



Methane

Description

Formula: CH₄

Gas Data

Molecular Weight: 16.04
 Density: 0.676 kg/m³ @ 21.1°C, 101.325 kPa
 0.0422 lb/ft³ @ 70°F, 14.696 psia
 Specific Volume: 1.48 m³/kg @ 21.1°C, 101.325 kPa
 23.7 ft³/lb @ 70°F, 14.696 psia

Safety Information

LFL in Air: 5%
 UFL in Air: 15%

Shipping Information

CAS Registry Number: 74-82-8
 UN Number: UN 1971
 ECCN Number: 1C983
 DOT Proper Shipping Name: Methane, Compressed
 DOT Classification: 2.1 (Flammable Gas)
 DOT Label: FLAMMABLE GAS
 TC Shipping Name: Methane, Compressed
 TC Classification: 2.1
 TC Label: FLAMMABLE GAS

Cylinder Specifications

Cylinder Size	Valve Outlet CGA No.	Pressure* psig @ 70°F	Pressure kPa @ 21.1°C	Approximate Ship Weight	
				lb	kg
1L	350	2,265	15,616	162	73
1A	350	2,265	15,616	144	65
2	350	2,000	13,790	78	35
3	350	2,000	13,790	41	19
7	350	1,585	10,928	20	9
LB	170	1,775	12,238	6	3

*Real gas pressure

Gas Grade Purity Specifications	Product Code	Cylinder Size	Content US	Content Metric	Equipment Recommendations	Model No.	Page No.
Methane, Research Purity 99.9995%	G2271112	1L	325 ft ³	9.20 m ³	Dual Stage Reg.	Series 3810-350	318
<i>Guaranteed Specifications</i>	G2271101	1A	286 ft ³	8.10 m ³	Single Stage Reg.	Series 3610A-350	316
Ethane < 3 ppm	G2271140	2	100 ft ³	2.83 m ³	LB Regulator	Series 3570-170	314
Other HC < 1 ppm	G2271150	3	40 ft ³	1.13 m ³	Cross Purge	4774-350	422
Nitrogen < 1 ppm	G2271181	7	2.12 ft ³	60 L	Flash Arrestor	6104A	434
Oxygen < 1 ppm					Personal Monitor	IQ250	398
Water < 1 ppm					Leak Detector	8066	406
<i>A Certificate of Analysis is available on request at a nominal charge.</i>							
Methane, Matheson Purity 99.995%	G1861112	1L	325 ft ³	9.20 m ³	Dual Stage Reg.	Series 3120-350	299
<i>Guaranteed Specifications</i>	G1861101	1A	286 ft ³	8.10 m ³	Single Stage Reg.	Series 3530-350	313
Ethane < 30 ppm	G1861140	2	100 ft ³	2.83 m ³	LB Regulator	Series 3550-170	314
Other HC < 5 ppm	G1861150	3	40 ft ³	1.13 m ³	Tee Purge	4753-350	423
Nitrogen < 20 ppm					Flash Arrestor	6103A-F	434
Oxygen < 5 ppm					Personal Monitor	IQ250	398
Water < 5 ppm					Leak Detector	8066	406
<i>A Certificate of Analysis is available on request at a nominal charge.</i>							
Methane, Ultra High Purity 99.97%	G1949112	1L	325 ft ³	9.20 m ³	Dual Stage Reg.	Series 3120-350	299
<i>Guaranteed Specifications</i>	G1949101	1A	286 ft ³	8.10 m ³	Single Stage Reg.	Series 3530-350	313
Other HC < 250 ppm	G1949140	2	100 ft ³	2.83 m ³	LB Regulator	Series 3550-170	314
Nitrogen < 100 ppm	G1949150	3	40 ft ³	1.13 m ³	Tee Purge	4753-350	423
Oxygen < 10 ppm	G1949175	LB	2 ft ³	56 L	Flash Arrestor	6103A-F	434
Water < 5 ppm					Personal Monitor	IQ250	398
					Leak Detector	8066	406
<i>A lot analysis is available on request. Please inquire for individual cylinder analysis.</i>							



Methane (continued)

Gas Grade Purity Specifications	Product Code	Cylinder Size	Content US	Content Metric	Equipment Recommendations	Model No.	Page No.
Methane, CP Grade 99.0%	G1373312	1L	325 ft ³	9.20 m ³	Dual Stage Reg.	Series 1250-350	296
	G1373301	1A	286 ft ³	8.10 m ³	Single Stage Reg.	Series 3530-350	313
	G1373340	2	100 ft ³	2.83 m ³	LB Regulator	Series 3550-170	314
	G1373350	3	40 ft ³	1.13 m ³	Tee Purge	4753-350	423
	G1373375	LB	2 ft ³	56 L	Flash Arrestor	6103A-F	434
					Personal Monitor	IQ250	398
					Leak Detector	8066	406
<i>A Certificate of Conformance will be provided on request.</i>							
Methane, Technical Purity 98%	G1373112	1L	325 ft ³	9.20 m ³	Dual Stage Reg.	Series 81-350	293
	G1373101	1A	286 ft ³	8.10 m ³	Single Stage Reg.	Series 18-350	292
	G1373140	2	100 ft ³	2.83 m ³	LB Regulator	Series 3320-170	302
	G1373150	3	40 ft ³	1.13 m ³	Tee Purge	4753-350	423
	G1373175	LB	2 ft ³	56 L	Flash Arrestor	6103A-F	434
					Personal Monitor	IQ250	398
					Leak Detector	8066	406
<i>A Certificate of Conformance will be provided on request.</i>							