

1. Motor type: 3 phase, we winding, permanent magnet rotor, totally enclosed, non-ventilated. 8 2. Motor type: 8 3. Operating Speed, max 2560 RPM 4. Base speed (max speed at peak torque), Ref. 200 RPM 5. Operating Voltage at base speed: 200 VAC RMS 6. Continuous stall torque, max, it max winding temperature in a 40C ambient: 44 Mm (389 Ib-in) 1. Winding temperature, max, in a 40C ambient: 44 Mm (389 Ib-in) 1. Winding temperature, max, in a 40C ambient: 59.67 Amps 0 to peak 9. Heatsink size, aluminum, attached to front mounting flange for continuous torque specifications: 59.67 Amps 0 to peak 11. Peak stall forque, max; 128 Z5 Amps 0 to peak 2000 12. Rated Speed (Speed at max continous power) 2000 7.00 kW (9.38 hp) 13. Continuous orque, max, at rated speed: 41.9 Amps 0 to peak 40.0 ANR MS 14. Continuous orque, max, at rated speed: 150.C (Cass F) 150.C (Cass F) 14. Continuous orque, max, at rated speed: 40.0 ANR MS 150.C (Cass F) 15. Continuous orque, max, at rated speed: 40.0 ANR MS 150.C (Cass F) 16. Operating voltage, et base to phase at 25C + 5C: 107 VKRPM 0 to peak 20.0 FTF 17. Instuation class:	General Specifications:									
3. Operating Speed max. Z850 RPM 4. Base speed max speed at peak torque), Ref: Z200 RPM 5. Operating voltage at base speed: Z20 VAC RMS 6. Continuous stall torque, max, at max winding temperature in a 40C ambient: 44 Nm (289 lb-in) 11. Winding temperature, max, in a 40C ambient: 59 67 Amps 0 to peak 8. Continuous stall current, max. 59 67 Amps 0 to peak 9. Heats ink size, aluminum, matched to front mounting flange for continuous torque specifications: 305 x 305 x 25 x 25 Amm (12 x 12 x 1.0 inch) 10. Peak stall torque, max; 44 Nm (249 lb-in) 20.25 Amps 0 to peak 11. Peak stall ournent, max. 28.25 Amps 0 to peak 28.25 Amps 0 to peak 12. Rated Speed (Speed at max continuous hower) 2000 2000 2000 13. Continuous output rating, max at rated speed: 33.4 Nm (249 lb-in) 34.4 Nm (249 lb-in) 14. Continuous output rating, max at rated speed: 119.2 Amps 0 to peak 20.40 VAC RMS 15. Continuous output rating, max at rated speed: 128.25 Amps 0 to peak 240 VAC RMS 16. Operating voltage, Ref (Not for direct connection to AC line): 128.5 (267 lb-in) 155C (Class F) 18. Housing temperature, max. 155C (27 lb-in) 155C (27 lb-in) 155C (27 lb-in)	1. Motor type: 3 phase, wye winding, permanent magnet rotor, totally en	nclosed, non-ventilated.								
