

# Metallic Glass Iron/Boron/Silicon Coil (Fe78/B 13/Si 9 (Atomic %))

**Grade:** Metallic Glass

**Formula:** Fe78/B 13/Si 9 (Atomic %)

**Thickness:** 0.025mm

**Coil Width:** 50mm

**Length:** 0.5m

**UOM Code:** 165-068-17

**SKU:** 1000059518-group

**Product Code:** FE81-FL-000150

## Material Properties for Glasses

### Electrical Properties

Element	Value
Electrical resistivity( $\mu\text{Ohmcm}$ )	137

### Magnetic Properties

Element	Value
Coercivity - as cast( $\text{A m}^{-1}$ )	14
Remanence ratio( $\text{Br/B}_s$ )	0.76
Curie temperature( $^{\circ}\text{C}$ )	415
Saturation flux density( $\text{T}$ )	1.56
Saturation magnetostriction( $\times 10^{-6}$ )	27

### Thermal Properties

Element	Value
Crystallisation temperature( $^{\circ}\text{C}$ )	550
Maximum use temperature in air( $^{\circ}\text{C}$ )	150

### Physical Properties

Element	Value
Density( $\text{gcm}^{-3}$ )	7.18

## Mechanical Properties

<b>Element</b>	<b>Value</b>
Tensile modulus( GPa )	57
Hardness - Vickers( kgf mm <sup>2</sup> )	860
Tensile strength( MPa )	700