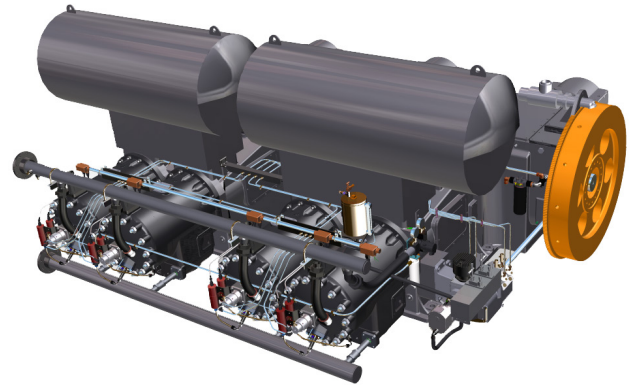




Ajax* Integral Engine-Compressor DPC-2804

800-845 bhp
440 rpm

Robust reliable Ajax engines have been manufactured in the United States longer than any other engine manufacturer, with continuous innovations and technologies adding compliance, strength and simplicity to the original design. The DPC-2804 integral engine compressor ranges from 800-845 bhp and features a slow-speed, two-cycle engine design that results in less wear and fewer moving parts. It offers greater reliability and efficiency than high speed separable units. As a result, operating costs are substantially lower over the life of your equipment. Over 330 DPC-2804s have been built. The DPC-2804 is the economic choice for a variety of applications, including gas gathering, injection, processing, transmission, and fuel gas boosting.



Benefits

- Minimum maintenance
- Higher availability
- Higher resale value
- Reduced parts stocking requirements
- Single source responsibility available
- More gas compressed per BHP than high speed separable units
- Higher mechanical efficiency
- Flexible

Features

- Integral crankshaft design
- Slow operating speed
- Fewer moving parts
- Technically current design
- Low-cycle, low BMEP engine
- Larger valve area

Engine Specifications

Model	STD	LE	ULE
No. of Cylinders	4	4	4
Power	845 bhp (630 kWb)	800 bhp (597 kWb)	800 bhp (597 kWb)
Rated Speed	440 rpm	440 rpm	440 rpm
Bore & Stroke	15" x 16" (381 mm x 406 mm)	15" x 16" (381 mm x 406 mm)	15" x 16" (381 mm x 406 mm)
Piston Displacement	11,308 in ³ (185 l)	11,308 in ³ (185 l)	11,308 in ³ (185 l)
BMEP	67.2 psi (4.6 bar)	63.7 psi (4.4 bar)	63.7 psi (4.4 bar)
Piston Speed	1,173 ft/min (6 m/s)	1,173 ft/min (6 m/s)	1,173 ft/min (6 m/s)

Engine Specifications

Model	STD	LE	ULE
Fuel Gas System¹			
Fuel pressure range	150 psi (10.3 bar)	150 psi (10.3 bar)	150 psi (10.3 bar)
Exhaust System²			
Exhaust Temperature	465°F (241°C)	515°F (268°C)	515°F (268°C)
Exhaust Flow	233 lb/min (106 kg/min)	239 lb/min (108 kg/min)	239 lb/min (108 kg/min)
Cooling Water System			
Capacity	120 gal (454 l)	120 gal (454 l)	120 gal (454 l)
Lube Oil System³			
Capacity	95 gal (360 l)	95 gal (360 l)	95 gal (360 l)
Consumption	28.2 pints/day (13.3 l/day)	28.2 pints/day (13.3 l/day)	28.2 pints/day (13.3 l/day)
Crankcase Makeup	6.6 pints/day (3.1 l/day)	6 pints/day (2.8 l/day)	6 pints/day (2.8 l/day)
Brake Specific Fuel Consumption			
100% Load (LHV)	8,000 Btu/bhp-hr (11,319 kJ/kWh)	7,800 Btu/bhp-hr (11,036 kJ/kWh)	7,600 Btu/bhp-hr (10,753 kJ/kWh)
Engine Emissions²			
NOx	12 g/bhp-hr	2 g/bhp-hr	0.5 g/bhp-hr
CO	1.2 g/bhp-hr	1.2 g/bhp-hr	1.2 g/bhp-hr
NMHC	0.7 g/bhp-hr	0.6 g/bhp-hr	0.6 g/bhp-hr
VOC	0.5 g/bhp-hr	0.5 g/bhp-hr	0.5 g/bhp-hr
Formaldehyde	0.3 g/bhp-hr	0.3 g/bhp-hr	0.3 g/bhp-hr
CO ₂	469 g/bhp-hr	458 g/bhp-hr	458 g/bhp-hr
Compressor Specifications			
No. of Throws	3	3	3
Stroke	11" (279 mm)	11" (279 mm)	11" (279 mm)
Piston Speed	807 ft/min (4 m/s)	807 ft/min (4 m/s)	807 ft/min (4 m/s)
Rod Load	40,000 lb (178 kN)	40,000 lb (178 kN)	40,000 lb (178 kN)
Rod Diameter	2.5" (64 mm)	2.5" (64 mm)	2.5" (64 mm)
Crankshaft Centerline	20" (508 mm)	20" (508 mm)	20" (508 mm)
Dry Weight			
Frame Weight	48,700 lb (22,090 kg)	48,700 lb (22,090 kg)	48,700 lb (22,090 kg)
Dimensions			
Frame Length	171" (4,353 mm)	171" (4,353 mm)	171" (4,353 mm)
Frame Width	157" (3,987 mm)	157" (3,987 mm)	157" (3,987 mm)
Frame Height	74" (1,881 mm)	74" (1,881 mm)	74" (1,881 mm)
Stack Diameter	17¼" (438 mm)	17¼" (438 mm)	17¼" (438 mm)
Stack Height	241" (6,121 mm)	241" (6,121 mm)	241" (6,121 mm)
Flywheel			
Outside Diameter	48" (1,219 mm)	48" (1,219 mm)	48" (1,219 mm)
Weight	2,200 lb (998 kg)	2,200 lb (998 kg)	2,200 lb (998 kg)

¹ Fuel Gas System pressure noted is maximum pressure at customer connection

² Exhaust and Emissions noted based on: PLQNG, 1500 FASL Elevation, 65°F ambient temperature for STD & LE, 100°F ambient temperature for ULE

³ Lube Oil System consumption rates based on full load and full speed operation. Values do not indicate break-in consumption rates.