

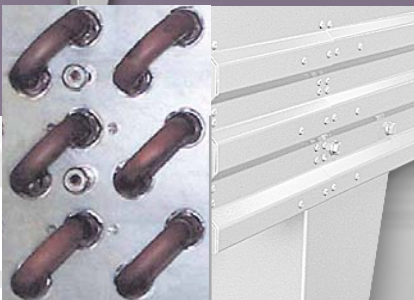


Axialverflüssiger

Axial condensers



1



Güntner
Tragrohr-
Konstruktion

Güntner
Tragprofile

GVH/GVV

R134a, R22, R404A, R507, R407C

Patentierte Güntner-Tragrohr-Konstruktion

Alle Ventilatoren in ISO F - Ausführung

Leistungsangaben gelten für R404A

Güntner's patented "Floating coil" principle

All fans in ISO F -Design

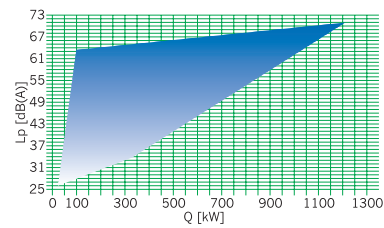
Indicated capacities applicable to R404A

Eurovent-Zertifizierung beantragt
Eurovent certification applied for

www.guentner.de

Anwendungsvorteile für Anlagenbauer, Planer und Betreiber

Application benefits for contractors, designers and end users



Verringerter bauseitiger Aufwand

- geringere Anzahl der Gerätefüße, daher weniger Fundamente notwendig
- bis 12 m Gerätelänge max. 6 Füße
- niedrigere Dachlast durch reduziertes Gerätegewicht

Less work at site

- unit has fewer feet, therefore fewer foundations required
- maximum of 6 feet on units up to 12 m long
- less roof load due to reduced unit weight

Hohe Sicherheit gegen Leckagen

- bewährtes patentiertes Günstner Tragrohrsystem
- original Günstner Tragprofile
- selbsttragende Gehäusekonstruktion
- geringe Durchbiegung bei Kran- und Staplertransport
- verringerte Aufstellverwindung
- hohe Steifigkeit bei reduziertem Gewicht

Good protection against leakage

- Günstner's tried and tested, patented floating coil system
- original Günstner bearing profiles
- self-supporting casing structure
- minimal flexion during crane and forklift transport
- reduced assembly torsion
- more rigidity with less weight

Neue Schallabstufungen

- Die verbesserten Schallabstufungen der Günstner Verflüssiger gewährleisten optimale Anpassung an schalltechnische Anforderungen
- zusätzliche Schallstufe M zwischen N und L, 5 Schallabstufungen statt bisher 4
 - für jede Leistung jetzt noch mehr Geräte mit passendem Schalldruckpegel

New noise classifications

- The improved sound graduation of the Günstner condensers guarantees maximum compliance with noise regulations
- additional noise level M between N and L, 5 sound graduations instead of the previous 4
 - now even more appliances with the right sound pressure level for every capacity

Umfangreiches Zubehörprogramm

Ermöglicht individuelle Ausführungsvarianten. Günstner Schaltschränke mit Steuer- und Regelkomponenten werden nach höchsten Qualitätsstandards im eigenen Werk gefertigt und sind optimal an Verflüssiger angepasst.

Wide range of accessories

Allows individual design variants. Günstner control panels with control and actuation components are made to the highest quality standards in the company's own plant and are specially designed for use with condensers.

Sparen Sie wertvolle Arbeitszeit durch werkseitige montierte Günstner Schaltschränke!

Save on precious working time by using factory-installed control panels.

Klassifizierung / Classification

| | | |
|------------------------------------------------------------|----------------------------------|--------------|
| Günstner Axialverflüssiger Günstner axial condenser | | GV |
| H = horizontal V = vertikal | | H |
| Ventilator Fan | Ø 800 mm | 080 |
| Generation* Generation* | | .1 |
| Baugrößenmodul Module of model | | A / |
| Anzahl der Ventilatoren Number of fans | | 2 × 6 |
| Normalausführung | Standard design | - N |
| Mittelleise Ausführung | Medium noise level design | - M |
| Leise Ausführung | Low noise level design | - L |
| Sehr leise Ausführung | Super low noise level design | - S |
| Extrem leise Ausführung | Extremely low noise level design | - E |
| Spannung / Phase / Frequenz Voltage / Phase / Frequency | 400 V 3~ 50 Hz Δ | D |

