

### COMPRESSOR DEFINITION

|                           |                        |
|---------------------------|------------------------|
| Designation               | <b>VEM C9C</b>         |
| Nominal Voltage/Frequency | <b>230 V 40-150 Hz</b> |
| Engineering Number        | <b>513906058</b>       |

### A - APPLICATION / LIMIT WORKING CONDITIONS

|                                    |                                   |                                   |             |
|------------------------------------|-----------------------------------|-----------------------------------|-------------|
| 1 Type                             | Hermetic reciprocating compressor |                                   |             |
| 2 Refrigerant                      | R-600a                            |                                   |             |
| 3 Nominal voltage and frequency    | 230 / 40-150                      | [ V / Hz ]                        |             |
| 4 Application type                 | Low Back Pressure                 |                                   |             |
| 4.1 Evaporating temperature range  | -35°C to -10°C                    | (-31°F to 14°F)                   |             |
| 5 Motor type                       | BPM                               |                                   |             |
| 6 Starting torque                  | LST - Low Starting Torque         |                                   |             |
| 7 Expansion device                 | Capillary tube                    |                                   |             |
| 8 Compressor cooling               |                                   | Operating voltage range           |             |
|                                    |                                   | 50 Hz                             | 60 Hz       |
| 8.1 LBP (32°C Ambient temperature) | Static                            | 80 to 140 V                       | 80 to 140 V |
| 8.2 LBP (43°C Ambient temperature) | Static                            | 80 to 140 V                       | 80 to 140 V |
| 8.3 HBP (32°C Ambient temperature) | -                                 | -                                 | -           |
| 8.4 HBP (43°C Ambient temperature) | -                                 | -                                 | -           |
| 9 Maximum condensing temperature   |                                   |                                   |             |
| 9.1 Operating                      | 6.9                               | [kgf/cm <sup>2</sup> ] (98 psig)  | / °C - °F   |
| 9.2 Peak                           | 7.8                               | [kgf/cm <sup>2</sup> ] (111 psig) | / °C - °F   |
| 10 Maximum winding temperature     | 130                               | [ °C ]                            |             |

### B - MECHANICAL DATA

|                               |                |                                  |
|-------------------------------|----------------|----------------------------------|
| 1 Commercial designation      | 1/5            | [hp]                             |
| 2 Displacement                | 9.04           | [cm <sup>3</sup> ] (0.552 cu.in) |
| 2.1 Bore [mm]                 | 24.000         |                                  |
| 2.2 Stroke [mm]               | 20.000         |                                  |
| 3 Lubricant charge            | 210            | [ml] (7.10 fl.oz.)               |
| 3.1 Lubricants approved       |                |                                  |
| 3.2 Lubricants type/viscosity | ALQUILB / ISO5 |                                  |
| 4 Weight (with oil charge)    | 7              | [kg] (15.43 lb.)                 |
| 5 Nitrogen charge             | -              | [kgf/cm <sup>2</sup> ]           |

### C - ELETRICAL DATA

|  |                                   |                                    |
|--|-----------------------------------|------------------------------------|
| 1 Nominal Voltage/Frequency/Number of Phases | 230 V 40-150 Hz 3 ~ (Three phase) |                                    |
| 2 Starting device type                       | Inverter                          |                                    |
| 2.1 Starting device                          | CF02D01 M 0.0 X/VCC32456XXXX      |                                    |
| 3 Start capacitor                            | -                                 | [μF(VAC minimum)]                  |
| 4 Run capacitor                              | -                                 | [μF(VAC minimum)]                  |
| 5 Motor protection                           | VCC3 115624N01 SH3.2              |                                    |
| 6 Start winding resistance                   | 8.10                              | [Ω at 25°C (77°F)] +/- 8%          |
| 7 Run winding resistance                     | 8.10                              | [Ω at 25°C (77°F)] +/- 8%          |
| 8 LRA - Locked rotor amperage (40/150 Hz)    | 2.10                              | [A] - Measured according to UL 984 |
| 9 FLA - Full load amperage L/MBP (40/150 Hz) | 2.10                              | [A] - Measured according to UL 984 |
| 10 FLA - Full Load Amperage HBP (40/150 Hz)  | -                                 | [A] - Measured according to UL 984 |
| 11 Approval boards certification             | CCC - UL - VDE                    |                                    |