A base speed (max speed a law speed a law speed (max speed max speed ma	2. Motor poles:			8						
A base speed (max speed a law speed a law speed (max speed max speed ma	3. Operating Speed, max			2650 RPM						
Continuous stall torque, max, at max winding temperature in a 40C ambient: 44 Nm (389 lb-in) 45 Nm (743 lb-in) 45 Nm (743 lb-in) 46 Nm (743 lb-in) 47 Nm (24 lb-in) 47 Nm (24 lb-in) 48 Nm (743 lb-in) 49 Amps 0 to peak 7.00 kW (0.38 hp) 3. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 3. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hp) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hm) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hm) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hm) 4. Continuous output antig max at rated speed: 7.00 kW (0.38 hm) 4. Audble noise to phase at 25C +/- 5C: 7.00 kW (0.38 hm) 15C (Class F) 15C (Class F) 15K (class F)	4. Base speed (max speed at peak torque), Ref:			2200 RPM						
6. Continuous stall urgue, max, at max winding temperature in a 40C ambient: 44 Nm (388 bi-in) 7. Winding temperature, max, in a 40C ambient: 59.67 Amps 0 to peak 8. Continuous stall current, max; 59.67 Amps 0 to peak 9. Heatsink size, aluminum, attached to front mounting flange for continuous torque specifications: 305 x 305 x 25 Amm (12 x 12 x 1.0 inch) 10. Peak stall torque, max, attack specifications: 305 x 305 x 25 Amm (12 x 12 x 1.0 inch) 11. Peak stall current, max; 128.25 Amps 0 to peak 12. Rated Speed (Speed at max continuous output rated speed: 7.00 kW (9.38 hp) 13. Continuous current, Ref, at rated speed: 33.4 Nm (286 lb-in) 14. Ordinuous current, max; 128.25 Amps 0 to peak 15. Continuous current, Ref, at rated speed: 33.4 Nm (286 lb-in) 14. Ordinuous current, max; 128.25 Amps 0 to peak 15. Continuous current, Ref, at rated speed: 13.4 Nm (286 lb-in) 16. Operating voltage, Ref (Not for direct speed: 155C (Class F) 17. Insulation class; 156C (Class F) 18. Housing temperature, max; 128C 4-/-5C; 19. Winding inductance, Ref, phase to phase at 25C +/-5C; 0.083 ohms 20. Winding inductance, Ref, base to phase at 25C +/-5C; 0.088 Nin/Amp (7.83 lb-in/Amp) 0 to peak	\mathbf{J} . Operating voltage at base speed.				S					
7. Winding temperature, max, ima 40C ambient: 140 degrees C 8. Continuous stall current, max; 59.67 Amps 0 to peak 9. Heatsink size, aluminum, attached to front mounting flange for continuous torque specifications: 305 x 305 x 25 Amm (12 x 12 x 1.0 inch) 10. Peak stall torque, max; 40 Mm (743 lb-in) 11. Peak stall torque, max; 2000 12. Continuous output ration, max at rated speed: 7.00 kW (9.38 hp) 13. Continuous output ration, max at rated speed: 33.4 Nm (29 klb-in) 14. Continuous output ration, max at rated speed: 33.4 Nm (29 klb-in) 14. Continuous output ration, max at rated speed: 33.4 Nm (29 klb-in) 14. Continuous output ration, max at rated speed: 150 C(Class F) 14. Borge temperature, max; 155 C(Class F) 14. Reging temperature, max; 125 C (28 F) 15. Ke, +/10%, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 20. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.08 a ohms 21. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 22. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 23. Winding inductance, Ref, with shaft seal option installed: 2.07 mH <t< td=""><td>6. Continuous stall torque, max, at max winding temperature in a 40C an</td><td>mbient:</td><td></td><td>44 Nm (389 I</td><td>o-in)</td><td></td><td></td></t<>	6. Continuous stall torque, max, at max winding temperature in a 40C an	mbient:		44 Nm (389 I	o-in)					
a. Continuous static current, max.	7. Winding temperature, max, in a 40C ambient:			140 degrees	С					
