



Van der Graaf
Power Transmission Equipment



TM113B25

Drummotor

Product information

www.vandergraafpte.nl

Selection table TM113B25

| TYPE | Power (kW) | Beltspeed at 50 Hz (m/s) Beltpull (N) | | | | | | | | | | Min. L (mm) Design B | Full load curr. at 400 V/50 Hz (A) | Weight L=310 (kg) |
|---------|------------|--|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|---------------|-------------------------|---|-------------------------|
| | | 4,40 120 | 4,00 130 | 3,20 165 | 2,80 185 | 2,50 210 | 2,20 240 | 1,90 270 | | | | | | |
| 275 Z | 0,55 | 4,40 120 | 4,00 130 | 3,20 165 | 2,80 185 | 2,50 210 | 2,20 240 | 1,90 270 | | | | 310 | 1,2 | 16 |
| 275 PL2 | | 1,70 300 | 1,50 335 | 1,40 360 | 1,30 390 | 1,10 460 | 1,00 505 | 0,90 560 | 0,80 635 | 0,65 780 | 0,55 920 | | | |
| 205 Z | 1,50 | 4,40 80 | 4,00 90 | 3,20 110 | 2,80 125 | 2,50 140 | 2,20 160 | 1,90 185 | 1,50 235 | 1,20 290 | | 310 | 0,8 | 16 |
| 205 PL2 | | 1,70 200 | 1,40 240 | 1,30 260 | 1,10 310 | 1,00 340 | 0,90 375 | 0,80 425 | 0,65 525 | 0,55 620 | | | | |
| 405 Z | 0,37 | 2,20 160 | 2,00 175 | 1,60 220 | 1,40 250 | 1,25 280 | 1,10 320 | 0,95 370 | 0,75 470 | 0,60 585 | | 360 | 1,35 | 16 |
| 405 PL2 | | 0,85 400 | 0,70 485 | 0,65 525 | 0,55 620 | 0,50 680 | 0,45 755 | 0,40 850 | 0,34 1000 | 0,27 1150 | | | | |
| 234 Z | 0,25 | 4,40 55 | 4,00 60 | 3,20 75 | 2,80 85 | 2,50 95 | 2,20 110 | 1,90 125 | 1,50 160 | 1,20 200 | | 260 | 0,65 | 16 |
| 234 PL2 | | 1,70 135 | 1,40 165 | 1,30 175 | 1,10 210 | 1,00 230 | 0,90 255 | 0,80 290 | 0,65 355 | 0,55 420 | | | | |
| 434 Z | 0,25 | 2,20 110 | 2,00 120 | 1,60 150 | 1,40 170 | 1,25 190 | 1,10 215 | 0,95 250 | 0,75 315 | 0,60 395 | | 310 | 0,7 | 16 |
| 434 PL2 | | 0,85 270 | 0,70 330 | 0,65 355 | 0,55 420 | 0,50 460 | 0,45 510 | 0,40 575 | 0,34 675 | 0,27 850 | | | | |
| 634 PL2 | 0,25 | 0,29 795 | 0,25 920 | 0,21 1095 | 0,17 1150 | | | | | | | 360 | 0,95 | 16 |
| 425 Z | 0,18 | 1,60 105 | 1,40 120 | 1,25 135 | 1,10 155 | 0,95 180 | 0,75 230 | 0,60 285 | | | | 275 | 0,55 | 16 |
| 425 PL2 | | 0,85 195 | 0,70 235 | 0,65 255 | 0,55 300 | 0,50 330 | 0,45 370 | 0,40 415 | 0,34 485 | 0,27 615 | | | | |
| 425 PL3 | | 0,13 1150 | 0,11 1150 | | | | | | | | | 310 | | |
| 625 PL2 | 0,18 | 0,29 570 | 0,25 660 | 0,21 790 | 0,17 975 | | | | | | | 310 | 0,65 | 16 |
| 416 Z | 0,12 | 0,10 105 | 0,95 120 | 0,75 150 | 0,60 190 | | | | | | | 260 | 0,4 | 16 |
| 416 PL2 | | 0,85 130 | 0,70 160 | 0,65 170 | 0,55 200 | 0,50 220 | 0,45 245 | 0,40 275 | 0,34 325 | 0,27 410 | | | | |
| 416 PL3 | | 0,21 500 | 0,18 585 | 0,16 660 | 0,13 810 | 0,11 960 | 0,07 1150 | | | | | 310 | | |
| 416 PL4 | | 0,051 1150 | 0,047 1150 | 0,043 1150 | 0,039 1150 | 0,033 1150 | 0,031 1150 | 0,027 1150 | 0,025 1150 | 0,021 1150 | 0,016 1150 | 360 | | |
| 416 PL5 | | 0,014 1150 | 0,009 1150 | 0,008 1150 | | | | | | | | | | |

Available standard facewidth's: 260 - 275 - 310 - 360 - 410 - 460 - 510 - 560 - 610 - 660 - 710 - 760 - 810 - 860 mm

Minimum facewidth can deviate, see cable exit options.