### D - PERFORMANCE - CHECK POINT DATA

|   |          |     |                                    |                               |   |                           |   |       |
|---|----------|-----|------------------------------------|-------------------------------|---|---------------------------|---|-------|
| TEST CONDITIONS:<br><b>@220V1200RPM</b> |          |     | <b>CECOMAFLBP</b><br><b>Static</b> |                               | Evaporating temperature<br>(Condensing temperature) |                           | <b>-25°C (-13°F)</b><br><b>55°C (131°F)</b> |       |
| Cooling capacity<br>+/- 5%              |          |     | Power consumption<br>+/- 5%        | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5%                             | EFFICIENCY RATE<br>+/- 7% |   |       |
| [Btu/h]                                 | [kcal/h] | [W] | [W]                                | [A]                           | [kg/h]  | [Btu/Wh]                  | [kcal/Wh]                                   | [W/W] |
| 160                                     | 40       | 47  | 33                                 | 0.57                          | 0.61  | 4.89                      | 1.23  | 1.43  |

|   |          |     |                                    |                               |   |                           |   |       |
|---|----------|-----|------------------------------------|-------------------------------|---|---------------------------|---|-------|
| TEST CONDITIONS:<br><b>@220V1600RPM</b> |          |     | <b>CECOMAFLBP</b><br><b>Static</b> |                               | Evaporating temperature<br>(Condensing temperature) |                           | <b>-25°C (-13°F)</b><br><b>55°C (131°F)</b> |       |
| Cooling capacity<br>+/- 5%              |          |     | Power consumption<br>+/- 5%        | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5%                             | EFFICIENCY RATE<br>+/- 7% |   |       |
| [Btu/h]                                 | [kcal/h] | [W] | [W]                                | [A]                           | [kg/h]  | [Btu/Wh]                  | [kcal/Wh]                                   | [W/W] |
| 218                                     | 55       | 64  | 42                                 | 0.71                          | 0.83  | 5.17                      | 1.30  | 1.51  |

|   |          |     |                                    |                               |   |                           |   |       |
|---|----------|-----|------------------------------------|-------------------------------|---|---------------------------|---|-------|
| TEST CONDITIONS:<br><b>@220V2000RPM</b> |          |     | <b>CECOMAFLBP</b><br><b>Static</b> |                               | Evaporating temperature<br>(Condensing temperature) |                           | <b>-25°C (-13°F)</b><br><b>55°C (131°F)</b> |       |
| Cooling capacity<br>+/- 5%              |          |     | Power consumption<br>+/- 5%        | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5%                             | EFFICIENCY RATE<br>+/- 7% |   |       |
| [Btu/h]                                 | [kcal/h] | [W] | [W]                                | [A]                           | [kg/h]  | [Btu/Wh]                  | [kcal/Wh]                                   | [W/W] |
| 276                                     | 70       | 81  | 53                                 | 0.88                          | 1.05  | 5.23                      | 1.32  | 1.53  |

|   |          |     |                                    |                               |   |                           |   |       |
|---|----------|-----|------------------------------------|-------------------------------|---|---------------------------|---|-------|
| TEST CONDITIONS:<br><b>@220V3000RPM</b> |          |     | <b>CECOMAFLBP</b><br><b>Static</b> |                               | Evaporating temperature<br>(Condensing temperature) |                           | <b>-25°C (-13°F)</b><br><b>55°C (131°F)</b> |       |
| Cooling capacity<br>+/- 5%              |          |     | Power consumption<br>+/- 5%        | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5%                             | EFFICIENCY RATE<br>+/- 7% |   |       |
| [Btu/h]                                 | [kcal/h] | [W] | [W]                                | [A]                           | [kg/h]  | [Btu/Wh]                  | [kcal/Wh]                                   | [W/W] |
| 411                                     | 104      | 120 | 80                                 | 1.24                          | 1.57  | 5.16                      | 1.30  | 1.51  |

|   |          |     |                                    |                               |   |                           |   |       |
|---|----------|-----|------------------------------------|-------------------------------|---|---------------------------|---|-------|
| TEST CONDITIONS:<br><b>@220V4500RPM</b> |          |     | <b>CECOMAFLBP</b><br><b>Static</b> |                               | Evaporating temperature<br>(Condensing temperature) |                           | <b>-25°C (-13°F)</b><br><b>55°C (131°F)</b> |       |
| Cooling capacity<br>+/- 5%              |          |     | Power consumption<br>+/- 5%        | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5%                             | EFFICIENCY RATE<br>+/- 7% |   |       |
| [Btu/h]                                 | [kcal/h] | [W] | [W]                                | [A]                           | [kg/h]  | [Btu/Wh]                  | [kcal/Wh]                                   | [W/W] |
| 553                                     | 139      | 162 | 112                                | 0.89                          | 2.11  | 4.95                      | 1.25  | 1.45  |

