



# High-Purity FC-116

Hexafluoroethane



## Properties and Classification

Appearance: Colorless and odorless gas

UN Number: 2193

CAS Number: 76-16-4

Liquefied gas

\* Refer to MSDS for detailed information on the properties and safety of the product.

## Specification

Purity	vol%	Min. 99.999
O <sub>2</sub> + Ar	volppm	Max. 2
N <sub>2</sub>	volppm	Max. 10
CH <sub>4</sub>	volppm	Max. 0.7
CO	volppm	Max. 0.7
CO <sub>2</sub>	volppm	Max. 0.7
H <sub>2</sub> O	volppm	Max. 3.0
Acids as HF	volppm	Max. 0.1
CF <sub>4</sub>	volppm	Max. 2.0
Other fluorocarbons	volppm	Max. 5.0



### Cylinder

Item		10L cylinder	47L cylinder
Size	Inside diameter	140mm	232mm
	Height (to the neck portion)	850mm	1370mm
	Height (with a protective cap) *	1000mm	1520mm
	Valve nozzle height (center) *	875mm	1380mm
Loading weight		8kg	35kg, 40kg
Material		Manganese steel	

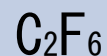
\* Estimated values for when a standard valve is mounted on a standard cylinder.  
The accuracy of these values is not guaranteed.

### Valve

Nozzle size	22 mm X 14 right-hand threads
Material	BRASS

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## Physical & Chemical Properties

Item	Unit	Data
Chemical formula		$C_2F_6$
Molecular weight		138.01
Boiling point	°C	-78.15
	°F	-108.8
Melting point	°C	-101
Specific gravity (air: 1)		4.823
Liquid density (0° C, saturated liquid)	kg/L	1.109
Gas density	g/L	—
Critical temperature	°C	19.65
Critical pressure	MPa	3.2
	kg/cm <sup>2</sup>	32.6
Flammability		Not applicable
Toxicity		Not applicable
Latent heat of vaporization (0° C, 1013 MPa)	kJ/kg	117.0
Maximum permissible concentration (ACGIH)	ppm	—
Explosive limit (in air)		—

## Temperature — Vapor Pressure Curve

