



# Ultra-low transmission loss Highly heat resistant Multi-layer circuit board materials

## 超低伝送損失・高耐熱多層基板材料

# MEGTRON6

Laminate **R-5775(N)\* R-5775**

Prepreg **R-5670(N)\* R-5670**

\*Low Dk glass cloth type

### Applications 用途

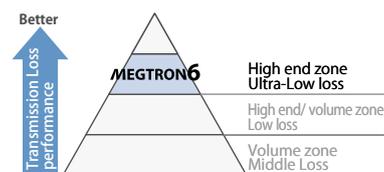
ICT infrastructure equipment, Supercomputer, Measuring instrument, Antenna(Base station, Automotive millimeter-wave radar), Etc.

ICT インフラ機器 (スーパーコンピュータ、計測用機器)、  
アンテナ (基地局、車載ミリ波レーダ)、高周波用途など



The industry standard for high speed, ultra-low loss material.  
Excellent HDI and thermal performance.

超高性能サーバやルータ向け材料のデファクトスタンダード。  
低伝送ロスを実現し、超高性能サーバやルータの性能向上に貢献

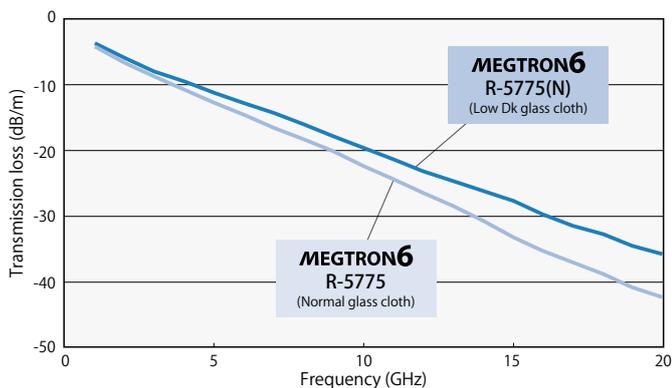


Dk 3.4 Df 0.004  
@12GHz

Tg (DSC)  
185°C

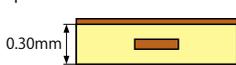
T288 (with copper)  
>120min

### Frequency dependence by Transmission loss 伝送損失比較



#### Construction

Stripline



Copper thickness	18 μm
Copper type	H-VLP
Core	0.15mm (#1078 x 2ply)
Prepreg	#1078 x 2ply
Impedance	50Ω

### Heat resistance of High Multi-layer 高多層耐熱性

#### Result

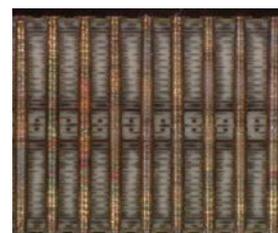
Drill diameter	φ0.3mm	
Wall to wall distance	0.5mm	0.6mm
<b>MEGTRON6</b> (Low Dk glass cloth)	pass	pass

#### Condition

260°C reflow x 10times

#### Construction

32 Layers  
Board thickness: 4.5mm



### General properties 一般特性

Item	Test method	Condition	Unit	<b>MEGTRON6</b> R-5775(N) Low Dk glass cloth	<b>MEGTRON6</b> R-5775 Normal glass cloth
Glass transition temp.(Tg)	DSC	A	°C	185	185
CTE z-axis	α1	IPC-TM-650 2.4.24	A	ppm/°C	45
					α2
T288(with copper)	IPC-TM-650 2.4.24.1	A	min	>120	>120
Dielectric constant(Dk)	12GHz	Balanced-type circular disk resonator	C-24/23/50	-	3.4
Dissipation factor(Df)					0.004
Peel strength*	1oz(35 μm)	IPC-TM-650 2.4.8	A	kN/m	0.8

The sample thickness is 0.75mm.

\* H-VLP Copper

The above data are typical values and not guaranteed values. 上記データは当社測定による代表値であり、保証値ではありません。

Please see the page for "Notes before you use" 商品のご採用に当たっての注意事項は [こちら](#)