### E - PERFORMANCE - CURVES

| TEST CONDITIONS:<br>@220V1200RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 35°C (+95°F) ) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 119                        | 30                | 35       | 20                          | 0.38                                   | 0.38                    | 5.84                      | 1.47     | 1.71      |       |
| -30 (-22)                        | 163                        | 41                | 48       | 24                          | 0.52                                   | 0.52                    | 6.76                      | 1.70     | 1.98      |       |
| -25 (-13)                        | 215                        | 54                | 63       | 28                          | 0.69                                   | 0.69                    | 7.80                      | 1.97     | 2.29      |       |
| -20 (- 4)                        | 277                        | 70                | 81       | 31                          | 0.89                                   | 0.89                    | 9.01                      | 2.27     | 2.64      |       |
| -15 (+ 5)                        | 351                        | 89                | 103      | 34                          | 1.13                                   | 1.13                    | 10.44                     | 2.63     | 3.06      |       |
| -10 (+14)                        | 439                        | 111               | 129      | 36                          | 1.41                                   | 1.41                    | 12.12                     | 3.05     | 3.55      |       |

| TEST CONDITIONS:<br>@220V1200RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 45°C (+113°F) ) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|---|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%           | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                     | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 98                         | 25                | 29       | 21                          | 0.34                                    | 0.34                    | 4.63                      | 1.17     | 1.36      |       |
| -30 (-22)                        | 138                        | 35                | 41       | 26                          | 0.48                                    | 0.48                    | 5.35                      | 1.35     | 1.57      |       |
| -25 (-13)                        | 186                        | 47                | 55       | 30                          | 0.65                                    | 0.65                    | 6.12                      | 1.54     | 1.79      |       |
| -20 (- 4)                        | 244                        | 61                | 71       | 35                          | 0.85                                    | 0.85                    | 6.99                      | 1.76     | 2.05      |       |
| -15 (+ 5)                        | 312                        | 79                | 91       | 39                          | 1.09                                    | 1.09                    | 8.00                      | 2.02     | 2.34      |       |
| -10 (+14)                        | 392                        | 99                | 115      | 43                          | 1.37                                    | 1.37                    | 9.20                      | 2.32     | 2.70      |       |

| TEST CONDITIONS:<br>@220V1200RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 55°C (+131°F) ) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|---|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%           | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                     | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 77                         | 19                | 23       | 21                          | 0.29                                    | 0.29                    | 3.59                      | 0.90     | 1.05      |       |
| -30 (-22)                        | 114                        | 29                | 33       | 27                          | 0.43                                    | 0.43                    | 4.26                      | 1.07     | 1.25      |       |
| -25 (-13)                        | 158                        | 40                | 46       | 32                          | 0.60                                    | 0.60                    | 4.91                      | 1.24     | 1.44      |       |
| -20 (- 4)                        | 210                        | 53                | 62       | 38                          | 0.80                                    | 0.80                    | 5.57                      | 1.40     | 1.63      |       |
| -15 (+ 5)                        | 272                        | 69                | 80       | 43                          | 1.04                                    | 1.04                    | 6.31                      | 1.59     | 1.85      |       |
| -10 (+14)                        | 345                        | 87                | 101      | 48                          | 1.32                                    | 1.32                    | 7.16                      | 1.81     | 2.10      |       |