10. Peak stall corrent, max: 84 Nm (743 b-in) 11. Peak stall corrent, max: 128 25 Amps 0 to peak 12. Rated Speed (Speed at max continous power) 2000 13. Continuous output rating, max at rated speed: 7.00 kW (9.38 hp) 14. Continuous torque, max, at rated speed: 33.4 Nm (296 b-in) 15. Continuous current, Ref, at rated speed: 41.9 Amps 0 to peak 16. Operating voltage, Ref (Not for direct connection to AC line): 240 VAC RMS 17. Insulation class: 155C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ket, +10%, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 20. Winding resistance, +1 0%, phase to phase at 25C +/- 5C: 0.083 ohms 21. Winding resistance, Ref, phase to phase 200 VAC RMS 22. Winding inductance, Ref, phase to phase 200 VAC RMS 50/60 Hz 23. Winding resistance, Ref, thase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U.V.W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor balancing quality grade: 6-6.3 26. Rotor balancing quality grade: 0.24 M kg m ² (0.21675 lb-in-sec ²) 26. Rotor balancing quality gr	8. Continuous stall current, max:			59.67 Amps) to peak					
10. Peak stall corrent, max: 84 Nm (743 b-in) 11. Peak stall corrent, max: 128 25 Amps 0 to peak 12. Rated Speed (Speed at max continous power) 2000 13. Continuous output rating, max at rated speed: 7.00 kW (9.38 hp) 14. Continuous torque, max, at rated speed: 33.4 Nm (296 b-in) 15. Continuous current, Ref, at rated speed: 41.9 Amps 0 to peak 16. Operating voltage, Ref (Not for direct connection to AC line): 240 VAC RMS 17. Insulation class: 155C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ket, +10%, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 20. Winding resistance, +1 0%, phase to phase at 25C +/- 5C: 0.083 ohms 21. Winding resistance, Ref, phase to phase 200 VAC RMS 22. Winding inductance, Ref, phase to phase 200 VAC RMS 50/60 Hz 23. Winding resistance, Ref, thase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U.V.W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor balancing quality grade: 6-6.3 26. Rotor balancing quality grade: 0.24 M kg m ² (0.21675 lb-in-sec ²) 26. Rotor balancing quality gr	9. Heatsink size, aluminum, attached to front mounting flange for continu	uous torque specification	IS:	305 x 305 x 2	25.4mm (12	x 12 x 1.0 inch)				
11. Peak stall current, max: 12.8 ZS Amps 0 to peak 12. Rated Speed (Speed (Speed at max continous power) 2000 13. Continuous output rating, max at rated speed: 7.00 kW (9.38 hp) 14. Continuous torque, max, at rated speed: 33.4 Nm (296 lb-in) 15. Continuous current, Ref, at rated speed: 34.9 Amps 0 to peak 16. Operating voltage, Ref (Not for direct connection to AC line): 240 VAC RMS 17. Insulation class: 155 C Class F) 18. Housing temperature; max: 155 C (Class F) 19. Mousing temperature, max: 155 C (Class F) 19. Housing temperature; max: 155 C (Class F) 19. Housing temperature, max: 125C (257 F) 19. Ke, +/-10%, phase to phase at 25C +/- 5C: 0.083 Nm/Amp (7.83 lb-in/Amp) 0 to peak 20. Winding reistance, +/-10%, phase to phase at 25C +/- 5C: 0.083 Nm/Amp (7.83 lb-in/Amp) 0 to peak 21. Winding inductance, Ref, phase to phase: 207 mH 22. Or mH 200 VAC RMS 50/60 Hz 23. Audibe noise, Ref, at 1 meter distance: XX dBA 24. Audibe noise, Ref, at 1 meter distance: 208 Nm (7.8 lb-in) 25. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 26. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 27.	10. Peak stall torque, max:			84 Nm (743 I	o-in)					
12. Rated Speed (Speed at max continous power) 2000 13. Continuous output rating, max at rated speed: 7.00 kW (9.38 hp) 14. Continuous torque, max, at rated speed: 3.4 Nm (296 lb-in) 15. Continuous current, Ref, at rated speed: 41.9 Amps 0 to peak 16. Operating voltage, Ref (Not for direct connection to AC line): 155C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ke, +/-10%, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 20. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.083 ohms 21. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.083 ohms 22. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.083 ohms 23. A Nu (2016) 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: 2.07 mH 25. Detective rating of motor power connections (U.V.W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: 2.07 mI 25. Rotor inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 27. Friction torque, Ref; 0.38 Nm (7.8 lb-in) 26. Corg ig torque, Ref; 0.52 Mg (5.4 lb-in) 27	11. Peak stall current, max:				0 to peak					
