

Projektnummer: ---

| | Zeichen | Einheit | Wert |
|--|---------|---------|------|
|--|---------|---------|------|

Nenndaten Luftkühlung

| | | | |
|---------------------------|----------------------|------------------|------|
| Nennmoment | M _{NennLk} | Nm | 412 |
| Nennstrom | I _{NennLk} | A _{eff} | 15,1 |
| Nenn Drehzahl | n _{NennLk} | U/min | 210 |
| abgegebene Wellenleistung | P _{NennLk} | W | 9050 |
| Verlustleistung | P _{VNennLk} | W | 815 |
| Stillstands-/ Haltemoment | M _{HaltLk} | Nm | 291 |
| Stillstands-/ Haltestrom | I _{HaltLk} | A _{eff} | 10,7 |

Nenndaten Wasserkühlung

| | | | |
|---------------------------|----------------------|------------------|-------|
| Nennmoment | M _{NennWk} | Nm | 789 |
| Nennstrom | I _{NennWk} | A _{eff} | 30,2 |
| Nenn Drehzahl | n _{NennWk} | U/min | 190 |
| abgegebene Wellenleistung | P _{NennWk} | W | 15691 |
| Verlustleistung | P _{VNennWk} | W | 2490 |
| Stillstands-/ Haltemoment | M _{HaltWk} | Nm | 558 |
| Stillstands-/ Haltestrom | I _{HaltWk} | A _{eff} | 21,3 |

