

Summary of study: Air compressor in a textile industry: Unit - 7

Industry : Textiles

Unit profile : A textile industry located in Thane (Maharashtra) engaged in manufacturing of viscose filament yarn and high tenacity rayon tyre yarn.

Technology :

- Inverter type screw compressor

Application : Energy savings in compressed air system

Year of investigation : 2014

Key features:

- Adopting a inverter type screw compressor (37 kW) in place of screw compressor (30 kW)
- Adopting a inverter type screw compressor (75 kW) in place of reciprocating compressors (37.5 kW X 2)

Energy and cost saving:

Details	Existing	Recommended
Compressed air system	A. Screw: (30 kW X 1 unit) B. Reciprocating (37.5 X 2)	A. Inverter (37 kW X 1 unit) B. Inverter (75 kW X 1 unit)
Power savings (%)		A. 20% B. 17%

Note:

This report is an example for investigating the potential of application of Japanese low carbon technology (LCT) in Indian industries. Adoption of energy efficient technologies and practices can generate greater benefits in compressed air applications in industries.