13. Continuous output rating, max at rated speed: 7.00 kW (9.36 hp) 14. Continuous current, Ref, at rated speed: 33.4 Nm (296 lb-in) 15. Continuous current, Ref, at rated speed: 41.9 Amps 0 to peak 16. Operating voltage, Ref (Not for direct connection to AC line): 240 VAC RMS 17. Insulation class: 1155C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ke, +/-10%, phase to phase at 25C +/- 5C: 0.08 Nm/Amp (7.83 lb-in/Amp) 0 to peak 20. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.083 ohms 21. Winding inductance, Ref, phase to phase: 2.07 mH 23. Detective rating of motor power connections (U,V,W), to ground for 1 second: XX dBA 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 0.35 degrees C/watt 32. Product weight, Ref: 66.87 kg (147.3 lb) 33. Shipping weight, Ref: 0.62 km (5.46 lb-in) peak to peak 33. Shipping	12. Rated Speed (Speed at max continous power)			2000						
11. Continuous current, Ref, at rated speed. 3.5.4 km (1280 bm/) 12. Continuous current, Ref, at rated speed. 41.9 Amps 0 to peak 13. Operating voltage, Ref (Not for direct connection to AC line): 155.0 (Class F) 14. In Amps 0 to peak 155.0 (Class F) 15. Ke, +/-10%, phase to phase at 25C +/-5C: 107.07 V/kRPM 0 to peak 15. Ki (sine), Ref, at 25C +/-5C: 0.88 Nm/Amp (7.83 lb-in/Amp) 0 to peak 15. Winding inductance, Ref, phase to phase at 25C +/-5C: 0.083 ohms 20. Winding inductance, Ref, phase to phase at 25C +/-5C: 0.083 ohms 21. Winding inductance, Ref, phase to phase at 25C +/-5C: 0.083 ohms 22. Winding inductance, Ref, phase to phase at 25C +/-5C: 0.083 ohms 23. Winding inductance, Ref, phase to phase at 25C +/-5C: 0.083 ohms 24. Audible noise, Ref, at 1 meter distance: 2X dBA 25. Rotor Inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Froit to roupe, Ref: 0.88 Nm (7.8 lb-in) 29. Friction torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal time constant, Ref, winding to ambient: 97 minutes 31. Thermal time constant	13. Continuous output rating, max at rated speed:			7.00 kW (9.3	3 hp)					
11.5 Continuous current, ker, at rated speed. 4.1.9 Analys 6 to peak 16. Operating voltage, Ref (Not for direct connection to AC line): 14.19 Analys 6 to peak 17. Insulation class: 155C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ke, +/-10%, phase to phase at 25C +/- 5C: 0.07 V/kRPM 0 to peak 20. Kt (sine), Ref, at 25C +/- 5C: 0.083 Nm/Amp (7.83 lb-in/Amp) 0 to peak 21. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.083 ohms 22. Winding inductance, Ref, phase to phase at 25C +/- 5C: 0.083 ohms 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.68 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.42 Nm (5.46 lb-in) peak to peak 30. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: <	14. Continuous torque, max, at rated speed.			33.4 Nm (296	3 lb-in)					
11. Instalation class: 135C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ke, +/-10%, phase to phase at 25C +/-5C: 0.7 WkRPM 0 to peak 20. Kt (sine), Ref, at 25C +/-5C: 0.88 Nm/Amp (7.83 lb-in/Amp) 0 to peak 21. Winding resistance, +/-10%, phase to phase: 2.07 mH 22. Winding inductance, Ref, phase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/-10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: 6-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 29. Cogging torque, Ref. 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 9.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 0.35 degrees C/watt 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Comparating ambient temperature:	15. Continuous current, Ref, at rated speed:			41.9 Amps 0	to peak					