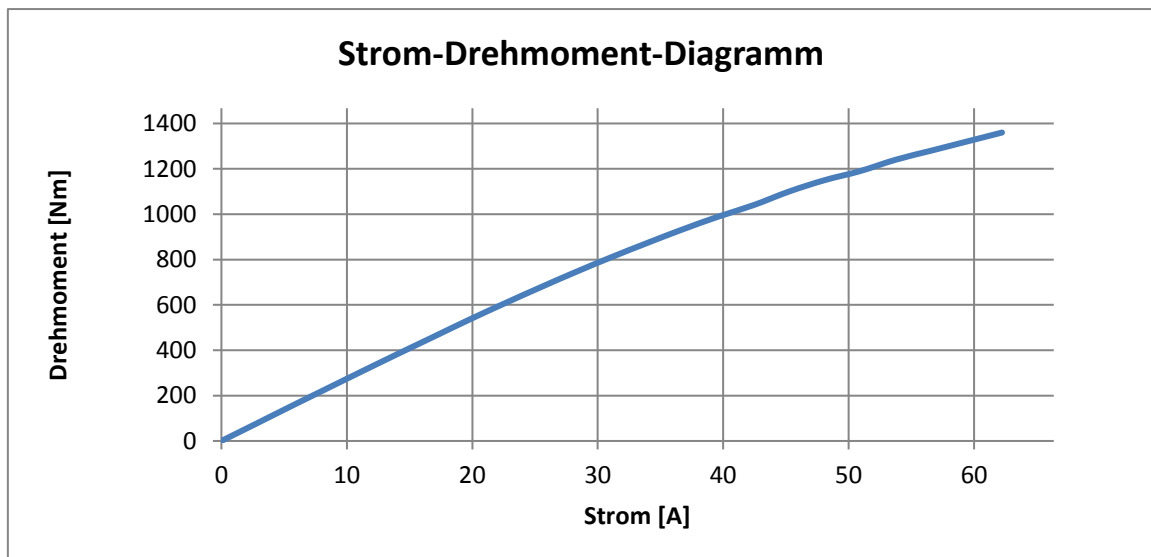
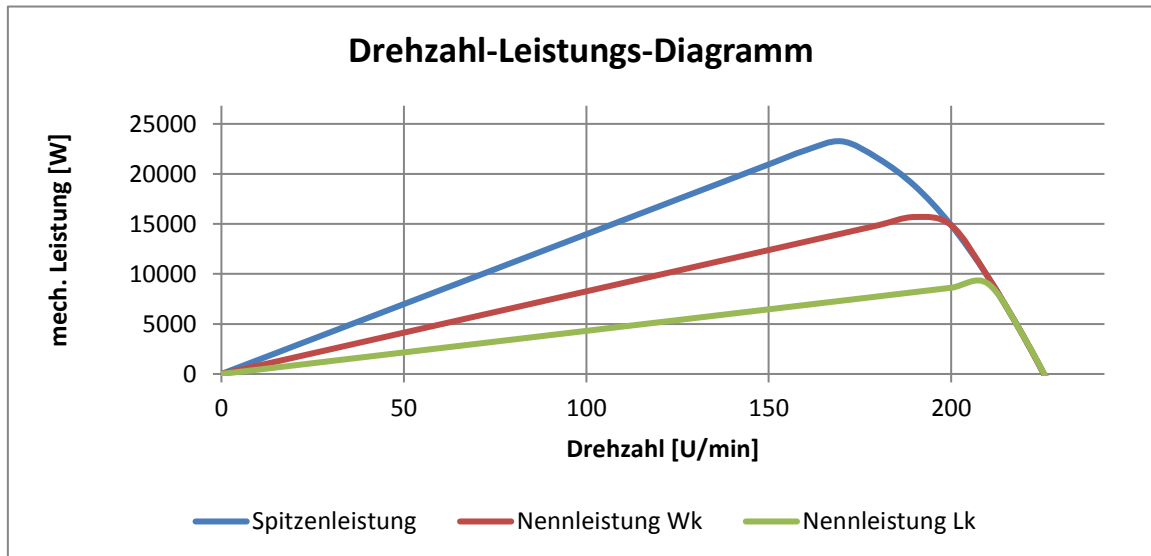
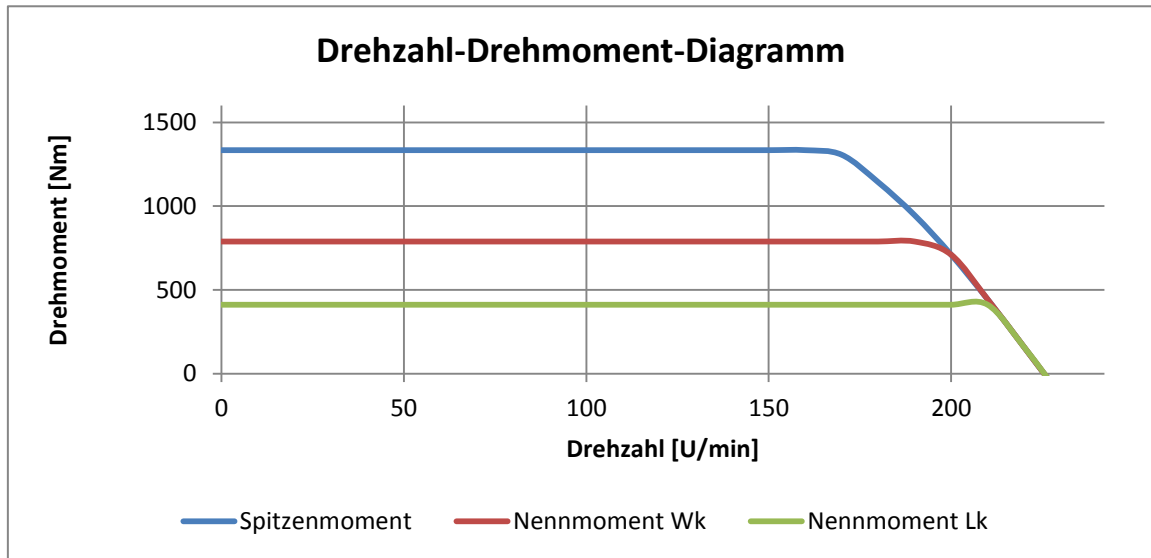
Daten bei Spitzenlast

| | | | |
|----------------------------|--------------------|------------------|-------|
| Spitzenmoment | M _{Peak} | Nm | 1334 |
| Spitzenstrom | I _{Peak} | A _{eff} | 60 |
| Drehzahl bei Spitzenmoment | n _{Peak} | U/min | 160 |
| abgegebene Wellenleistung | P _{Peak} | W | 22346 |
| Verlustleistung | P _{VPeak} | W | 9270 |

