



## Tabulated calculation - H

### Input

|                               |                       |
|-------------------------------|-----------------------|
| Model                         | H2500CC               |
| Refrigerant                   | R404A                 |
| Reference temperature         | Dew temperature       |
| Suction temperature           | 20.0 °C               |
| Evaporator outlet temperature | 20.0 °C               |
| Liquid subcooling             | 0.0 K                 |
| Voltage / phases / frequency  | 380-420 V / 3 / 50 Hz |

### Cooling capacity - At evaporator W

|           | Te = -5.0 | Te = -10.0 | Te = -15.0 | Te = -20.0 | Te = -25.0 | Te = -30.0 | Te = -35.0 | Te = -40.0 |
|-----------|-----------|------------|------------|------------|------------|------------|------------|------------|
| Tc = 20.0 | 71248     | 58601      | 47718      | 38437      | 30596      | 24032      | 18584      | 14089      |
| Tc = 25.0 | 66570     | 54734      | 44555      | 35870      | 28519      | 22337      | 17165      | 12838      |
| Tc = 30.0 | 61846     | 50824      | 41353      | 33268      | 26409      | 20614      | 15720      | 11565      |
| Tc = 35.0 | 57085     | 46881      | 38120      | 30639      | 24277      | 18871      | 14259      | 10279      |
| Tc = 40.0 | 52295     | 42912      | 34865      | 27991      | 22128      | 17115      | 12788      | 8987       |
| Tc = 45.0 | 47483     | 38925      | 31595      | 25331      | 19972      | 15355      | 11317      | 7698       |
| Tc = 50.0 | 42659     | 34928      | 28319      | 22669      | 17816      | 13598      | 9853       |            |
| Tc = 55.0 | 37830     | 30931      | 25045      | 20012      | 15669      | 11854      | 8405       |            |

### Cooling capacity - At compressor W

|           | Te = -5.0 | Te = -10.0 | Te = -15.0 | Te = -20.0 | Te = -25.0 | Te = -30.0 | Te = -35.0 | Te = -40.0 |
|-----------|-----------|------------|------------|------------|------------|------------|------------|------------|
| Tc = 20.0 | 71248     | 58601      | 47718      | 38437      | 30596      | 24032      | 18584      | 14089      |
| Tc = 25.0 | 66570     | 54734      | 44555      | 35870      | 28519      | 22337      | 17165      | 12838      |
| Tc = 30.0 | 61846     | 50824      | 41353      | 33268      | 26409      | 20614      | 15720      | 11565      |
| Tc = 35.0 | 57085     | 46881      | 38120      | 30639      | 24277      | 18871      | 14259      | 10279      |
| Tc = 40.0 | 52295     | 42912      | 34865      | 27991      | 22128      | 17115      | 12788      | 8987       |
| Tc = 45.0 | 47483     | 38925      | 31595      | 25331      | 19972      | 15355      | 11317      | 7698       |
| Tc = 50.0 | 42659     | 34928      | 28319      | 22669      | 17816      | 13598      | 9853       |            |
| Tc = 55.0 | 37830     | 30931      | 25045      | 20012      | 15669      | 11854      | 8405       |            |

**Absorbed power kW**

|           | Te = -5.0 | Te = -10.0 | Te = -15.0 | Te = -20.0 | Te = -25.0 | Te = -30.0 | Te = -35.0 | Te = -40.0 |
|-----------|-----------|------------|------------|------------|------------|------------|------------|------------|
| Tc = 20.0 | 12.73     | 12.48      | 11.94      | 11.18      | 10.24      | 9.17       | 8.01       | 6.82       |
| Tc = 25.0 | 13.95     | 13.40      | 12.61      | 11.63      | 10.50      | 9.27       | 7.99       | 6.71       |
| Tc = 30.0 | 15.10     | 14.26      | 13.22      | 12.02      | 10.71      | 9.33       | 7.94       | 6.59       |
| Tc = 35.0 | 16.18     | 15.07      | 13.79      | 12.38      | 10.89      | 9.38       | 7.88       | 6.45       |
| Tc = 40.0 | 17.23     | 15.85      | 14.32      | 12.71      | 11.06      | 9.41       | 7.82       | 6.32       |
| Tc = 45.0 | 18.25     | 16.60      | 14.85      | 13.04      | 11.23      | 9.45       | 7.77       | 6.21       |
| Tc = 50.0 | 19.25     | 17.34      | 15.37      | 13.38      | 11.41      | 9.51       | 7.74       |            |
| Tc = 55.0 | 20.25     | 18.10      | 15.91      | 13.73      | 11.61      | 9.61       | 7.76       |            |

**Absorbed current A**

|           | Te = -5.0 | Te = -10.0 | Te = -15.0 | Te = -20.0 | Te = -25.0 | Te = -30.0 | Te = -35.0 | Te = -40.0 |
|-----------|-----------|------------|------------|------------|------------|------------|------------|------------|
| Tc = 20.0 | 26.9      | 26.6       | 26.0       | 25.2       | 24.3       | 23.3       | 22.3       | 21.4       |
| Tc = 25.0 | 28.3      | 27.6       | 26.7       | 25.7       | 24.5       | 23.4       | 22.3       | 21.3       |
| Tc = 30.0 | 29.6      | 28.6       | 27.4       | 26.1       | 24.7       | 23.4       | 22.3       | 21.2       |
| Tc = 35.0 | 31.0      | 29.6       | 28.1       | 26.5       | 24.9       | 23.5       | 22.2       | 21.1       |
| Tc = 40.0 | 32.3      | 30.6       | 28.7       | 26.8       | 25.1       | 23.5       | 22.2       | 21.1       |
| Tc = 45.0 | 33.7      | 31.5       | 29.3       | 27.2       | 25.3       | 23.5       | 22.1       | 21.0       |
| Tc = 50.0 | 35.0      | 32.5       | 30.0       | 27.6       | 25.4       | 23.6       | 22.1       |            |
| Tc = 55.0 | 36.4      | 33.5       | 30.7       | 28.0       | 25.7       | 23.7       | 22.1       |            |

**Mass flow kg/h**

|           | Te = -5.0 | Te = -10.0 | Te = -15.0 | Te = -20.0 | Te = -25.0 | Te = -30.0 | Te = -35.0 | Te = -40.0 |
|-----------|-----------|------------|------------|------------|------------|------------|------------|------------|
| Tc = 20.0 | 1613.6    | 1311.0     | 1058.0     | 848.3      | 675.7      | 533.8      | 416.3      | 317.0      |
| Tc = 25.0 | 1582.4    | 1284.7     | 1035.8     | 829.3      | 659.0      | 518.5      | 401.5      | 301.8      |
| Tc = 30.0 | 1549.8    | 1257.0     | 1012.1     | 808.7      | 640.5      | 501.3      | 384.8      | 284.7      |
| Tc = 35.0 | 1516.1    | 1228.1     | 987.0      | 786.6      | 620.6      | 482.6      | 366.4      | 265.7      |
| Tc = 40.0 | 1481.5    | 1198.2     | 960.9      | 763.3      | 599.3      | 462.5      | 346.5      | 245.2      |
| Tc = 45.0 | 1446.1    | 1167.4     | 933.8      | 739.0      | 576.9      | 441.1      | 325.3      | 223.2      |
| Tc = 50.0 | 1410.2    | 1135.9     | 905.9      | 713.9      | 553.6      | 418.8      | 303.0      |            |
| Tc = 55.0 | 1374.0    | 1104.1     | 877.6      | 688.2      | 529.7      | 395.6      | 279.9      |            |