* nur bei Baugröße 080/090

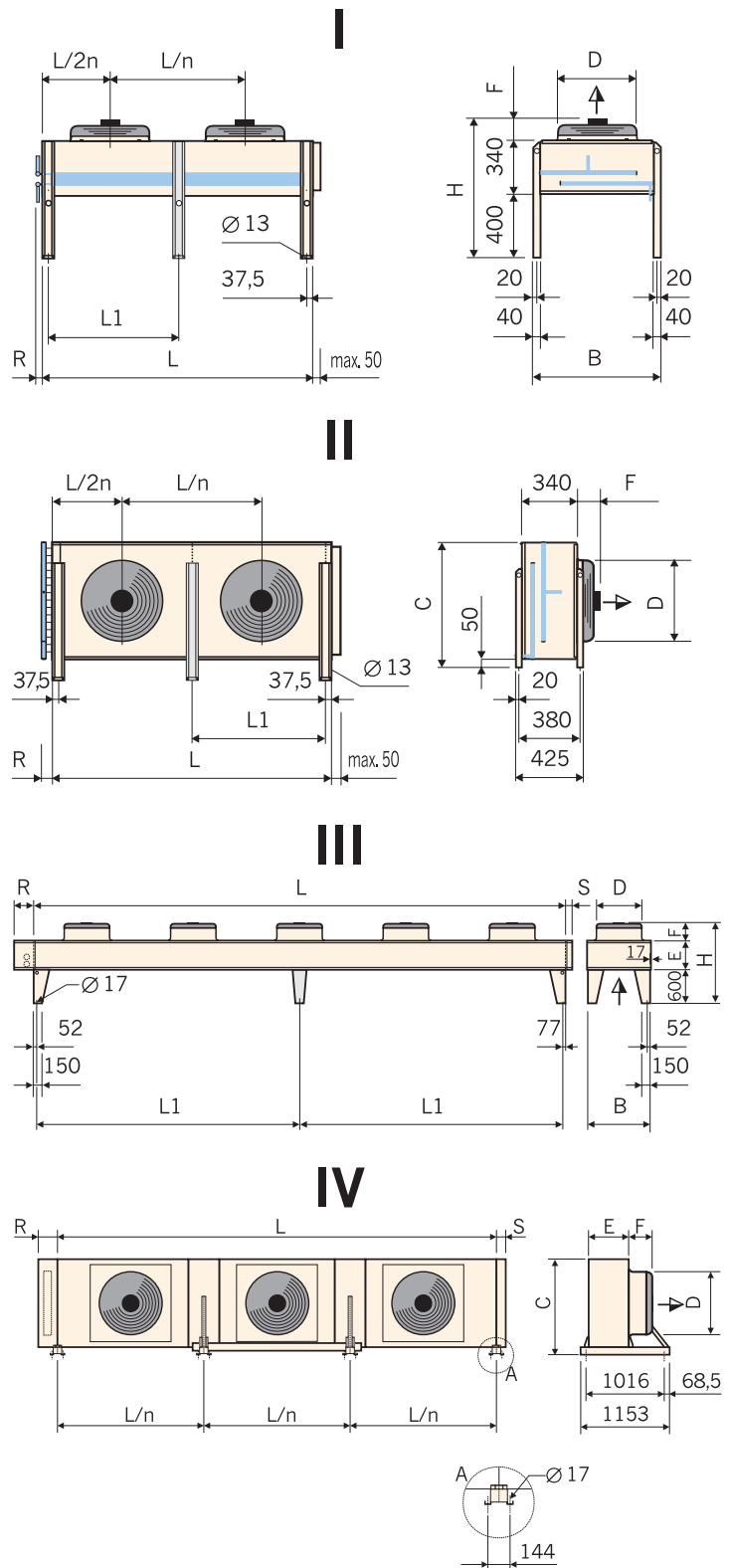
* only size 080/090

Abmessungen Dimensions

GVH / GVV Ausführungen GVH / GVV Design

| Abmessungen Dimensions | | | | | | | | Anzahl der FüÙe No. of feet | Ausführung Construction |
|---------------------------|-----|------|-----|------|-----|------|----|--------------------------------|----------------------------|
| GVH | | | | GVV | | | | | |
| L | R | B | H | L1 | E | C | G | | |
| mm | mm | mm | mm | mm | mm | mm | mm | | |
| 850 | 40 | 795 | 895 | — | 340 | 765 | — | 4 | I / II |
| 1125 | 40 | 795 | 895 | — | 340 | 765 | — | 4 | I / II |
| 1700 | 50 | 795 | 895 | — | 340 | 765 | — | 4 | I / II |
| 2250 | 50 | 795 | 895 | — | 340 | 765 | — | 4 | I / II |
| 2550 | 50 | 795 | 895 | — | 340 | 765 | — | 4 | I / II |
| 3375 | 50 | 795 | 895 | — | 340 | 765 | — | 4 | I / II |
| 925 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 1325 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 1850 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 2650 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 2775 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 3375 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 3975 | 100 | 895 | 950 | — | 340 | 865 | — | 4 | I / II |
| 4500 | 120 | 895 | 950 | 2215 | 340 | 865 | — | 6 | I / II |
| 925 | 100 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 1125 | 100 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 1325 | 100 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 1850 | 110 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 2250 | 110 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 2650 | 110 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 2775 | 120 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 3375 | 120 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 3975 | 130 | 1145 | 950 | — | 340 | 1085 | — | 4 | I / II |
| 4500 | 130 | 1145 | 950 | 2215 | 340 | 1085 | — | 6 | I / II |

| | | | | | | | | | |
|-------|-----|------|------|------|-----|------|------|---|----------|
| 1900 | 250 | 1141 | 1480 | 1796 | 520 | 1241 | 1153 | 4 | III / IV |
| 2300 | 250 | 1141 | 1480 | 2196 | 520 | 1241 | 1153 | 4 | III / IV |
| 3800 | 250 | 1141 | 1480 | 3696 | 520 | 1241 | 1153 | 4 | III / IV |
| 4600 | 250 | 1141 | 1480 | 4496 | 520 | 1241 | 1153 | 4 | III / IV |
| 5700 | 250 | 1141 | 1480 | 5596 | 520 | 1241 | 1153 | 4 | III / IV |
| 6900 | 250 | 1141 | 1480 | 6796 | 520 | 1241 | 1153 | 4 | III / IV |
| 7600 | 350 | 1141 | 1480 | 7496 | 520 | 1241 | 1153 | 4 | III / IV |
| 9200 | 350 | 1141 | 1480 | 9096 | 520 | 1241 | 1153 | 4 | III / IV |
| 9500 | 350 | 1141 | 1480 | 4698 | 520 | 1241 | 1153 | 6 | III / IV |
| 11500 | 350 | 1141 | 1480 | 5698 | 520 | 1241 | 1153 | 6 | III / IV |
| 11400 | 350 | 1141 | 1480 | 5648 | 520 | 1241 | 1153 | 6 | III / IV |
| 1900 | 250 | 1541 | 1480 | 1796 | 520 | 1641 | 1153 | 4 | III / IV |
| 2300 | 250 | 1541 | 1480 | 2196 | 520 | 1641 | 1153 | 4 | III / IV |
| 3800 | 250 | 1541 | 1480 | 3696 | 520 | 1641 | 1153 | 4 | III / IV |
| 4600 | 250 | 1541 | 1480 | 4496 | 520 | 1641 | 1153 | 4 | III / IV |
| 5700 | 250 | 1541 | 1480 | 5596 | 520 | 1641 | 1153 | 4 | III / IV |
| 6900 | 250 | 1541 | 1480 | 6796 | 520 | 1641 | 1153 | 4 | III / IV |
| 7600 | 350 | 1541 | 1480 | 7496 | 520 | 1641 | 1153 | 4 | III / IV |
| 9200 | 350 | 1541 | 1480 | 9096 | 520 | 1641 | 1153 | 4 | III / IV |
| 9500 | 350 | 1541 | 1480 | 4698 | 520 | 1641 | 1153 | 6 | III / IV |
| 11500 | 350 | 1541 | 1480 | 5698 | 520 | 1641 | 1153 | 6 | III / IV |
| 11400 | 350 | 1541 | 1480 | 5648 | 520 | 1641 | 1153 | 6 | III / IV |
| 1900 | 250 | 1541 | 1480 | 1796 | 520 | 1641 | 1153 | 4 | III / IV |
| 2300 | 250 | 1541 | 1480 | 2196 | 520 | 1641 | 1153 | 4 | III / IV |
| 3800 | 250 | 1541 | 1480 | 3696 | 520 | 1641 | 1153 | 4 | III / IV |
| 4600 | 250 | 1541 | 1480 | 4496 | 520 | 1641 | 1153 | 4 | III / IV |
| 5700 | 250 | 1541 | 1480 | 5596 | 520 | 1641 | 1153 | 4 | III / IV |
| 6900 | 250 | 1541 | 1480 | 6796 | 520 | 1641 | 1153 | 4 | III / IV |
| 7600 | 350 | 1541 | 1480 | 7496 | 520 | 1641 | 1153 | 4 | III / IV |
| 9200 | 350 | 1541 | 1480 | 9096 | 520 | 1641 | 1153 | 4 | III / IV |
| 9500 | 350 | 1541 | 1480 | 4698 | 520 | 1641 | 1153 | 6 | III / IV |
| 11500 | 350 | 1541 | 1480 | 5698 | 520 | 1641 | 1153 | 6 | III / IV |
| 11400 | 350 | 1541 | 1480 | 5648 | 520 | 1641 | 1153 | 6 | III / IV |



n = Anzahl Ventilatoren
n = Number of fans

Bei SchwingmetallfüÙen vergrößern sich die AufstellmaÙe „H“ und „C“
When using vibration dampers, the setting-up dimensions „H“ and „C“ (height) increase

