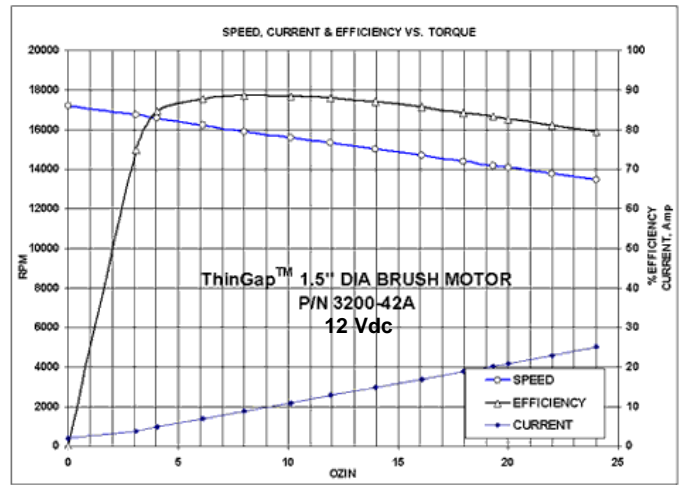
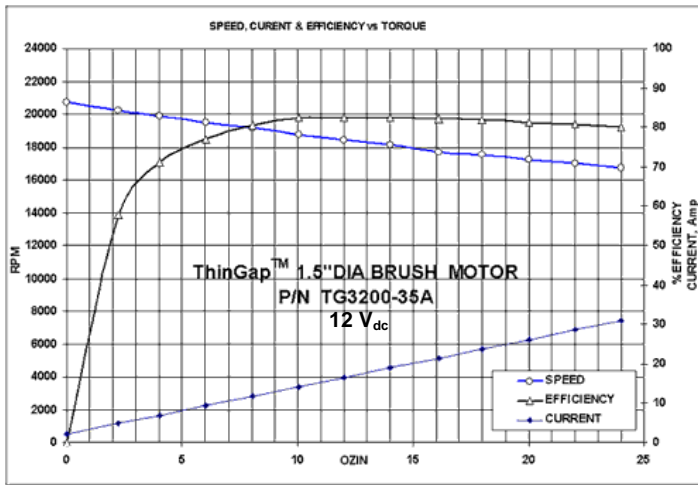
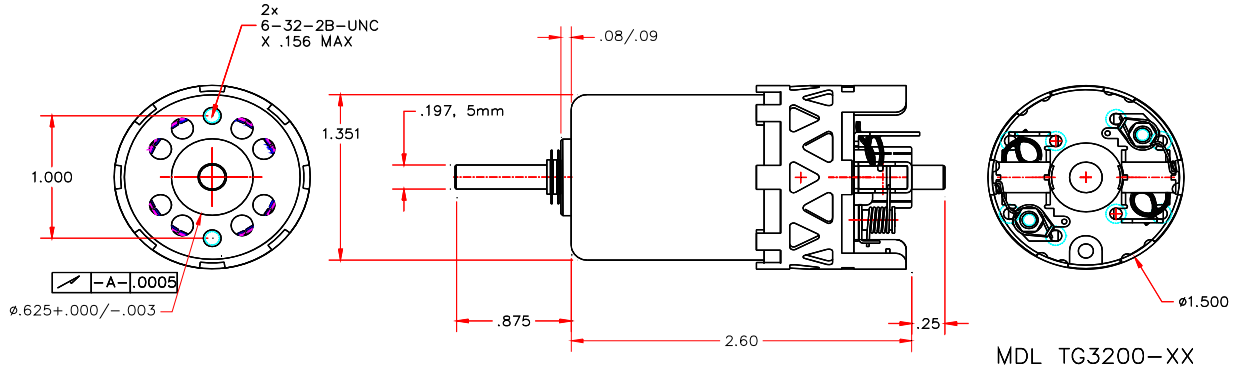




- High power density
- High torque
- High efficiency
- No cogging or hysteresis
- No iron losses
- No lamination ringing
- Rapid acceleration
- Low-inductance armature
- Compact and lightweight
- Innovative, patented coil design

TGB16 Series Brush Motor	TGB1610	TGB1611
Peak torque (T_{peak})	80 oz-in.	95 oz-in.
Continuous shaft power (P_{cont})	231 W	204 W
Torque (T_{cont})	16 oz-in.	19 oz-in.
Current (I_{cont})	28 amps	
Max efficiency @ 25 °C	82%	88%
Max speed (ω_{max})	33,000 rpm	
No load speed (ω)	22,000 rpm @ 12 V _{DC}	17,700 rpm @ 12 V _{DC}
Motor constant (K_m)	2.8 oz-in./sqrt (W)	2.7 oz-in./sqrt (W)
Torque constant (K_t)	0.74 oz-in./amp.	0.93 oz-in./amp.
Back EMF constant (K_e)	1833 rpm/v	1475 rpm/v
No load current (I_o)	2.7 amps	1.65 amps
Terminal resistance. (R_t)	0.054 Ω	0.094 Ω
Cogging and hysteresis torque (T_c)	0 oz-in.	0 oz-in.
Viscous drag torque (T_{ac})	0.060 oz-in./krpm	0.047 oz-in./krpm
Friction torque (T_{fr})	1.0 oz-in.	1.0 oz-in.
Ambient temperature range	-34 to 160 °C	-34 to 160 °C
*Max armature winding temperature	120 °C	120 °C
Thermal resistance (TPR)	1.76 °C/W	1.76 °C/W
Armature Inductance (L)	<10 μ H	<15 μ H
Starting current	1.0 amps @ 0.08 V _{DC}	0.8 amps @ 0.08 V _{DC}
Armature weight (W_a)	1.76 oz	1.76 oz
Motor weight (W_t)	10 oz	10 oz
Armature inertia (J)	9.96 x 10 ⁻⁴ oz-in.-s ²	9.96 x 10 ⁻⁴ oz-in.-s ²
<p>*Max continuous winding temperature is limited by maximum magnet temperature of 120 °C. Peak power is limited by the temperature rise of the armature. Motor contains integrated fan for cooling. Magnet Material – Neodymium, Bearing Type – Ball, Brush – Silver Graphite Motor testing performed at 25 °C ambient mounted on heat sink of 3" x 3/8" x 8" aluminum.</p>		

OUTLINE DRAWING



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