| TEST CONDITIONS:<br>@220V1600RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 35°C (+95°F) ) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 165                        | 42                | 48       | 26                          | 0.20                                   | 0.53                    | 6.23                      | 1.57     | 1.83      |       |
| -30 (-22)                        | 223                        | 56                | 65       | 31                          | 0.24                                   | 0.72                    | 7.08                      | 1.78     | 2.08      |       |
| -25 (-13)                        | 293                        | 74                | 86       | 36                          | 0.28                                   | 0.94                    | 8.05                      | 2.03     | 2.36      |       |
| -20 (- 4)                        | 377                        | 95                | 111      | 41                          | 0.32                                   | 1.21                    | 9.18                      | 2.31     | 2.69      |       |
| -15 (+ 5)                        | 477                        | 120               | 140      | 45                          | 0.35                                   | 1.53                    | 10.52                     | 2.65     | 3.08      |       |
| -10 (+14)                        | 594                        | 150               | 174      | 49                          | 0.38                                   | 1.92                    | 12.11                     | 3.05     | 3.55      |       |

### E - PERFORMANCE - CURVES

| TEST CONDITIONS:<br>@220V1600RPM |       | CECOMAF<br>Static          |          |     | (Condensing temperature 45°C (+113°F)) |                               |                         |                           |           |       |
|----------------------------------|-------|----------------------------|----------|-----|--|-------------------------------|-------------------------|---------------------------|-----------|-------|
| Evaporating temperature          |       | Cooling capacity<br>+/- 5% |          |     | Power consumption<br>+/- 5%            | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |           |       |
| °C                               | (°F)  | [Btu/h]                    | [kcal/h] | [W] | [W]                                    | [A]                           | [kg/h]                  | [Btu/Wh]                  | [kcal/Wh] | [W/W] |
| -35                              | (-31) | 138                        | 35       | 40  | 28                                     | 0.21                          | 0.48                    | 4.97                      | 1.25      | 1.46  |
| -30                              | (-22) | 192                        | 48       | 56  | 34                                     | 0.25                          | 0.67                    | 5.69                      | 1.43      | 1.67  |
| -25                              | (-13) | 256                        | 65       | 75  | 40                                     | 0.30                          | 0.89                    | 6.43                      | 1.62      | 1.89  |
| -20                              | (- 4) | 334                        | 84       | 98  | 46                                     | 0.35                          | 1.16                    | 7.26                      | 1.83      | 2.13  |
| -15                              | (+ 5) | 426                        | 107      | 125 | 52                                     | 0.39                          | 1.49                    | 8.21                      | 2.07      | 2.41  |
| -10                              | (+14) | 533                        | 134      | 156 | 57                                     | 0.43                          | 1.87                    | 9.33                      | 2.35      | 2.73  |

| TEST CONDITIONS:<br>@220V1600RPM |       | CECOMAF<br>Static          |          |     | (Condensing temperature 55°C (+131°F)) |                               |                         |                           |           |       |
|----------------------------------|-------|----------------------------|----------|-----|--|-------------------------------|-------------------------|---------------------------|-----------|-------|
| Evaporating temperature          |       | Cooling capacity<br>+/- 5% |          |     | Power consumption<br>+/- 5%            | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |           |       |
| °C                               | (°F)  | [Btu/h]                    | [kcal/h] | [W] | [W]                                    | [A]                           | [kg/h]                  | [Btu/Wh]                  | [kcal/Wh] | [W/W] |
| -35                              | (-31) | 110                        | 28       | 32  | 29                                     | 0.22                          | 0.42                    | 3.83                      | 0.97      | 1.12  |
| -30                              | (-22) | 160                        | 40       | 47  | 35                                     | 0.27                          | 0.61                    | 4.55                      | 1.15      | 1.33  |
| -25                              | (-13) | 219                        | 55       | 64  | 42                                     | 0.32                          | 0.83                    | 5.22                      | 1.32      | 1.53  |
| -20                              | (- 4) | 289                        | 73       | 85  | 49                                     | 0.37                          | 1.10                    | 5.88                      | 1.48      | 1.72  |
| -15                              | (+ 5) | 373                        | 94       | 109 | 57                                     | 0.43                          | 1.43                    | 6.59                      | 1.66      | 1.93  |
| -10                              | (+14) | 471                        | 119      | 138 | 64                                     | 0.49                          | 1.81                    | 7.37                      | 1.86      | 2.16  |

