



## R448A

**NAME:** R448A

**TYPE:** MIXTURE OF HFC32 - HFC125 - HFC134a - HFO 1234ze - HFO 1234yf  
(26/26/21/7/20%)

**CHEMICAL FORMULA:** CH<sub>2</sub>F<sub>2</sub> - C<sub>2</sub>H<sub>5</sub>F - C<sub>2</sub>H<sub>2</sub>F<sub>4</sub> - C<sub>3</sub>H<sub>2</sub>F<sub>4</sub> - C<sub>3</sub>H<sub>2</sub>F<sub>4</sub>

**TYPICAL USE:** REFRIGERANT GAS

### TYPICAL PROPERTIES: (in according to AHRI 700-2017)

HFC-32	26	(24,0÷26,5)*	% wt
HFC-125	26	(25,5÷28,0)*	% wt
HFC-134a	21	(49,5÷51,5)*	% wt
HFO-1234ze	7	(49,5÷51,5)*	% wt
HFC-1234yf	20	(18,0÷20,5)*	% wt
PURITY	> 99,5		% wt
MOISTURE	< 10		ppm
ACIDITY (as HCL)	< 1		ppm
CHLORIDES	< 3		ppm
EVAPORATION RESIDUE	< 100		ppm
UNCONDENSABLE GASES	< 1,5		% Vol

### CHEMICAL - PHYSICAL PROPERTIES:

Color	Colorless	
Molecular Weight	86,3	g/mol
Boiling Point 101,3 kPa	-45,9	°C
Critical temperature	83,7	°C
Critical Pressure	46,6	bar
Liquid density at 0° C	1192,5	Kg/m <sup>3</sup>
Liquid density at 25° C	1092,3	Kg/m <sup>3</sup>
Vapour density at 25° C	48,5	kJ/kg °K
Liquid heat capacity at 25° C	1,553	kJ/kg °K
Vapour heat capacity at 25° C	1,165	kJ/kg °K
Vapor Pressure at 25° C	1107,1	kPa
Liquid thermal conductivity at 25° C	80,6	W/m °K
Vapour thermal conductivity at 25° C	16,6	W/m °K
Flammability	none	

\*Limit of specific

GWP	1387
ODP	0
ADR/RID	2.2
UN NUMBER	3163
ASHRAE	A1

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