on improving our products and their reliability.

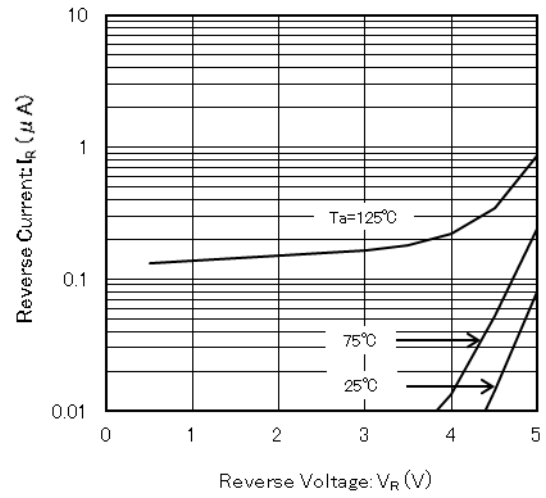
We request that users incorporate fail-safe designs and post-aging protection treatment when using Torex products in their systems.

## TYPICAL PERFORMANCE CHARACTERISTICS

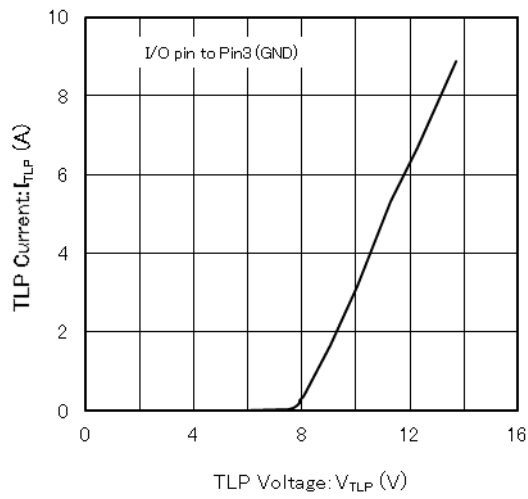
(1) Clamping Voltage vs. Peak Pulse Current



(2) Reverse Current vs. Reverse Voltage



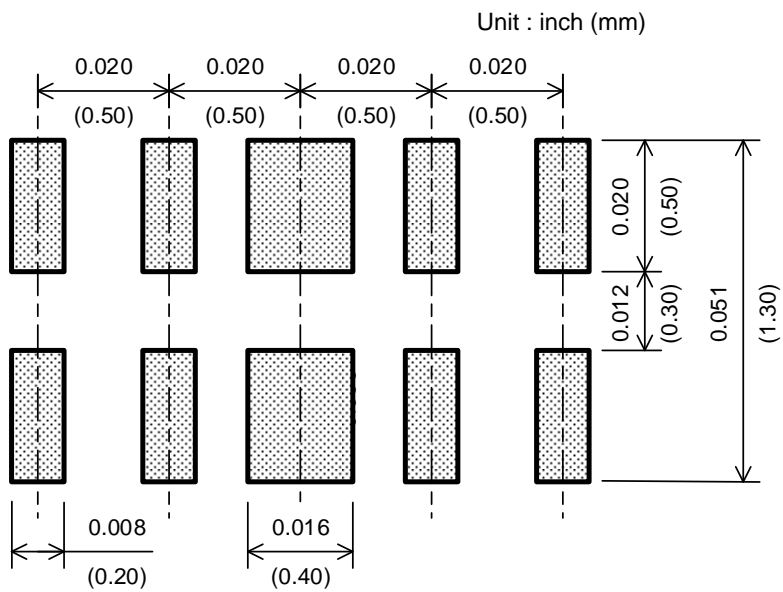
(3) Transmission Line Pulse (TLP) Measurement



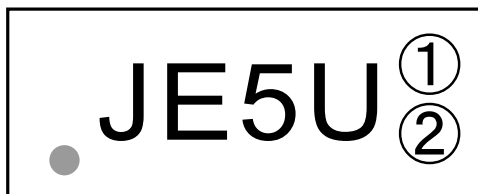
# XBP14E5UFN-G

## REFERENCE PATTERN LAYOUT

●DFN2510-10A



## MARKING

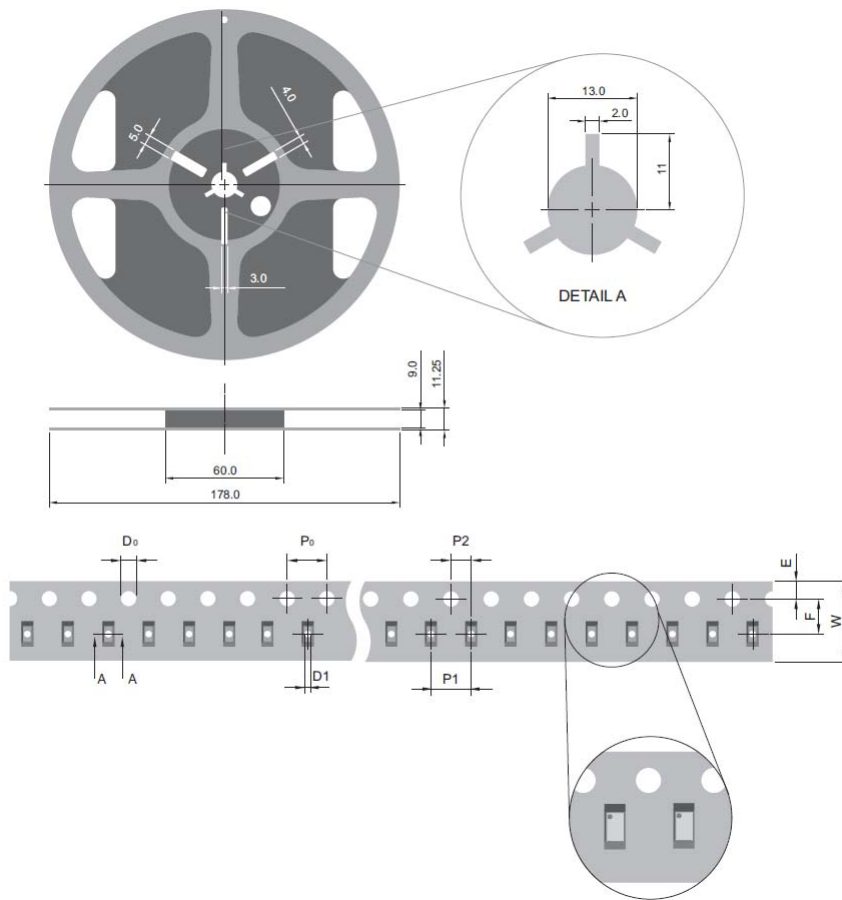


①② : Control Number

# TAPING SPECIFICATIONS

●DFN2510-10A

Unit : mm



SYMBOL	mm
D <sub>0</sub>	1.55 ± 0.05
D <sub>1</sub>	0.50 ± 0.05
E	1.75 ± 0.10
F	3.50 ± 0.05
P <sub>0</sub>	4.00 ± 0.10
P <sub>1</sub>	4.00 ± 0.10
P <sub>2</sub>	2.00 ± 0.05
W	8.00 + 0.30 - 0.15

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