The total weight of a drummotor grows approx. 1,8 kg per 100 mm

When an electro-mechanical brake is fitted, the minimum facewidth is increased by 75 mm

Available torque Nm: (Beltpull N x Drumdiameter m) / 2

Beltpull/-torque max. : 1150 N / 65 Nm (I_{max} upon request)

Options

| | Specification | Standard | Optional |
|--|--|-------------------|---|
|  <h2>CONSTRUCTION</h2> | Shafts and bolts | Mild steel | Stainless steel |
| | Endflanges | Cast iron | Stainless steel |
| | Shell | Mild steel | Stainless steel |
| | Junctionbox | Polyamide | Cast iron or stainless steel |
| | Cable | | Shielded or non-shielded |
| | Sealing mild steel | RB | RBS, HD-1 |
| | Sealing stainless steel | CR | FS, HD-1, HD-2 |
|  <h2>SHELL</h2> | Crowned | • | |
| | Cylindrical | | • |
| | Balanced | | • |
| | Lagging, cold vulcanised | | • |
| | Lagging, hot vulcanised | | • |
| | Lagging, FDA approved | | • |
| | Fitted with grooves, patterns | | • |
| | Sprockets | | • |
|  <h2>ELECTRO MOTOR</h2> | Three-phase asynchronous | • | |
| | Power supply | 230/400 V - 50 Hz | Other voltages and frequencies on request |
| | Single phase (230 V 50Hz) | | • |
| | Insulation class | F | • |
| | Thermal protection | | Bi-metal or thermistor |
| | Run by frequency inverter | • | |
|  <h2>OTHER OPTIONS</h2> | Food grade oil | | • |
| | Backstop, mechanical | | • |
| | Brake, electro mechanical | | • |
| | Inclined or vertical position | | • |
| | Other facewidth's | | • |
| | Different shaft designs | | • |
| | Encoder or sensorbearing in drum motor | | Sensorbearing |
| | Sensorbearing in tail drum | | • |
|  <h2>CERTIFICATES</h2> | CE | • | |
| | UL | | • |
| | CSA | | • |
| | ATEX zone 22, dust | | • |
| | IP69K | | • |

Our drummotors, an overview

| Drummotor type | Drum diameter (mm) | Shaft diameter (mm) | Power (kW) | Speed (m/s) | Beltpull (N) |
|----------------|--------------------|---------------------|--------------|--------------|--------------|
| TM80B20 | 80 | 20 | 0,07 - 0,12 | 0,11 - 1,15 | 598 |
| TM100B25 | 100 | 25 | 0,08 - 0,37 | 0,007 - 3,60 | 1300 |
| TM113B25 | 113 | 25 | 0,12 - 0,55 | 0,008 - 4,40 | 1150 |
| TM127_25 | 127 | 25 | 0,25 - 1,10 | 0,016 - 2,60 | 4100 |
| TM138_25 | 138 | 25 | 0,25 - 1,10 | 0,017 - 2,80 | 3800 |
| TM160_25 | 160 | 25 | 0,25 - 0,75 | 0,31 - 3,30 | 1135 |
| TM160_30 | 160 | 30 | 0,25 - 2,20 | 0,11 - 4,00 | 3000 |
| TM215_30 | 215 | 30 | 0,25 - 2,20 | 0,27 - 5,30 | 1900 |
| TM215_40 | 215 | 40 | 0,75 - 5,5 | 0,17 - 4,70 | 5115 |
| TM215B50 | 215 | 50 | 1,5 - 7,0 | 0,18 - 0,62 | 11500 |
| TM273_40 | 273 | 40 | 0,75 - 5,50 | 0,21 - 5,00 | 4355 |
| TM315_40 | 315 | 40 | 0,75 - 5,50 | 0,40 - 5,20 | 4020 |
| TM315_50 | 315 | 50 | 2,2 - 11,0 | 0,34 - 4,40 | 7125 |
| TM315B60 | 315 | 60 | 3,0 - 11,0 | 0,22 - 1,40 | 12790 |
| TM400_50 | 400 | 50 | 2,2 - 11,0 | 0,40 - 4,80 | 5700 |
| TM400_60 | 400 | 60 | 3,0 - 22,0 | 0,45 - 4,20 | 10960 |
| TM500_60 | 500 | 60 | 3,0 - 22,0 | 0,55 - 4,40 | 8905 |
| TM500A75 | 500 | 75 | 15,0 - 30,0 | 1,00 - 3,20 | 14250 |
| TM500A100 | 500 | 100 | 15,0 - 30,0 | 0,55 - 1,25 | 25300 |
| TM620A75 | 620 | 75 | 15,0 - 30,0 | 1,25 - 3,90 | 11400 |
| TM630A100 | 630 | 100 | 37,0 - 55,0 | 1,60 - 4,00 | 21970 |
| TM800A100 | 800 | 100 | 37,0 - 55,0 | 2,00 - 5,10 | 17575 |
| TM800A130 | 800 | 130 | 55,0 - 132,0 | 2,00 - 4,50 | 35625 |

Contact us

Van der Graaf B.V.
De Weijert 14
8325 EM Vollenhove
The Netherlands
Tel.: 0031 527 241 441
sales@vandergraafpte.nl

Representatives

Check our website for your regional representative
www.vandergraafpte.nl