Leistungstabellen

GVH...N GVH...M

Capacity tables

GVH...N GVH...M

| Typ Type | GVH...N - 2 reihig - 2 rows | | | | | | | GVH...M - 2 reihig - 2 rows | | | | | | | | |
|-------------------|-------------------------------------------------------|--------|-----------------------------|-------------------|------------------------------------------------------------------|---------------------------------------------------|----------------------------------------------------|-------------------------------------|-------------------------------------------------------|---------------|-----------------------------|-------------------|------------------------------------------------------------------|-------------------------------|----------------------------------------------------|-------------------------------------|
| | Nennleistung Nominal capacity R404 Δt = 15 K | | Luftvolumenstrom Airflow | | aufgenommene Leistung absorbed power P _{el} total | Motor- daten Motor data | Schall- druck- pegel Sound pressure level | Strang-Anzahl Number of sections | Nennleistung Nominal capacity R404 Δt = 15 K | | Luftvolumenstrom Airflow | | aufgenommene Leistung absorbed power P _{el} total | Motor- daten Motor data | Schall- druck- pegel Sound pressure level | Strang-Anzahl Number of sections |
| | Δ | Y | Δ | Y | Δ/Y | | Δ | | Y | Δ | Y | Δ/Y | | Δ | Y | |
| | kW | kW | m ³ /h | m ³ /h | kW | | dB(A)5m | | kW | kW | m ³ /h | m ³ /h | kW | | dB(A)5m | |
| 052A/2x2 | 104,8 | 86,1 | 29750 | 22430 | 2,87 / 2,08 | | | | | | | | | | | |
| 052C/2x2 | 127,3 | 106,0 | 32880 | 25290 | 2,75 / 2,02 | Δ | 60 | 54 | 41 | | | | | | | |
| 052A/2x3 | 158,3 | 130,0 | 44770 | 33780 | 2,15 / 3,12 | P=780W I=1,35(400V) n=1340min ⁻¹ | 60 | 54 | 31 | | | | | | | |
| 052C/2x3 | 191,9 | 160,2 | 49380 | 38000 | 4,12 / 3,04 | Y | 61 | 55 | 62 | | | | | | | |
| | | | | | | P=550W I=0,94(400V) n=1000min ⁻¹ | 61 | 55 | 62 | | | | | | | |
| 067A/2x2 | 167,2 | 140,0 | 53070 | 40040 | 8,00 / 5,16 | Δ | 69 | 62 | 54 | | | | | | | |
| 067B/2x2 | 189,2 | 159,1 | 56970 | 43500 | 7,68 / 5,02 | P=2200W I=4,3(400V) n=1340min ⁻¹ | 69 | 62 | 54 | | | | | | | |
| 067C/2x2 | 206,4 | 172,1 | 59600 | 45910 | 7,56 / 4,96 | Y | 69 | 62 | 82 | | | | | | | |
| 067A/2x3 | 253,0 | 211,8 | 79900 | 60320 | 12,00 / 7,74 | Δ | 71 | 64 | 82 | | | | | | | |
| 067B/2x3 | 285,9 | 240,2 | 85650 | 65420 | 11,52 / 7,53 | Y | 71 | 64 | 82 | | | | | | | |
| 067C/2x3 | 312,7 | 263,2 | 89530 | 69000 | 11,34 / 7,44 | P=1300W I=2,5(400V) n=1000min ⁻¹ | 71 | 64 | 82 | | | | | | | |
| 067B/2x4 | 384,0 | 321,0 | 114340 | 87350 | 15,36 / 10,04 | Y | 72 | 65 | 164 | | | | | | | |
| 080.1A/2x2 | 324,9 | 260,9 | 80000 | 59200 | 7,88 / 5,00 | Δ | 62 | 56 | 45 | 295,3 | 203,9 | 70000 | 43200 | 7,12 / 2,76 | Δ | |
| 080.1B/2x2 | 358,6 | 288,1 | 84800 | 63200 | 7,76 / 4,96 | P=2000W I=4,0(400V) n=880min ⁻¹ | 62 | 56 | 45 | 325,9 | 227,1 | 74400 | 46800 | 7,08 / 2,76 | P=1700W I=3,7(400V) n=760min ⁻¹ | |
| 080.1A/2x3 | 493,5 | 394,7 | 120000 | 88800 | 11,82 / 7,50 | Y | 63 | 57 | 67 | 448,3 | 307,7 | 105000 | 64800 | 10,68 / 4,14 | Δ | |
| 080.1B/2x3 | 536,5 | 427,5 | 127200 | 94800 | 11,64 / 7,45 | Δ | 63 | 57 | 135 | 493,8 | 342,5 | 111600 | 70200 | 10,62 / 4,14 | P=1700W I=3,7(400V) n=760min ⁻¹ | |
| 080.1A/2x4 | 658,1 | 523,2 | 160000 | 118400 | 15,76 / 10,00 | Y | 64 | 58 | 135 | 595,2 | 407,2 | 140000 | 86400 | 14,24 / 5,52 | Δ | |
| 080.1B/2x4 | 729,9 | 580,6 | 169600 | 126400 | 15,52 / 9,93 | Y | 64 | 58 | 135 | 659,9 | 454,9 | 148800 | 93600 | 14,16 / 5,52 | Y | |
| 080.1A/2x5 | 834,2 | 663,0 | 200000 | 148000 | 19,70 / 12,50 | P=1250W I=2,3(400V) n=660min ⁻¹ | 65 | 59 | 135 | 754,6 | 515,6 | 175000 | 108000 | 17,80 / 6,90 | P=700W I=1,6(400V) n=480min ⁻¹ | |
| 080.1B/2x5 | 920,3 | 733,1 | 212000 | 158000 | 19,40 / 12,41 | Y | 65 | 59 | 135 | 833,0 | 574,4 | 186000 | 117000 | 17,70 / 6,90 | Δ | |
| 080.1A/2x6 | 1006,7 | 801,9 | 240000 | 177600 | 23,64 / 15,00 | Y | 65 | 59 | 135 | 911,6 | 623,8 | 210000 | 129600 | 21,36 / 8,28 | Y | |
| 090.1A/2x2 | 407,5 | 357,4 | 111600 | 91600 | 14,32 / 9,60 | Δ | 68 | 62 | 67 | 362,7 | 280,1 | 93600 | 65200 | 11,12 / 6,00 | Δ | |
| 090.1B/2x2 | 459,3 | 390,1 | 120000 | 95200 | 14,16 / 9,48 | P=3600W I=7,2(400V) n=890min ⁻¹ | 68 | 62 | 67 | 408,9 | 310,4 | 101600 | 70400 | 10,88 / 6,00 | P=2800W I=5,1(400V) n=770min ⁻¹ | |
| 090.1A/2x3 | 609,7 | 530,3 | 167400 | 137400 | 21,48 / 14,40 | Y | 69 | 63 | 135 | 538,5 | 412,3 | 140400 | 97800 | 16,68 / 9,00 | Δ | |
| 090.1B/2x3 | 692,7 | 585,3 | 180000 | 142800 | 21,24 / 14,22 | Y | 69 | 63 | 135 | 614,2 | 465,0 | 152400 | 105600 | 16,32 / 9,00 | Y | |
| 090.1A/2x4 | 836,0 | 726,8 | 223200 | 183200 | 28,64 / 19,20 | Y | 70 | 64 | 135 | 738,1 | 563,7 | 187200 | 130400 | 22,24 / 12,00 | Y | |
| 090.1B/2x4 | 941,6 | 796,4 | 240000 | 190400 | 28,32 / 18,96 | Y | 70 | 64 | 135 | 835,6 | 632,1 | 203200 | 140800 | 21,76 / 12,00 | Y | |
| 090.1A/2x5 | 1057,2 | 920,7 | 279000 | 229000 | 35,80 / 24,00 | P=2500W I=4,3(400V) n=700min ⁻¹ | 71 | 65 | 135 | 935,1 | 714,6 | 234000 | 163000 | 27,80 / 15,00 | P=1500W I=2,6(400V) n=550min ⁻¹ | |
| 090.1B/2x5 | 1182,7 | 1003,0 | 300000 | 238000 | 35,40 / 23,70 | Y | 71 | 65 | 135 | 1051,5 | 798,0 | 254000 | 176000 | 27,20 / 15,00 | Y | |
| 090.1A/2x6 | 1269,7 | 1109,8 | 334800 | 274800 | 42,96 / 28,80 | Y | 71 | 65 | 135 | 1126,8 | 863,6 | 280800 | 195600 | 33,36 / 18,00 | Y | |

