



Solstice[™] ze

R-1234ze - (Trans-1,3,3,3-tetrafluoroprop-1-ène)

GUARANTEED COMMERCIAL SPECIFICATIONS

STANDARD SPECIFICATION*	LIMIT VALUE
Purity	≥ 99.5 % weight
Water content	≤ 10 ppm weight
Chlorine ion test (silver nitrate test)	Negative
Total Acidity (HCL)	≤ 1 ppm weight
Non-condensable content (gas phase)	≤ 1.5 % volume

* (data producer)

MAIN APPLICATIONS

SolsticeTM **ze** is a fluorinated gas from the HFO family. This product has a very low GWP figure and is suitable for air conditioning applications. It can be used for chillers and heat pumps.

OILS

Use a polyol ester (POE) oil.

Consult **Climalife** regarding the viscosity of the oil selected for your application and the most suitable for your application.

PRECAUTIONS OF USE

Refer to the Safety Data Sheet*.

REGULATION

The use and implementation of **Solstice**[™] **ze** are governed by EU Regulation n° 517/2014. The recovery of **Solstice**[™] **ze** is mandatory under EU Regulation n° 517/2014. (Refer to regulations enforced in each country)

* Find the Safety Data Sheet (SDS) directly on our website www.climalife.dehon.com





SOLSTICE[™] ZE PHYSICOCHEMICAL PROPERTIES

Molar mass	g/mol	114.04
Melting point	°C	N/A
Boiling point (at 1.013 bar)	°C	-18.98
Saturated fluid density at 25°C	kg/m ³	1163
Vapour density at boiling point	kg/m ³	5.705
Vapour pressure at:		
25°C	bar	4.99
50°C	bar	9.97
Critical temperature	°C	109.36
Critical pressure	bar	36.35
Critical density	kg/m3	489.24
Latent heat of vaporisation at boiling point	kJ/kg	195.62
Thermal conductivity of liquid at 25°C	W/m.K	0.0744
Thermal conductivity of vapour at 1.013 bar	W/m.K	0.014
Surface tension at 25°C	10 ⁻³ N/m	8.85
Solubility at 25°C of water in the fluid	% weight	
Viscosity of liquid at 25°C	10 ⁻³ Pa.s	0.199
Viscosity of vapour at 1.013 bar	10 ⁻³ Pa.s	0.0123
Specific heat of liquid at 25°C	kJ/(kg.K)	1.386
Specific heat of vapour at 1.013 bar	kJ/(kg.K)	0.889
Cp/Cv ratio at 25°C under 1.013 bar		1.101
Flammability in air		Mildly flammable
Flashing point		None
Classification NF-EN 378		Ongoing – A2
ASHRAE		A2L
PED		PED Category 2
Ozone Depletion Potential		0
GWP		
4 th Assessment		7
5 th Assessment		1

Please contact your distributor or **Climalife** sales department for more information. In addition, if the refrigeration system you want to install, or are working on, does not appear to be a typical installation, please do not hesitate to contact us for advice and information.

Solstice[™] is trademark of Honeywell International Inc.

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For more information, please visit our website:

http://www.climalife.dehon.com/contact_us