11. Instalation class: 135C (Class F) 18. Housing temperature, max: 125C (257F) 19. Ke, +/-10%, phase to phase at 25C +/-5C: 0.7 WkRPM 0 to peak 20. Kt (sine), Ref, at 25C +/-5C: 0.88 Nm/Amp (7.83 lb-in/Amp) 0 to peak 21. Winding resistance, +/-10%, phase to phase: 2.07 mH 22. Winding inductance, Ref, phase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/-10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: 6-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 29. Cogging torque, Ref. 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 9.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 0.35 degrees C/watt 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Comparating ambient temperature:	16. Operating voltage, Ref (Not for direct connection to AC line):			240 VAC RM	S					
18. Housing temperature, max: 125C (257F) 19. Ke, +/-10%, phase to phase at 25C +/-5C: 107 V/kRPM 0 to peak 20. Kt (sine), Ref, at 25C +/-5C: 0.88 Nm/Amp (7.83 lb-in/Amp) 0 to peak 21. Winding resistance, +/-10%, phase to phase at 25C +/-5C: 0.083 ohms 22. Winding inductance, Ref, phase to phase at 25C +/-5C: 0.083 ohms 23. Winding resistance, +/-10%, phase to phase at 25C +/-5C: 0.083 ohms 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor inertia, +/- 10%; 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 20. Cogging torque, Ref. 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 66.87 kg (147.3 lb) 33. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque a				155C (Class	F)					
20. Kt (strie), Ref, at 25C +/- 5C: 0.663 NIMARING (7.83 Ib-INVARING) 0 to peak 21. Winding resistance, +/- 10%, phase to phase at 25C +/- 5C: 0.083 ohms 22. Winding inductance, Ref, phase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref' denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Size Ver	18. Housing temperature, max:			125C (257F)						
20. Kt (strie), Ref, at 25C +/- 5C: 0.663 NIMARING (7.83 Ib-INVARING) 0 to peak 21. Winding resistance, +/- 10%, phase to phase at 25C +/- 5C: 0.083 ohms 22. Winding inductance, Ref, phase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref' denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Size Ver	19. Ke, +/-10%, phase to phase at 25C +/- 5C:			107 V/kRPM	0 to peak					
21. Winding resistance, */* 10%, phase to phase at 25C +/* 3C. 0.080 times 22. Winding inductance, Ref, phase to phase is phase to phase is power connections (U,V,W), to ground for 1 second: 2.07 mH 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Engineering Specification Electrical Sheet 2 of 5 Size Ver	20. Kt (sine), Kei, at 250 +/- 50.			0.00 NIII/AIII	o (7.83 lb-in/	/Amp) 0 to peak				
22. Winding inductance, Ref, phase to phase: 2.07 mH 23. Dielectric rating of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMS 50/60 Hz 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 0.35 degrees C/watt 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 61.6 kg (147.3 lb) 34. Operating ambient temperature: 0.C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Engineering Specification Electrical Sheet 2 of 5 NOTE: NOTE: Size Ver	21. Winding resistance, +/- 10%, phase to phase at 25C +/- 5C:			0.083 ohms	083 ohms					
23. Dielectric raing of motor power connections (U,V,W), to ground for 1 second: 1800 VAC RMIS 50/60 H2 24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: 0.63 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 30. Thermal time constant, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 0.35 degrees C/watt 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 0.1 to 40 reference only. 2. Speed, torque and current specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. COMMENTIAL AND PROPRETARY INFORMATION Engineering Specification Electrical Sheet 2 of 5 Nize NPM_A 2154E_M IZ4AA Size Ver	22. Winding inductance, Ref, phase to phase:			2.07 mH						
24. Audible noise, Ref, at 1 meter distance: XX dBA 25. Rotor inertia, +/- 10%: 0.02449 kg-m² (0.21675 lb-in-sec²) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Engineering Specification Electrical Sheet 2 of 5 Size	23. Dielectric rating of motor power connections (U,V,VV), to ground for 1	1 second:		1800 VAC RI	VS 50/60 H	Z				
