

COMPRESSOR DATA SHEET
Rotary Compressor: Variable Frequency Drive
MODEL DATA - FOR COMPRESSED AIR

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|----|--|--------------------------------|---|
| 1 | Manufacturer: Mattei Compressors Inc. | | |
| 2 | Model Number: OPTIMA 18 | | Date: Apr-15 |
| | <input checked="" type="checkbox"/> Air-cooled <input type="checkbox"/> Water-cooled | Type: Vane | |
| | <input checked="" type="checkbox"/> Oil-injected <input type="checkbox"/> Oil-free | # of Stages: | 1 |
| 3 | Rated Operating Pressure | 145 | psig ^b |
| 4 | Drive Motor Nominal Rating | 25 | hp |
| 5 | Drive Motor Nominal Efficiency | 91.2 | percent |
| 6 | Fan Motor Nominal Rating (if applicable) | n/a | hp |
| 7 | Fan Motor Nominal Efficiency | n/a | percent |
| 8* | Input Power (kW) | Capacity (acfm) ^{a,d} | Specific Power (kW/100 acfm) ^d |
| | 22.41 Max | 93.4 | 24.00 |
| | 20.83 | 87.8 | 23.73 |
| | 19.23 | 82.2 | 23.39 |
| | 17.66 | 76.6 | 23.06 |
| | 16.89 | 73.8 | 22.89 |
| | 16.12 Min | 71.0 | 22.71 |
| 9* | Total Package Input Power at Zero Flow ^{c, d} | | 2.80 kW |
| 10 | <p style="text-align: center;"> Note: Graph is only a visual representation of the data in Section 8 Note: Y-Axis Scale, 10 to 35, + 5kW/100acfm increments if necessary above 35 X-Axis Scale, 0 to 25% over maximum capacity </p> | | |

*For models that are tested in the CAGI Performance Verification Program, these items are verified by program administrator

Consult CAGI website for a list of participants in the third party verification program: www.cagi.org

NOTES:

- a. Measured at the discharge terminal point of the compressor package in accordance with ISO 1217, Annex E; acfm is actual cubic feet per minute at inlet conditions.
- b. The operating pressure at which the Capacity and Electrical Consumption were measured for this data sheet.
- c. No Load Power. In accordance with ISO 1217, Annex E, if measurement of no load power equals less than 1%, manufacturer may state "not significant" or "0" on the test report.
- d. Tolerance is specified in ISO 1217, Annex E, as shown in table below:

NOTE: The terms "power" and "energy" are synonymous for purposes of this document.



| Volume Flow Rate at specified conditions | | Volume Flow Rate | Specific Energy Consumption | No Load / Zero Flow Power |
|---|-----------------------|------------------|--------------------------------|------------------------------|
| m ³ / min | ft ³ / min | % | % | |
| Below 0.5 | Below 15 | +/- 7 | +/- 8 | +/- 10% |
| 0.5 to 1.5 | 15 to 50 | +/- 6 | +/- 7 | |
| 1.5 to 15 | 50 to 500 | +/- 5 | +/- 6 | |
| Above 15 | Above 500 | +/- 4 | +/- 5 | |

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