GVH/V ...-W = Verflüssiger in Wechselspannungsausführung 230 V lieferbar
 technische Daten siehe Seite 11
 = Condenser available with single phase fans 230 V
 technical data page 11

Leistungstabellen

GVH...E

Gewichte und Maße

GVH...N/M/L/S/E

Capacity tables

GVH...E

Weights and measures

GVH...N/M/L/S/E

| | | GVH...E - 2 reihig - 2 rows | | | | | | | | | |
|-------------|----------------------------------------------------------------------|-----------------------------|-----------------------------|-------------------|---------------------------------------------------------------|--------------------------------------------------------------|--------------------------------------------|----|-------------------------------------|--|--|
| Typ Type | Nennleistung Nominal capacity R404 $\Delta t = 15\text{ K}$ | | Luftvolumenstrom Airflow | | aufgenommene el. Leistung absorbed power P_{el} total | Motor-daten Motor data | Schall-druck-pegel Sound pressure level | | Strang-Anzahl Number of sections | | |
| | Δ | Y | Δ | Y | Δ/Y | | Δ | Y | | | |
| | kW | kW | m ³ /h | m ³ /h | kW | | dB(A)5m | | | | |
| 052A/2x2 | 53,7 | 33,8 | 12320 | 7080 | 0,34 / 0,17 | | 39 | 27 | 41 | | |
| 052C/2x2 | 67,3 | 42,1 | 13960 | 8090 | 0,34 / 0,16 | Δ P=100W I=0,19(400V) n=560min ⁻¹ | 39 | 27 | 62 | | |
| 052A/2x3 | 81,1 | 50,9 | 18560 | 10660 | 0,51 / 0,25 | Y | 40 | 28 | 62 | | |
| 052C/2x3 | 99,5 | 62,2 | 20970 | 12150 | 0,50 / 0,25 | Y P=50W I=0,09(400V) n=340min ⁻¹ | 40 | 28 | 62 | | |
| 067A/2x2 | 88,8 | 60,6 | 21480 | 13470 | 0,98 / 0,48 | Δ | 46 | 34 | 55 | | |
| 067B/2x2 | 100,8 | 69,6 | 23290 | 14830 | 0,95 / 0,48 | P=260W I=0,51(400V) n=560min ⁻¹ | 46 | 34 | 55 | | |
| 067C/2x2 | 105,4 | 73,2 | 24560 | 15830 | 0,93 / 0,47 | Y | 46 | 34 | 82 | | |
| 067A/2x3 | 133,7 | 91,5 | 32350 | 20300 | 1,46 / 0,72 | Y | 48 | 36 | 82 | | |
| 067B/2x3 | 152,1 | 105,0 | 35020 | 22320 | 1,43 / 0,72 | P=120W I=0,23(400V) n=350min ⁻¹ | 48 | 36 | 82 | | |
| 067C/2x3 | 166,2 | 115,5 | 36910 | 23800 | 1,40 / 0,71 | Y | 48 | 36 | 82 | | |
| 067B/2x4 | 206,6 | 143,8 | 46760 | 29810 | 1,90 / 0,96 | Y | 49 | 37 | 82 | | |
| 080.1A/2x2 | 145,3 | 102,0 | 36000 | 22400 | 0,94 / 0,44 | Δ | 42 | 31 | 30 | | |
| 080.1B/2x2 | 158,6 | 112,8 | 37600 | 24000 | 0,93 / 0,43 | P=250W I=0,51(400V) n=380min ⁻¹ | 42 | 31 | 30 | | |
| 080.1A/2x3 | 220,1 | 153,0 | 54000 | 33600 | 1,41 / 0,66 | Y | 43 | 32 | 45 | | |
| 080.1B/2x3 | 240,1 | 168,9 | 56400 | 36000 | 1,40 / 0,65 | Y | 43 | 32 | 45 | | |
| 080.1A/2x4 | 295,8 | 206,2 | 72000 | 44800 | 1,88 / 0,88 | Y | 44 | 33 | 45 | | |
| 080.1B/2x4 | 320,2 | 227,1 | 75200 | 48000 | 1,86 / 0,86 | Y | 44 | 33 | 45 | | |
| 080.1A/2x5 | 369,3 | 255,5 | 90000 | 56000 | 2,35 / 1,10 | P=110W I=0,27(400V) n=240min ⁻¹ | 45 | 34 | 90 | | |
| 080.1B/2x5 | 403,0 | 282,9 | 94000 | 60000 | 2,33 / 1,08 | Y | 45 | 34 | 90 | | |
| 080.1A/2x6 | 446,9 | 309,3 | 108000 | 67200 | 2,82 / 1,32 | Y | 45 | 34 | 90 | | |
| 090.1A/2x2 | 185,9 | 129,7 | 50800 | 30800 | 2,20 / 1,10 | Δ | 48 | 38 | 30 | | |
| 090.1B/2x2 | 210,8 | 150,0 | 55600 | 34800 | 2,20 / 1,10 | P=550W I=1,1(400V) n=390min ⁻¹ | 48 | 38 | 30 | | |
| 090.1A/2x3 | 282,7 | 170,3 | 76200 | 38500 | 3,30 / 1,65 | Y | 49 | 39 | 45 | | |
| 090.1B/2x3 | 319,9 | 226,5 | 83400 | 52200 | 3,30 / 1,65 | Y | 49 | 39 | 45 | | |
| 090.1A/2x4 | 377,0 | 211,2 | 101600 | 46200 | 4,40 / 2,20 | Y | 50 | 40 | 45 | | |
| 090.1B/2x4 | 427,3 | 300,2 | 111200 | 69600 | 4,40 / 2,20 | Y | 50 | 40 | 90 | | |
| 090.1A/2x5 | 475,4 | 327,9 | 127000 | 77000 | 5,50 / 2,75 | P=270W I=0,55(400V) n=250min ⁻¹ | 51 | 41 | 90 | | |
| 090.1B/2x5 | 539,8 | 379,8 | 139000 | 87000 | 5,50 / 2,75 | Y | 51 | 41 | 90 | | |
| 090.1A/2x6 | 574,6 | 396,8 | 152400 | 92400 | 6,60 / 3,30 | Y | 51 | 41 | 90 | | |