| TEST CONDITIONS:<br>@220V2000RPM |       | CECOMAF<br>Static          |          |     | (Condensing temperature 35°C (+95°F)) |                               |                         |                           |           |       |
|----------------------------------|-------|----------------------------|----------|-----|---------------------------------------|-------------------------------|-------------------------|---------------------------|-----------|-------|
| Evaporating temperature          |       | Cooling capacity<br>+/- 5% |          |     | Power consumption<br>+/- 5%           | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |           |       |
| °C                               | (°F)  | [Btu/h]                    | [kcal/h] | [W] | [W]                                   | [A]                           | [kg/h]                  | [Btu/Wh]                  | [kcal/Wh] | [W/W] |
| -35                              | (-31) | 208                        | 52       | 61  | 33                                    | 0.25                          | 0.67                    | 6.30                      | 1.59      | 1.85  |
| -30                              | (-22) | 280                        | 71       | 82  | 39                                    | 0.30                          | 0.90                    | 7.14                      | 1.80      | 2.09  |
| -25                              | (-13) | 368                        | 93       | 108 | 46                                    | 0.35                          | 1.18                    | 8.07                      | 2.03      | 2.36  |
| -20                              | (- 4) | 472                        | 119      | 138 | 52                                    | 0.40                          | 1.52                    | 9.15                      | 2.30      | 2.68  |
| -15                              | (+ 5) | 596                        | 150      | 175 | 57                                    | 0.44                          | 1.92                    | 10.42                     | 2.63      | 3.05  |
| -10                              | (+14) | 742                        | 187      | 218 | 62                                    | 0.47                          | 2.39                    | 11.96                     | 3.01      | 3.50  |

| TEST CONDITIONS:<br>@220V2000RPM |       | CECOMAF<br>Static          |          |     | (Condensing temperature 45°C (+113°F)) |                               |                         |                           |           |       |
|----------------------------------|-------|----------------------------|----------|-----|--|-------------------------------|-------------------------|---------------------------|-----------|-------|
| Evaporating temperature          |       | Cooling capacity<br>+/- 5% |          |     | Power consumption<br>+/- 5%            | Current consumption<br>+/- 5% | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |           |       |
| °C                               | (°F)  | [Btu/h]                    | [kcal/h] | [W] | [W]                                    | [A]                           | [kg/h]                  | [Btu/Wh]                  | [kcal/Wh] | [W/W] |
| -35                              | (-31) | 175                        | 44       | 51  | 35                                     | 0.26                          | 0.61                    | 5.07                      | 1.28      | 1.48  |
| -30                              | (-22) | 242                        | 61       | 71  | 42                                     | 0.32                          | 0.84                    | 5.78                      | 1.46      | 1.69  |
| -25                              | (-13) | 323                        | 81       | 95  | 49                                     | 0.38                          | 1.12                    | 6.50                      | 1.64      | 1.90  |
| -20                              | (- 4) | 419                        | 105      | 123 | 57                                     | 0.44                          | 1.46                    | 7.28                      | 1.84      | 2.13  |
| -15                              | (+ 5) | 533                        | 134      | 156 | 65                                     | 0.49                          | 1.86                    | 8.18                      | 2.06      | 2.40  |
| -10                              | (+14) | 667                        | 168      | 195 | 72                                     | 0.55                          | 2.34                    | 9.26                      | 2.33      | 2.71  |

### E - PERFORMANCE - CURVES

| TEST CONDITIONS:<br>@220V2000RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 55°C (+131°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 141                        | 35                | 41       | 36                          | 0.27                                   | 0.54                    | 3.89                      | 0.98     | 1.14      |       |
| -30 (-22)                        | 202                        | 51                | 59       | 44                          | 0.33                                   | 0.77                    | 4.63                      | 1.17     | 1.36      |       |
| -25 (-13)                        | 276                        | 70                | 81       | 52                          | 0.40                                   | 1.05                    | 5.29                      | 1.33     | 1.55      |       |
| -20 (- 4)                        | 363                        | 92                | 106      | 62                          | 0.47                                   | 1.39                    | 5.93                      | 1.49     | 1.74      |       |
| -15 (+ 5)                        | 467                        | 118               | 137      | 71                          | 0.54                                   | 1.79                    | 6.60                      | 1.66     | 1.93      |       |
| -10 (+14)                        | 590                        | 149               | 173      | 80                          | 0.61                                   | 2.26                    | 7.35                      | 1.85     | 2.16      |       |