25. Rotor inertia, 4/- 10%: 0.02449 Rg-fite (0.21675 lb-lft-selc*) 26. Rotor balancing quality grade: G-6.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. COMPORTING MORENTAL NO PROPRIETARY INFORMATION Imgineering Specification Electrical Sheet 2 of 5 Size Ver	24. Audible noise, Ref, at 1 meter distance:			XX dBA						
26. Rotor balancing quality grade: 0-0.3 27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. CONFIDENTILIA AND PROPERTIAL AND PROPERT	25. Rotor inertia, +/- 10%:			0.02449 kg-n	n² (0.21675	lb-in-sec²)				
27. Friction torque, Ref: 0.88 Nm (7.8 lb-in) 28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. COMPLEMENT AND PROPRIETARY INFORMATION Engineering Specification Electrical Sheet 2 of Size	26. Rotor balancing quality grade:			G-6.3						
28. Friction torque, Ref, with shaft seal option installed: 1.24 Nm (11 lb-in) 29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Sheet 2 of SpectFicial MITAL AND PROPRIETARY INFORMATION				0.88 Nm (7.8	lb-in)					
29. Cogging torque, Ref: 0.62 Nm (5.46 lb-in) peak to peak 30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Engineering Specification Electrical Sheet 2 of Size Ver				1.24 Nm (11	lb-in)					
30. Thermal resistance, Ref, winding to ambient: 0.35 degrees C/watt 31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Confidential and proprietary information Engineering Specification Electrical Sheet 2 of Size Ver	29. Cogging torque, Ref:			0.62 Nm (5.4	6 lb-in) peal	k to peak				
31. Thermal time constant, Ref, winding to ambient: 97 minutes 32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Engineering Specification Electrical Sheet 2 of Size Ver	30. Thermal resistance, Ref, winding to ambient:			0.35 degrees	C/watt					
32. Product weight, Ref: 61.6 kg (135.7 lb) 33. Shipping weight, Ref: 66.87 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. Engineering Specification Electrical Sheet 2 Of Notes: 1. "Ref" denotes untoleranced specifications are for operation with Allen Bradley drives. CONFIDENTIAL AND PROPRIETARY INFORMATION Ingineering Specification Electrical Sheet 2 of Size Ver	31. Thermal time constant, Ref, winding to ambient:									
33. Shipping weight, Ref: 66.67 kg (147.3 lb) 34. Operating ambient temperature: 0C to 40C (32F to 104F) Notes: 0C to 40C (32F to 104F) 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. CONFIDENTIAL AND PROPRIETARY INFORMATION Engineering Specification Electrical Size Ver	32. Product weight, Ref:			61.6 kg (135.						
34. Operating ambient temperature:OC to 40C (32F to 104F) Notes: 1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. CONFIDENTIAL AND PROPRIETARY INFORMATION Engineering Specification Electrical Sheet 2 0f THIS DOCUMENT CONTAINS CONFIDENTIAL AND PROPRIETARY INFORMATION MPM-A 2154F-M I744A Size	33. Shipping weight, Ref:			00.07 Kg (14)						
1. "Ref" denotes untoleranced specifications, provided for reference only. 2. Speed, torque and current specifications are for operation with Allen Bradley drives. CONFIDENTIAL AND PROPRIETARY INFORMATION Engineering Specification Electrical Sheet 2 THIS DOCUMENT CONTAINS CONFIDENTIAL AND PROPRIETARY INFORMATION MPM-A 2154F-M IZ4A A	34. Operating ambient temperature:			0C to 40C (3	2F to 104F)					
2. Speed, torque and current specifications are for operation with Allen Bradley drives. CONFIDENTIAL AND PROPRIETARY INFORMATION Engineering Specification Electrical Sheet 2 of 5 THIS DOCUMENT CONTAINS CONFIDENTIAL AND PROPRIETARY INFORMATION MPM-A 2154F-M 174AA Size Ver	Notes.									
confidential and proprietary information Engineering Specification Electrical Sheet 2 of 5 This document contains confidential and proprietary information MPM-A 2154F-M 174AA Size Ver	 "Ref" denotes untoleranced specifications, provided for reference only. 	'.								