Daten

| | | | |
|-------------------------------------|-------------------|-------------------------------------|--------|
| Drehmomentkonstante | k _t | Nm/A | 27,292 |
| Spannungskonstante (Phase - Phase) | k _e | Vs/rad | 16,772 |
| | | V _{min} /U _{mdr.} | 1,756 |
| Motorkonstante | k _m | Nm/VW | 14,417 |
| Leerlaufdrehzahl | n _{Leer} | U/min | 220 |
| max. Frequenz | f _{max} | Hz | 92 |
| Zwischenkreisspannung | U _{zk} | V | 560 |
| Ø Widerstand pro Phase | R _{Ph20} | Ω | 0,834 |
| Ø Induktivität pro Phase | L _{Ph} | mH | 8,308 |
| elektr. Zeitkonstante τ=L/R | τ | ms | 9,96 |
| Polpaarzahl | n | | 25 |
| Drehmasse Rotor | J | kgm ² | 0,4067 |
| Motorgewicht ohne Gehäuse | m | kg | 43,0 |
| Statoraußendurchmesser ohne Gehäuse | d _A | mm | 298 |
| Statorinnendurchmesser | d _i | mm | 218 |
| Eisenlänge | l | mm | 125 |
| Schaltung | | | Stern |

Achten Sie darauf, dass Ihr Regler den Motornenn- und Spitzenstrom bereitstellen kann.
Eine Anpassung der Drehzahl kann nach Rücksprache erfolgen.
Auf Anfrage sind andere Zwischenkreisspannungen möglich.

Project-No.: ---

| | Symbol | Unit | Value |
|---------------------------------------|--------------------|------------------|-------|
| Rated Data free Air Convection | | | |
| Nominal Torque | T _{NomAC} | Nm | 412 |
| Nominal Current | I _{NomAC} | A _{rms} | 15,1 |
| Nominal Speed | n _{NomAC} | rpm | 210 |
| Nominal Power | P _{NomAC} | W | 9050 |
| Power Dissipation | P _{DAC} | W | 815 |
| Holding Torque | T _{HAC} | Nm | 291 |
| Holding Current | I _{HAC} | A _{rms} | 10,7 |

| | | | |
|--------------------------------|--------------------|------------------|-------|
| Rated Data Water cooled | | | |
| Nominal Torque | T _{NomWC} | Nm | 789 |
| Nominal Current | I _{NomWC} | A _{rms} | 30,2 |
| Nominal Speed | n _{NomWC} | rpm | 190 |
| Nominal Power | P _{NomWC} | W | 15691 |
| Power Dissipation | P _{dWC} | W | 2490 |
| Holding Torque | T _{HWC} | Nm | 558 |
| Holding Current | I _{HWC} | A _{rms} | 21,3 |

| | | | |
|----------------------|--------------------|------------------|-------|
| Peak Data | | | |
| Peak Torque | T _{Peak} | Nm | 1334 |
| Peak Current | I _{Peak} | A _{rms} | 60 |
| Speed at Peak Torque | n _{Peak} | rpm | 160 |
| Peak Power | P _{Peak} | W | 22346 |
| Power Dissipation | P _{DPeak} | W | 9270 |

| | | | |
|-----------------------------------|-------------------|----------------------------------|-----------------|
| Data | | | |
| Torque Constant | k _t | Nm/A | 27,292 |
| BEMF Constant (Phase - Phase) | k _e | Vs/rad V _{min} /turn | 16,772 1,756 |
| Motor Constant | k _m | Nm/√W | 14,417 |
| max. Speed | n _{max} | rpm | 220 |
| max. Frequency | f _{max} | Hz | 92 |
| DC Bus Voltage | U _{DC} | V | 560 |
| ∅ Resistance per Phase | R _{Ph20} | Ω | 0,834 |
| ∅ Inductance per Phase | L _{Ph} | mH | 8,308 |
| electr. Time Constant τ=L/R | τ | ms | 9,96 |
| Number of Polepairs | n | | 25 |
| Rotor Inertia | J | kgm ² | 0,4067 |
| Weight of Motor w/o Housing | m | kg | 43,0 |
| Outer Stator Diameter w/o Housing | d _A | mm | 298 |
| Inner Stator Diameter | d _I | mm | 218 |
| Length of Stator | l | mm | 125 |
| Winding Connection | | | Star |

Ensure that your servo drive can handle the Nominal- and Peakcurrent of the Motor.

An adjustment of the Speed can be done after consultation.

By request, other DC Bus Voltages are possible.

Date:

23.07.2014