| TEST CONDITIONS:<br>@220V3000RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 35°C (+95°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|---------------------------------------|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%         | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                   | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 307                        | 77                | 90       | 50                          | 0.38                                  | 0.98                    | 6.11                      | 1.54     | 1.79      |       |
| -30 (-22)                        | 416                        | 105               | 122      | 60                          | 0.46                                  | 1.33                    | 6.87                      | 1.73     | 2.01      |       |
| -25 (-13)                        | 548                        | 138               | 160      | 71                          | 0.54                                  | 1.76                    | 7.73                      | 1.95     | 2.27      |       |
| -20 (- 4)                        | 706                        | 178               | 207      | 81                          | 0.62                                  | 2.27                    | 8.74                      | 2.20     | 2.56      |       |
| -15 (+ 5)                        | 893                        | 225               | 262      | 90                          | 0.69                                  | 2.87                    | 9.95                      | 2.51     | 2.92      |       |
| -10 (+14)                        | 1113                       | 281               | 326      | 98                          | 0.75                                  | 3.59                    | 11.41                     | 2.87     | 3.34      |       |

| TEST CONDITIONS:<br>@220V3000RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 45°C (+113°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 256                        | 64                | 75       | 52                          | 0.39                                   | 0.89                    | 4.98                      | 1.26     | 1.46      |       |
| -30 (-22)                        | 357                        | 90                | 105      | 64                          | 0.48                                   | 1.24                    | 5.61                      | 1.41     | 1.64      |       |
| -25 (-13)                        | 478                        | 120               | 140      | 76                          | 0.58                                   | 1.66                    | 6.26                      | 1.58     | 1.84      |       |
| -20 (- 4)                        | 623                        | 157               | 183      | 89                          | 0.68                                   | 2.17                    | 6.99                      | 1.76     | 2.05      |       |
| -15 (+ 5)                        | 796                        | 201               | 233      | 101                         | 0.77                                   | 2.78                    | 7.84                      | 1.98     | 2.30      |       |
| -10 (+14)                        | 998                        | 252               | 293      | 113                         | 0.86                                   | 3.50                    | 8.85                      | 2.23     | 2.59      |       |

| TEST CONDITIONS:<br>@220V3000RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 55°C (+131°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 203                        | 51                | 60       | 52                          | 0.39                                   | 0.77                    | 3.92                      | 0.99     | 1.15      |       |
| -30 (-22)                        | 296                        | 74                | 87       | 65                          | 0.50                                   | 1.12                    | 4.55                      | 1.15     | 1.33      |       |
| -25 (-13)                        | 406                        | 102               | 119      | 79                          | 0.61                                   | 1.55                    | 5.13                      | 1.29     | 1.50      |       |
| -20 (- 4)                        | 538                        | 136               | 158      | 95                          | 0.72                                   | 2.06                    | 5.71                      | 1.44     | 1.67      |       |
| -15 (+ 5)                        | 695                        | 175               | 204      | 110                         | 0.84                                   | 2.66                    | 6.34                      | 1.60     | 1.86      |       |
| -10 (+14)                        | 880                        | 222               | 258      | 125                         | 0.95                                   | 3.38                    | 7.05                      | 1.78     | 2.07      |       |

### E - PERFORMANCE - CURVES

| TEST CONDITIONS:<br>@220V4500RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 35°C (+95°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|---------------------------------------|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%         | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                   | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 447                        | 113               | 131      | 78                          | 0.58                                  | 1.43                    | 5.74                      | 1.45     | 1.68      |       |
| -30 (-22)                        | 591                        | 149               | 173      | 97                          | 0.68                                  | 1.90                    | 6.04                      | 1.52     | 1.77      |       |
| -25 (-13)                        | 769                        | 194               | 225      | 109                         | 0.80                                  | 2.47                    | 7.07                      | 1.78     | 2.07      |       |
| -20 (- 4)                        | 983                        | 248               | 288      | 116                         | 0.91                                  | 3.16                    | 8.49                      | 2.14     | 2.49      |       |
| -15 (+ 5)                        | 1237                       | 312               | 362      | 124                         | 1.02                                  | 3.98                    | 9.95                      | 2.51     | 2.92      |       |
| -10 (+14)                        | 1533                       | 386               | 449      | 138                         | 1.12                                  | 4.95                    | 11.11                     | 2.80     | 3.25      |       |