Rockwell This DOCUMENT CONTAINS CONFIDENTIAL AND PROPRIETARY INFORMATION MPM-A 2154F-M 174AA Size Ver										
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		MPM-4215	ΔF-M.174ΔΔ	Size			Ver			
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Dr. Scott Johnson Date 08-26-09		Dr. Scott Johnson	Date 08-26-0	9						

G	eneral Specifications, continued:	
3	5. Storage ambient temperature:	-30C to 70C (-22F to 158F)
36	3. Relative humidity, non-condensing:	5% to 95%
37	 Liquid / dust protection: 	IP66
38	B. Shock, max, 6 msec duration:	20 g peak
39		2.5 g peak
4(). Shaft material:	Steel, 1144
4	. Paint, color:	Black

42. Shaft, key (if provided), front mounting surface, and connector mating surfaces are not painted.

Feedback Specifications:

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Beckywall	CONFIDENTIAL AND PROPRIETARY INFORMATION	Engineering Specificati	on Electrical	She	eet 3	of	5
<u>Notes:</u> 1. "Ref" denotes untoleranced s	pecifications, provided for reference only	у.					
 Data (byte) format: Start bit Memory storage capacity, E 			100	bytes			
	rate, asynchronous: Encoder is slave, communication is extension value range:		0.1	32,767 (15 bit)		
13. DATA+, DATA- signal type,	rate, asynchronous:		RS	485, 9600) baud		
12. TS+, TS- thermostat continu	uous current, max, at 1.0 power factor:		2.5	Amps			
11. TS+, TS- thermostat continu	Jous current, max, at 0.6 power factor:		1.6	Amps			
10. TS+, TS- thermostat operat	• • •		050	Volts			
 EFWR 9V continuous input of 9 EPWR 9V inrush input currer 	nt, max, when connected to Kinetix6000	drive:	3.9	ADC			
 EPWR 9V (encoder power) ii EPWR 9V continuous input of 	nput voltage:		7.0	to 12.0 VI nADC	DC		
6. EPWR 5V inrush input currer					DO		
5. EPWR 5V continuous input o	urrent.max. at 5.0 VDC:		N/A				
EPWR 5V (encoder power) in	nput voltage:		N/A				
3. SIN -, COS - voltage offset w	ith respect to ECOM ± 0.3 VDC:		2.5	VDC			
2. SIN, COS waveform amplitud	10 100/		10	VAC peal	k to peak		
1. SIN, COS waveform output:			102	4 sinusoi	ds/rev		

Brake Specifications: 1. Type: Spring-set holding brake, releases when voltage applied.	
2. Holding torque, max:	70 Nm (619 lb-in)
3. Voltage input, +15/-10%, may be applied either polarity:	24 VDC
4. Current input, +/- 10%, at 24 VDC, at 25C +/- 5C:	2.05 ADC
5. Coil resistance, +/-10%, at 25C +/- 5C:	11.76 Ohms
6. Coil resistance, +/-10%, with motor operating at max continuous stall torque rating in a 40C ambient:	16.46 Ohms
7. Release time delay (when voltage applied), Ref:	200 msec
8. Engage time delay, (when voltage removed), Ref, with diode used as arc suppression device	
in external control circuit:	900 msec
9. Engage time delay, (when voltage removed), Ref, with MOV used as arc suppression device	
in external control circuit:	120 msec
10. Rotational backlash, Ref, with brake engaged:	25 arc minutes
11. Dielectric rating of brake connections (MBRK+, MBRK-) to ground for 1 second:	1200 VAC RMS 50/60 Hz

Notes:

1. "Ref" denotes untoleranced specifications, provided for reference only.

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	PERMISSION OF ROCKWELL AUTOMATION, INC.	Dr. Scott Johnson Date 08-26-09		A				UI						

