

OPTIMIZED TRANSPORT OF NATURAL GAS

As the cleanest burning fossil fuel, natural gas is abundant and inexpensive. It can be safely transported via transmission pipelines, and its minimal emissions profile ensures that it will continue to be an essential part of the energy mix in the global transition from fossil fuels to low-carbon, renewable energy.

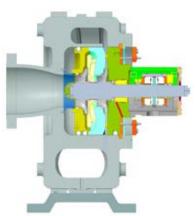
■ ELLIOTT'S 140TCH PIPELINE COMPRESSOR

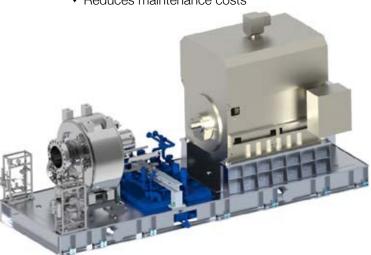
Compressors play an integral role in maintaining pressure and flow as natural gas travels through the pipelines from production, processing, and storage sites to end users. Elliott's pipeline compressor is a gearless, low-emissions motor-driven unit specifically designed with Elliott's proven expertise to power long-distance gas transmission.

The 140TCH pipeline compressor comes with a direct connect, variable speed (VFD) motor and a standard footprint, with custom aerodynamics for optimum efficiency, and extended operating time between scheduled overhauls.



- Optimizes system pressure and flow
- Meets strict emissions standards and regulations
- Delivers high efficiencies
- Offers standard footprint with custom aerodynamics
- Adjusts operation to match load requirements
- Designed for long-life continuous operation
- Reduces maintenance costs





■ Superior Performance in Stringent Regulatory Environments

Elliott's pipeline compressor package incorporates a 140TCH centrifugal compressor with a direct-coupled high-speed induction motor powered by a VFD and connected via standard flexible coupling. A standard gear-driven solution is also available.

Centrifugal compressors provide greater availability and reliability than reciprocating compressors, and operate longer between scheduled maintenance activities. Easy access to compressor internals contributes to lower maintenance costs.

The gearless configuration provides several advantages including a smaller footprint, reduced lube oil requirements, and higher net efficiency. The high-speed VFD-powered motor significantly reduces CO2 and NOx emissions as compared to a gas turbine driver. The VFD addresses starting issues and allows adjustable operation to match load/capacity requirements.

The pipeline compressor's single-lift plug & play design includes auxiliaries — lube oil, buffer gas panel, and integrated, customized controls. Piping and wiring are included on the skid for easy and quick installation with less site work.

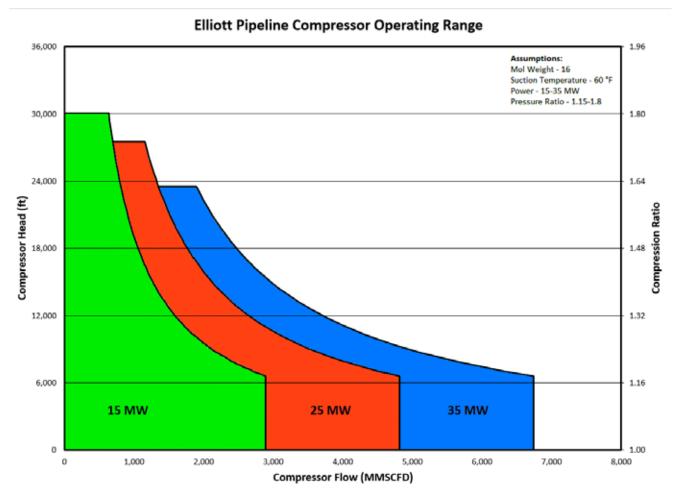
Features

- High-efficiency axial inlet
 - Flange-to-flange efficiency > 85%
- Single or dual impellers (application dependent)
- High-speed induction motor with VFD
 - Coupled directly to the compressor for increased net efficiency and reduced emissions
- Standard gear-driven solution also available
- Single-lift skid including auxiliaries
 - Plug & play design
 - Integrated customized controls
 - Air or water cooled
- Easy access to compressor internals for maintenance
 - Remove inner bundle from drive side
 - No transmission piping removal required

Technical Specifications

Elliott's pioneer pipeline compressor is available to cover the power range from 10 to 35 MW. The aerodynamic flow path is customized to meet application specific requirements.

Powers and Speeds (rpm)		Footprint (ft)	Weight (lb)	MMSCFD Max	Pressure Ratio	Pressure Max (psi)	Temperature
15 MW	7500	35 x 13.5 x 20	205,000	2900	1.15 – 1.8	1600	Site Specific
25 MW	6250	36 x 13.5 x 20	248,000	4800	1.15 - 1.7	1600	Site Specific
35 MW	5750	38 x 13.5 x 20	275,000	6700	1.15 - 1.6	1600	Site Specific



Operating Range

Compressors are an essential part of the natural gas pipeline network. Elliott's 140TCH pipeline compressor offers Elliott's proven experience and expertise in rotating equipment, and our unwavering commitment to provide innovative solutions that optimize equipment performance, increase safety, lower maintenance costs, and contribute to global sustainability.



Elliott Group is a global leader in the design, manufacture, and service of technically advanced centrifugal compressors, steam turbines, power recovery expanders, cryogenic pumps and expanders, and axial compressors used in the petrochemical, refining, oil & gas, liquefied gas, and process industries, as well as in power applications.

Elliott Group is a wholly owned subsidiary of Ebara Corporation, a major industrial conglomerate headquartered in Tokyo, Japan.



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