GVH/V ...-W = Verflüssiger in Wechselspannungsausführung 230 V lieferbar
 technische Daten siehe Seite 11
 = Condenser available with single phase fans 230 V
 technical data page 11

| Gewicht Weight | | Rohrvolumen Tube volume | | Fläche Surface | |
|-------------------|------|----------------------------|-----|-------------------|----------------|
| N M L | S E | N M L | S E | N M L | S E |
| kg | kg | l | l | m ² | m ² |
| 181 | 181 | 50 | 50 | 207 | 207 |
| 207 | 207 | 66 | 66 | 299 | 299 |
| 321 | 321 | 66 | 66 | 314 | 314 |
| 457 | 457 | 95 | 95 | 452 | 452 |
| 406 | 406 | 63 | 63 | 272 | 272 |
| 452 | 452 | 74 | 74 | 332 | 332 |
| 497 | 497 | 84 | 84 | 393 | 393 |
| 566 | 566 | 87 | 87 | 412 | 412 |
| 636 | 636 | 105 | 105 | 502 | 502 |
| 713 | 713 | 125 | 125 | 593 | 593 |
| 829 | 829 | 139 | 139 | 672 | 672 |
| 792 | 642 | 124 | 82 | 1002 | 668 |
| 910 | 734 | 148 | 99 | 1212 | 808 |
| 1154 | 935 | 182 | 122 | 1502 | 1002 |
| 1338 | 1081 | 220 | 146 | 1819 | 1212 |
| 1505 | 1226 | 241 | 161 | 2003 | 1335 |
| 1754 | 1425 | 291 | 194 | 2425 | 1617 |
| 1859 | 1511 | 300 | 200 | 2504 | 1669 |
| 2174 | 1756 | 362 | 242 | 3031 | 2021 |
| 2188 | 1771 | 359 | 239 | 3005 | 2003 |
| 866 | 648 | 124 | 82 | 1002 | 668 |
| 983 | 747 | 148 | 99 | 1212 | 808 |
| 1264 | 945 | 182 | 122 | 1502 | 1002 |
| 1443 | 1095 | 220 | 146 | 1819 | 1212 |
| 1652 | 1240 | 241 | 161 | 2003 | 1335 |
| 1908 | 1444 | 291 | 194 | 2425 | 1617 |
| 2049 | 1534 | 300 | 200 | 2504 | 1669 |
| 2357 | 1779 | 362 | 242 | 3031 | 2021 |
| 2408 | 1786 | 359 | 239 | 3005 | 2003 |

Abmessungen Dimensions

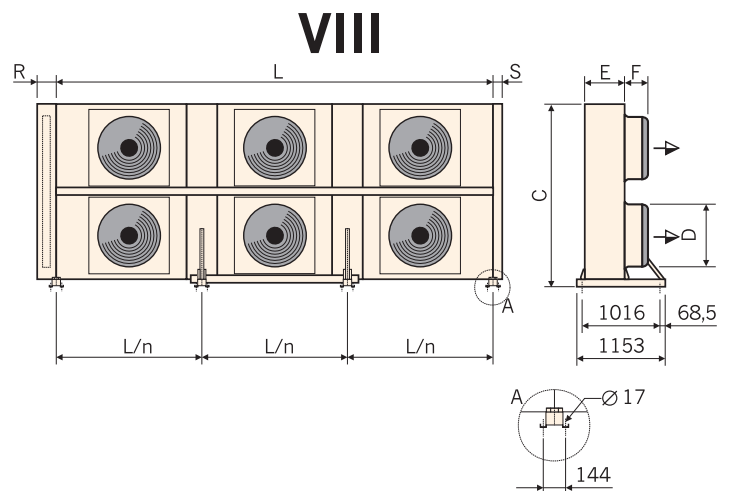
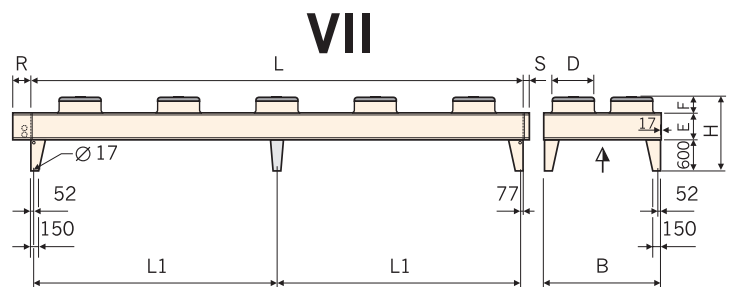
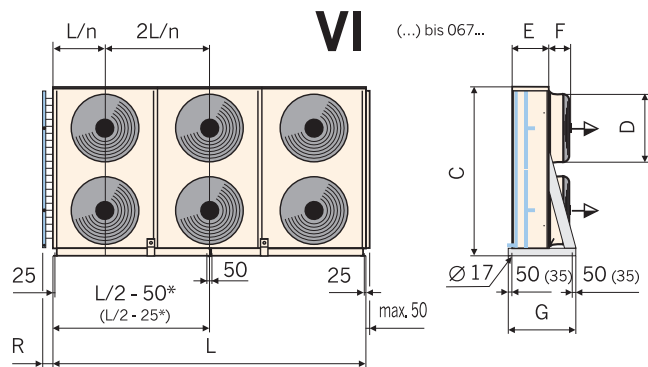
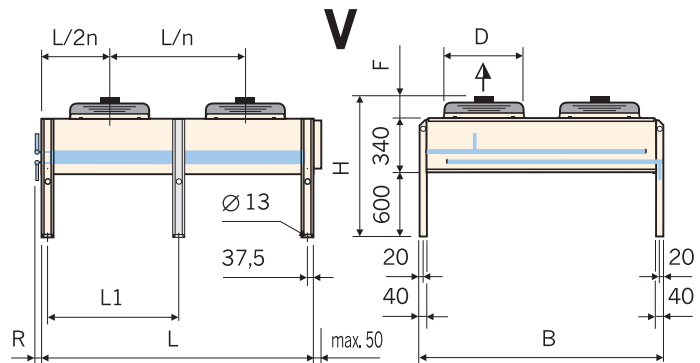
GVH / GVV Ausführungen GVH / GVV Design

| Abmessungen Dimensions | | | | | | | | Anzahl der FüÙe No. of feet | Ausführung Construction |
|---------------------------|-----|------|------|-----|-----|------|------|--------------------------------|----------------------------|
| GVH | | | | GVV | | | | | |
| L | R | B | H | L1 | E | C | G | | |
| mm | mm | mm | mm | mm | mm | mm | mm | | |
| 1850 | 130 | 1695 | 1150 | — | 340 | 1725 | 1230 | 4 | V / VI |
| 2650 | 130 | 1695 | 1150 | — | 340 | 1725 | 1230 | 4 | V / VI |
| 2775 | 130 | 1695 | 1150 | — | 340 | 1725 | 1230 | 4 | V / VI |
| 3975 | 130 | 1695 | 1150 | — | 340 | 1725 | 1230 | 4 | V / VI |