| TEST CONDITIONS:<br>@220V4500RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 45°C (+113°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 387                        | 97                | 113      | 78                          | 0.62                                   | 1.34                    | 4.99                      | 1.26     | 1.46      |       |
| -30 (-22)                        | 518                        | 131               | 152      | 97                          | 0.74                                   | 1.80                    | 5.34                      | 1.35     | 1.57      |       |
| -25 (-13)                        | 681                        | 172               | 199      | 108                         | 0.87                                   | 2.37                    | 6.36                      | 1.60     | 1.86      |       |
| -20 (- 4)                        | 877                        | 221               | 257      | 116                         | 1.01                                   | 3.06                    | 7.70                      | 1.94     | 2.26      |       |
| -15 (+ 5)                        | 1111                       | 280               | 326      | 127                         | 1.15                                   | 3.88                    | 9.00                      | 2.27     | 2.64      |       |
| -10 (+14)                        | 1385                       | 349               | 406      | 144                         | 1.28                                   | 4.85                    | 9.92                      | 2.50     | 2.91      |       |

| TEST CONDITIONS:<br>@220V4500RPM |                            | CECOMAF<br>Static |          |                             | (Condensing temperature 55°C (+131°F)) |                         |                           |          |           |       |
|----------------------------------|----------------------------|-------------------|----------|-----------------------------|--|-------------------------|---------------------------|----------|-----------|-------|
| Evaporating temperature          | Cooling capacity<br>+/- 5% |                   |          | Power consumption<br>+/- 5% | Current consumption<br>+/- 5%          | Gas flow rate<br>+/- 5% | EFFICIENCY RATE<br>+/- 7% |          |           |       |
|                                  | °C (°F)                    | [Btu/h]           | [kcal/h] | [W]                         | [W]                                    | [A]                     | [kg/h]                    | [Btu/Wh] | [kcal/Wh] | [W/W] |
| -35 (-31)                        | 320                        | 81                | 94       | 86                          | 0.66                                   | 1.22                    | 3.68                      | 0.93     | 1.08      |       |
| -30 (-22)                        | 439                        | 111               | 129      | 107                         | 0.78                                   | 1.67                    | 3.90                      | 0.98     | 1.14      |       |
| -25 (-13)                        | 586                        | 148               | 172      | 123                         | 0.92                                   | 2.23                    | 4.72                      | 1.19     | 1.38      |       |
| -20 (- 4)                        | 766                        | 193               | 224      | 136                         | 1.08                                   | 2.92                    | 5.77                      | 1.46     | 1.69      |       |
| -15 (+ 5)                        | 979                        | 247               | 287      | 153                         | 1.25                                   | 3.75                    | 6.73                      | 1.69     | 1.97      |       |
| -10 (+14)                        | 1231                       | 310               | 361      | 177                         | 1.41                                   | 4.73                    | 7.22                      | 1.82     | 2.12      |       |

### F - EXTERNAL CHARACTERISTICS

|                         |                              |      |                          |
|-------------------------|------------------------------|------|--------------------------|
| 1 Base plate            | European Standard EUEM       |      |                          |
| 2 Tray holder           | Yes                          |      |                          |
| 3 Connectors            |                              |      |                          |
| 3.1 SUCTION             | 6.1 +0.10/+0.00              | [mm] | (0.240" +0.004"/+0.000") |
| 3.1.1 Material          | Copper                       |      |                          |
| 3.1.2 Shape             | Slanted 12° out + 79° up     |      |                          |
| 3.2 DISCHARGE           | 4.9 +0.10/-0.05              | [mm] | (0.193" +0.004"/-0.002") |
| 3.2.1 Material          | Copper                       |      |                          |
| 3.2.2 Shape             | Slanted 0° up + 24° to Back  |      |                          |
| 3.3 PROCESS             | 6 +0.08/-0.08                | [mm] | (0.236" +0.003"/-0.003") |
| 3.3.1 Material          | Copper(OD)                   |      |                          |
| 3.3.2 Shape             | Slanted 42° up + 45° to Back |      |                          |
| 3.4 Oil cooler (Copper) | No                           | [mm] |                          |
| 3.5 Connector sealing   | Rubber Plugs                 |      |                          |