

GAS PRODUCTS FOR SPECIAL APPLICATIONS

VEHICLE EMISSION MONITORING

Hong Kong Specialty Gases offers a wide range of Vehicle Emission Standards produced and certified in accordance with the procedures and specifications published in EPA Technical report EPA-AA-TSS-83-88. Blend tolerance and analytical accuracy of these blends are normally at $\pm 2\%$ for both and are traceable to NIST standard reference material.

VEHICLE EMISSION STANDARDS				
COMPONENTS	CYLINDER SIZE	CONTENT	PRESSURE PSIG	CGA CONN.
3000 ppm Propane 8.0% Carbon Monoxide 11.0% Carbon Dioxide Balance Nitrogen	A030 A007	3.2 m ³ 0.74 m ³	1650 1650	350 350
600 ppm Propane 1.6% Carbon Monoxide 11.0% Carbon Dioxide Balance Nitrogen	A030 A007	3.2 m ³ 0.74 m ³	1650 1650	350 350
1600 ppm Propane 8.0% Carbon Monoxide 13.0% Carbon Dioxide Balance Nitrogen	A030 A007	3.2 m ³ 0.74 m ³	1650 1650	350 350
300 ppm Propane 1.0% Carbon Monoxide 6.0% Carbon Dioxide Balance Nitrogen	A030 A007	3.2 m ³ 0.74 m ³	1650 1650	350 350
1200 ppm Propane 4.0% Carbon Monoxide 12.0% Carbon Dioxide Balance Nitrogen	A030 A007	3.2 m ³ 0.74 m ³	1650 1650	350 350
90/1000/3000 ppm Nitric Oxide Balance Nitrogen	A030 A007	4.0 m ³ 0.79 m ³	2000 2000	660 660
450 ppm Carbon Monoxide Balance Nitrogen	A030 A007	4.0 m ³ 0.79 m ³	2000 2000	350 350
125 ppm Propane Balance Air	A030 A007	4.0 m ³ 0.79 m ³	2000 2000	350 350
40% Hydrogen Balance Helium	049 044	5.2 m ³ 4.7 m ³	1650 1650	350 350

ZERO GASES FOR AMBIENT & VEHICLE EMISSION MONITORING				
SPECIFICATION	CYLINDER SIZE	CONTENT	PRESSURE PSIG	CGA CONN.
Ultra-Zero Ambient Monitoring Zero Air THC < 0.05 ppm NOx < 0.005 ppm CO < 0.05 ppm SO ₂ < 0.005 ppm H ₂ O < 5 ppm SF ₆ < 0.001 ppm CO ₂ = 315-385 ppm O ₂ = 20 to 21%	A030 A016 A007	4.0 m ³ 2.1 m ³ 0.79 m ³	2000 2000 2000	590 590 590
Ultra-Zero Ambient Monitoring Zero Nitrogen THC < 0.05 ppm NOx < 0.005 ppm CO < 0.05 ppm SO ₂ < 0.005 ppm H ₂ O < 4 ppm SF ₆ < 0.001 ppm CO ₂ < 1 ppm O ₂ < 2 ppm	A030 A016 A007	4.0 m ³ 2.1 m ³ 0.79 m ³	2000 2000 2000	580 580 580
Vehicle Emission Calibration Zero Air THC < 0.1 ppm NOx < 0.1 ppm CO < 0.5 ppm O ₂ = 18-21% CO ₂ < 1.0 ppm H ₂ O < 1.0 ppm	049 044 016	6.8 m ³ 6.0 m ³ 2.2 m ³	2100 2000 2000	590 590 590
Vehicle Emission Calibration Zero Nitrogen Purity > 99.997% NOx < 0.1 ppm THC < 0.1 ppm O ₂ < 0.5 ppm CO < 0.5 ppm H ₂ O < 1.0 ppm CO ₂ < 1.0 ppm	049 044 016	6.8 m ³ 6.0 m ³ 2.2 m ³	2100 2000 2000	580 580 580