| | | | | | | | | | |
|------|-----|------|------|------|-----|------|------|---|--------|
| 1850 | 130 | 2195 | 1150 | — | 340 | 2225 | 1230 | 4 | V / VI |
| 2250 | 130 | 2195 | 1150 | — | 340 | 2225 | 1230 | 4 | V / VI |
| 2650 | 130 | 2195 | 1150 | — | 340 | 2225 | 1230 | 4 | V / VI |
| 2775 | 130 | 2195 | 1150 | — | 340 | 2225 | 1230 | 4 | V / VI |
| 3375 | 130 | 2195 | 1150 | — | 340 | 2225 | 1230 | 4 | V / VI |
| 3975 | 130 | 2195 | 1150 | — | 340 | 2225 | 1230 | 4 | V / VI |
| 4500 | 130 | 2195 | 1150 | 2215 | 340 | 2225 | 1230 | 6 | V / VI |

| | | | | | | | | | |
|-------|-----|------|------|------|-----|------|------|---|----------|
| 3800 | 350 | 2291 | 1480 | 3696 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 4600 | 350 | 2291 | 1480 | 4496 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 5700 | 350 | 2291 | 1480 | 5596 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 6900 | 350 | 2291 | 1480 | 6796 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 7600 | 350 | 2291 | 1480 | 7496 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 9200 | 350 | 2291 | 1480 | 9096 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 9500 | 350 | 2291 | 1480 | 4698 | 520 | 2391 | 1153 | 6 | VII/VIII |
| 11500 | 350 | 2291 | 1480 | 5698 | 520 | 2391 | 1153 | 6 | VII/VIII |
| 11400 | 350 | 2291 | 1480 | 5648 | 520 | 2391 | 1153 | 6 | VII/VIII |

| | | | | | | | | | |
|-------|-----|------|------|------|-----|------|------|---|----------|
| 3800 | 350 | 2291 | 1480 | 3696 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 4600 | 350 | 2291 | 1480 | 4496 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 5700 | 350 | 2291 | 1480 | 5596 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 6900 | 350 | 2291 | 1480 | 6796 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 7600 | 350 | 2291 | 1480 | 7496 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 9200 | 350 | 2291 | 1480 | 9096 | 520 | 2391 | 1153 | 4 | VII/VIII |
| 9500 | 350 | 2291 | 1480 | 4698 | 520 | 2391 | 1153 | 6 | VII/VIII |
| 11500 | 350 | 2291 | 1480 | 5698 | 520 | 2391 | 1153 | 6 | VII/VIII |
| 11400 | 350 | 2291 | 1480 | 5648 | 520 | 2391 | 1153 | 6 | VII/VIII |



* Zusätzliche Schiene zur Gerätebefestigung für Typ 067./2x4
* Additional rail for mounting the unit type 067./2x4

n = Anzahl Ventilatoren
n = Number of fans

Bei SchwingmetallfüÙen vergrößern sich die AufstellmaÙe „H“ und „C“
When using vibration dampers, the setting-up dimensions „H“ and „C“ (height) increase

Anschlüsse

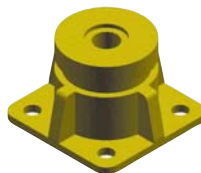
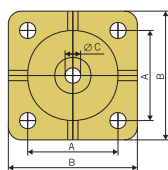
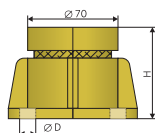
Connections

| Standard Anschlußsystem Standard connection system | | |
|-------------------------------------------------------|-------------------|--------------------|
| Verflüssigerleistung Condenser capacity | Eintritt Inlet | Austritt Outlet |
| kW | Ø mm | Ø mm |
| 0 – 18 | 16 | 16 |
| 18 – 24 | 18 | 18 |
| 24 – 37 | 22 | 22 |
| 37 – 58 | 28 | 28 |
| 58 – 95 | 35 | 35 |
| 95 – 142 | 42 | 42 |

| Standard Anschlußsystem Standard connection system | | |
|-------------------------------------------------------|-------------------|--------------------|
| Verflüssigerleistung Condenser capacity | Eintritt Inlet | Austritt Outlet |
| kW | Ø mm | Ø mm |
| 142 – 233 | 54 | 54 |
| 233 – 324 | 64 | 64 |
| 324 – 471 | 76 | 76 |
| 471 – 640 | 89 | 89 |
| 640 – 942 | 2 × 76 | 2 × 76 |
| 942 – 1280 | 2 × 89 | 2 × 89 |

Schwingmetallfüße (Zubehör)

Vibration dampers (Accessories)



| Typ Model | Belastung Load | H mm | A mm | B mm | C mm | D mm | Gewicht Weight kg |
|--------------|-------------------|---------|---------|---------|---------|---------|-------------------------|
| FM 1 | bis 250 kg | 50 | 64 | 80 | M12 | 8,2 | 0,5 |
| FM 2 | bis 900 kg | 71 | 70 | 100 | M16 | 12,5 | 1,3 |

Ventilatorabmessungen

Fan dimensions

| Typ Model | Abmessungen Dimensions | |
|----------------------------|---------------------------|-----|
| | D | F |
| | mm | mm |
| GVH/V 047.../... N bis S | 450 | 150 |
| GVH/V 052.../... N bis E | 500 | 200 |
| GVH/V 067.../... N bis E | 650 | 210 |
| GVH/V 090.1.../... N bis E | 800 | 300 |
| GVH/V 090.1.../... N bis E | 900 | 340 |

Elektrische Daten je Ventilator 230 V 1~ 50 Hz

Electrical data each fan 230 V 1~ 50 Hz

| Größe Size | Leistung Capacity W | Stromstärke Current A | Drehzahl Speed min ⁻¹ |
|-------------------|---------------------------|-----------------------------|----------------------------------------|
| GVH/V 047.../...N | 390 | 1,90 | 1400 |
| GVH/V 047.../...L | 180 | 0,80 | 910 |
| GVH/V 047.../...S | 120 | 0,51 | 780 |
| GVH/V 052.../...N | 770 | 3,40 | 1280 |
| GVH/V 052.../...L | 290 | 1,25 | 890 |
| GVH/V 052.../...S | 140 | 0,65 | 650 |
| GVH/V 067.../...L | 700 | 3,40 | 870 |
| GVH/V 067.../...S | 400 | 1,75 | 680 |
| GVH/V 067.../...E | 250 | 1,20 | 550 |

Drehzahlregelung Schaltschränke

Speed control Control panels



Drehzahlregler und Schaltschränke finden Sie im Güntner Katalog, Register 12 und im Güntner Product Calculator, GPC. You can find speed controllers and control panels in our Güntner catalogue under index 12 and in the Güntner Product Calculator, GPC.

Leistungsumrechnung

Temperatur und
Aufstellhöhe

Capacity calculation

Temperature and
installation altitude

Diagramm zur Bestimmung der Verflüssiger-Nennleistung (Katalog) in Abhängigkeit von t_c und t_{L1} bei einer Heißgasüberhitzung von $\Delta t_h = 25\text{ K}$

$$\dot{Q}_N = \frac{\dot{Q}}{f_2 \cdot f_3 \cdot f_4}$$

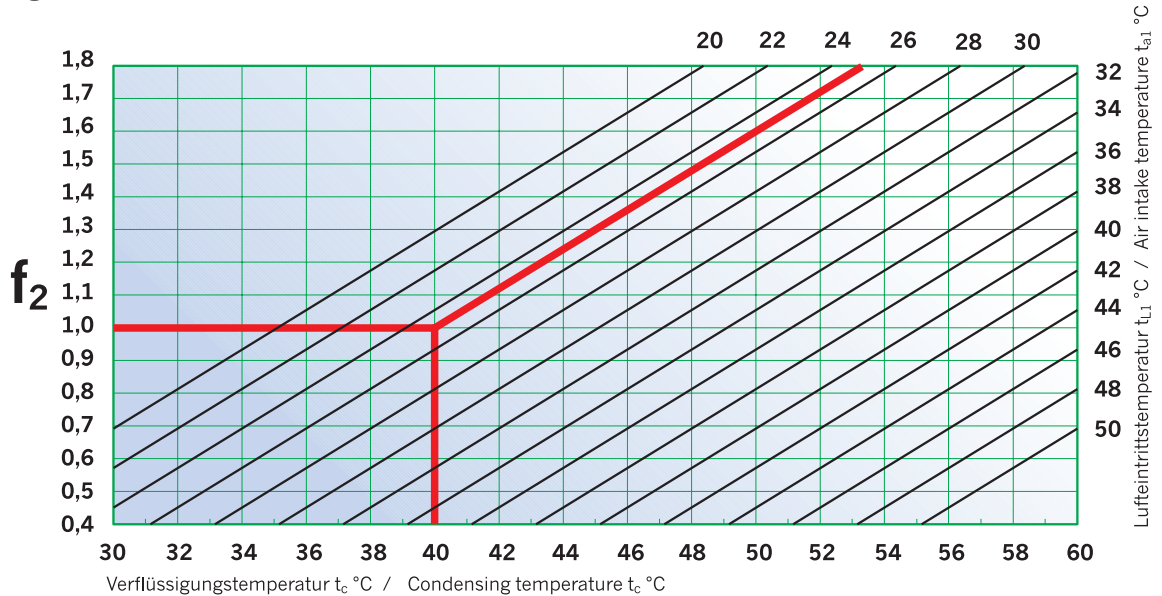
\dot{Q}_N = Verflüssiger-Nennleistung (Katalogangabe)

\dot{Q}_N = Nominal condensing capacity

Genauere Daten sind nur durch Berechnung über den Gütner Product Calculator möglich.

Exact data can only be obtained by using the Gütner Product Calculator.

Diagram for calculation of nominal condensing capacity depending on t_c and t_{a1} for hot gas superheating of $\Delta t_h = 25\text{ K}$



Umrechnung nur näherungsweise. Einfluß des Druckabfalls kann nur mit GPC berücksichtigt werden.

Only approximate conversion values. Effect of pressure drop can only be taken into consideration with GPC.

\dot{Q}_N (Heißgastemp./hot gas temp., t_c , t_{L1}/t_{a1} , Unterkühlung/Subcooling, H → Gütner Product Calculator

Korrekturfaktoren

Coefficients of correction

| | | Korrekturfaktor zur Bestimmung der Verflüssiger-Nennleistung (Katalog) in Abhängigkeit von der Aufstellhöhe. | | | | | |
|----------------------------------------------|----------------------|---------------------------------------------------------------------------------------------------------------------|------|------|------|------|------|
| | | Coefficient of correction for calculation of nominal condensing capacity depending on the installation altitude. | | | | | |
| Meter über NN Meters above NN (Sea level) | H | 0 | 500 | 1000 | 1500 | 2000 | 2500 |
| Ventilator / Fan ≤ Ø 650 | f₃ | 1,0 | 0,97 | 0,94 | 0,91 | 0,88 | 0,85 |
| Ventilator / Fan ≥ Ø 800 | f₃ | 1,0 | 0,96 | 0,91 | 0,87 | 0,83 | 0,80 |

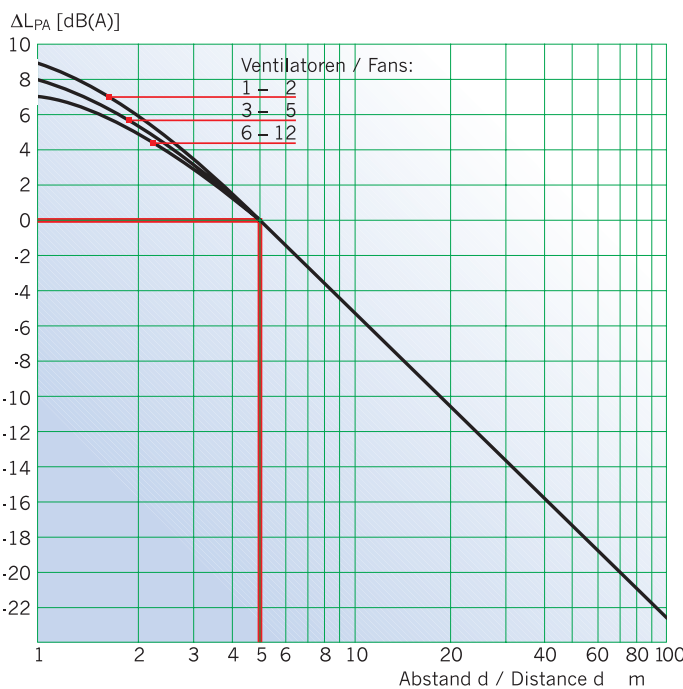
Zur Ermittlung des Schalldruckpegels sind die Schalleistungen der einzelnen Ventilatoren entsprechend der räumlichen Anordnung zu Grunde zu legen und die Schallausbreitung unter Berücksichtigung der örtlichen und räumlichen Verhältnisse zu bestimmen.

Schalt-, Anlauf und Regelgeräusche sind nicht berücksichtigt.

For the calculation of the sound pressure level, take the sound power of the individual fans acc. to their position, and calculate the sound propagation considering the local and ambient conditions.

Speed change, start up and control noises are not taken into account.

| Ventilator- typ Fan type | Drehzahl Speed | | Schalleistungspegel L_{wa} — pro Oktave — pro Ventilator Sound power level L_{wa} — per octave — per fan | | | | | | | | | | | | | | L_{wa} total | | | |
|---------------------------------------|-------------------|------|-----------------------------------------------------------------------------------------------------------------|------------|--------------------|-------------|--------------------|-------------|--------------------|-------------|---------------------|--------------|---------------------|--------------|---------------------|--------------|---------------------|--------------|----------|----|
| | Δ | Y | 63 Hz Δ | 63 Hz Y | 125 Hz Δ | 125 Hz Y | 250 Hz Δ | 250 Hz Y | 500 Hz Δ | 500 Hz Y | 1000 Hz Δ | 1000 Hz Y | 2000 Hz Δ | 2000 Hz Y | 4000 Hz Δ | 4000 Hz Y | 8000 Hz Δ | 8000 Hz Y | Δ | Y |
| 450 N | 1365 | - | 50 | - | 60 | - | 68 | - | 71 | - | 75 | - | 71 | - | 64 | - | 55 | - | 78 | - |
| 450 L | 900 | - | 46 | - | 56 | - | 59 | - | 62 | - | 64 | - | 60 | - | 52 | - | 43 | - | 67 | - |
| 450 S | 700 | - | 38 | - | 49 | - | 53 | - | 57 | - | 57 | - | 53 | - | 45 | - | 34 | - | 62 | - |
| 500 N | 1340 | 1000 | 42 | 39 | 69 | 58 | 68 | 62 | 72 | 67 | 76 | 70 | 74 | 67 | 68 | 61 | 58 | 51 | 80 | 74 |
| 500 L | 890 | 690 | 36 | 44 | 54 | 49 | 59 | 54 | 62 | 57 | 65 | 59 | 64 | 56 | 56 | 49 | 45 | 38 | 70 | 63 |
| 500 S | 680 | 530 | 44 | 38 | 47 | 45 | 52 | 48 | 55 | 51 | 57 | 52 | 54 | 48 | 46 | 41 | 36 | 33 | 62 | 58 |
| 500 E | 580 | 350 | 41 | 33 | 45 | 39 | 49 | 39 | 52 | 41 | 53 | 39 | 49 | 37 | 42 | 33 | 33 | 27 | 59 | 47 |
| 650 N | 1340 | 1000 | 65 | 58 | 77 | 67 | 79 | 75 | 85 | 78 | 85 | 78 | 84 | 76 | 78 | 69 | 65 | 57 | 90 | 83 |
| 650 L | 870 | 650 | 56 | 50 | 62 | 59 | 71 | 65 | 72 | 65 | 74 | 68 | 71 | 64 | 64 | 58 | 51 | 44 | 78 | 72 |
| 650 S | 650 | 490 | 50 | 42 | 58 | 52 | 64 | 57 | 63 | 58 | 66 | 60 | 62 | 54 | 54 | 46 | 40 | 9 | 71 | 64 |
| 650 E | 560 | 350 | 47 | 43 | 54 | 46 | 61 | 48 | 61 | 50 | 63 | 50 | 58 | 45 | 50 | 35 | 36 | 9 | 67 | 55 |
| 800 N | 880 | 660 | 54 | 41 | 69 | 56 | 67 | 62 | 74 | 69 | 78 | 74 | 79 | 72 | 72 | 64 | 62 | 54 | 83 | 77 |
| 800 M | 760 | 480 | 50 | 45 | 62 | 50 | 67 | 55 | 72 | 61 | 77 | 66 | 74 | 59 | 65 | 52 | 59 | 44 | 80 | 68 |
| 800 L | 680 | 530 | 42 | 35 | 57 | 50 | 62 | 58 | 69 | 64 | 74 | 69 | 72 | 64 | 65 | 56 | 55 | 46 | 77 | 70 |
| 800 S | 440 | 340 | 32 | 27 | 47 | 42 | 57 | 48 | 59 | 54 | 63 | 56 | 58 | 51 | 50 | 43 | 39 | 34 | 66 | 59 |
| 800 E | 380 | 240 | 32 | 27 | 47 | 42 | 54 | 44 | 57 | 47 | 59 | 48 | 55 | 42 | 47 | 34 | 35 | 26 | 63 | 52 |
| 900 N | 890 | 700 | 56 | 58 | 72 | 70 | 79 | 73 | 82 | 76 | 84 | 79 | 82 | 76 | 79 | 73 | 73 | 66 | 89 | 83 |
| 900 M | 760 | 500 | 51 | 59 | 67 | 58 | 73 | 66 | 78 | 69 | 81 | 74 | 71 | 73 | 76 | 68 | 65 | 63 | 86 | 78 |
| 900 L | 600 | 370 | 54 | 40 | 62 | 52 | 67 | 58 | 69 | 57 | 73 | 60 | 69 | 55 | 62 | 46 | 52 | 35 | 76 | 64 |
| 900 S | 440 | 350 | 42 | 41 | 52 | 49 | 63 | 59 | 64 | 61 | 71 | 64 | 64 | 57 | 56 | 49 | 47 | 41 | 73 | 67 |
| 900 E | 390 | 250 | 40 | 40 | 50 | 47 | 57 | 52 | 63 | 54 | 66 | 54 | 60 | 47 | 51 | 39 | 43 | 33 | 69 | 59 |



| Summierung der Schalleistungen bei mehreren Ventilatoren. Sum of noise powers in case of several fans. | |
|-----------------------------------------------------------------------------------------------------------|----------------------|
| Anzahl der Ventilatoren Number of fans | 2 3 4 5 6 8 10 12 14 |
| Schallzunahme Sound increase ΔdB | 3 5 6 7 8 9 10 11 12 |

*Der angegebene Schalldruckpegel ist der (nach EN 13487) rechnerisch ermittelte Schalldruckpegel auf einer zur Referenzumhüllenden in 5 m Abstand parallelen Quaderfläche. Das Nomogramm zur Bestimmung der Schalldruckpegeländerung ΔL_{PA} basiert auf der Änderung des Abstandes d eines quaderförmig umhüllenden Bereiches von der Referenzumhüllenden. (Standardverfahren zur Berechnung des Schalldruckpegels; Anhang C; EN 13487)

*The sound pressure level is based on the calculation (according to EN 13478) of the sound pressure level on the surface of a cuboid area which is at 5 meters distance and parallel to the referential envelope of the sound source. The nomogram for the determination of the sound pressure level change ΔL_{PA} is based on shifting the distance d of the cuboid area to the referential envelope. (Standard procedure for the calculation of the sound pressure level; Annex C EN 13487)

Korrekturfaktoren nach Eurovent

Correction factors acc. on Eurovent

Korrekturfaktoren (f_R)
für andere Kältemittel
nach Eurovent

| Kältemittel / Refrigerant | f_R Faktor / Factor |
|---------------------------|--------------------------|
| R134a | 0.93 |
| R22 | 0.96 |

Correction factors (f_R)
for other refrigerants
acc. to Eurovent

Verflüssigerleistung \dot{Q}_K = nominale Verflüssigerleistung \dot{Q}_K × Korrekturfaktor f_R
Condenser capacity \dot{Q}_K = nominal condenser capacity \dot{Q}_K × correction factor f_R

Korrekturfaktoren (f_M)
für andere Lamellen-
materialien nach Eurovent

| Lamellenmaterial / Fin material | f_M Faktor / Factor |
|------------------------------------------|--------------------------|
| Aluminium | 1 |
| Aluminium beschichtet / Coated Aluminium | 0.97 |
| Kupfer / Copper | 1.03 |

Correction factors (f_M)
for other fin materials
acc. to Eurovent

Kälteleistung \dot{Q}_0 = nominale Kälteleistung \dot{Q}_0 × Korrekturfaktor f_M
Cooling capacity \dot{Q}_0 = nominal cooling capacity \dot{Q}_0 × correction factor f_M

Güntner Product Calculator die bessere Wahl

Güntner Product Calculator the very best choice

Für eine genaue thermodynamische Auslegung mit anderen Betriebsparametern (auch für andere Kältemittel, geodätische Höhe und epoxy-beschichtete Lamelle!) empfehlen wir die Verwendung des Güntner Product Calculator. Die Software ermöglicht auch die sichere, einfache Auslegung des passenden Schaltschranks mit Steuer- und Regelkomponenten.

We recommend that you use the Güntner Product Calculator for an exact thermodynamic calculation in different ranges (for other refrigerants, heights above sea level and epoxy coated fin). The software also makes it possible to produce a safe, simple control panel design including control and actuation components.

Kältemittel
Refrigerant

Lufttemperatur
Air temperature

geodätische Höhe
height above sea
level

Epoxy-beschichtete
Lamellen
Epoxy coated fins
Schalldruckpegel
Sound pressure
level