VOLTS 24 ROTATION See Tabulation BRUSHES 4 POLES 4

LUBRICATION

At overhaul, all bronze bearings should be well lubricated with medium engine oil.

Cover armature shaft at drive end with a film of light oil before assembling drive.

STARTING SWITCH

See Tabulation.

BRUSH SPRING TENSION

32 to 40 ounces with new brushes. This tension is measured with the scale hooked under the brush spring at the bend and pulled on a line parallel with the face of the brush. Take reading just as the spring leaves the brush.

TRANSMISSION

See Tabulation.

END PLAY

.005" to .030". Adjust by installing thrust washers just inside the commutator end of the shaft to hold these limits.

COMMUTATOR END HEAD

Be sure felt oiling pad is in the outer end of the commutator end head before assembling the head to the motor.

MAGNETIC SHIFT CLUTCHES

In operating the solenoid plunger by hand, it will be noted that first the switch contact is made and then about 3/16" further travel bottoms the plunger and brings its outer end about flush with the solenoid housing. With the plunger in this position, there should be a clearance of 3/32" + 1-/32"-1/64" between the pinion and the pinion stop. Adjust by turning the link screw in or out as needed. After having adjusted for this full mesh position, release the plunger and check the "at rest" position.

SHUNT FIELD COIL DRAW

4.1 to 4.7 amperes at 20.0 volts.

TEST SPECIFICATIONS

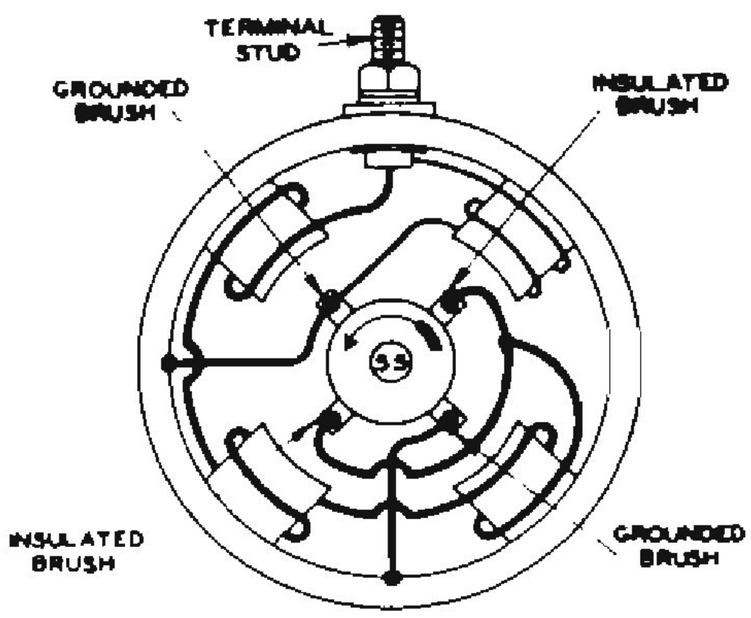
No Load Draw	20.0 volts, 43 maximum amperes, 6200 minimum RPM.
Stall Torque	8.0 volts, 170 maximum amperes, 6.0 minimum Ft. Lbs.

prestolite.
SERVICE
INFORMATION

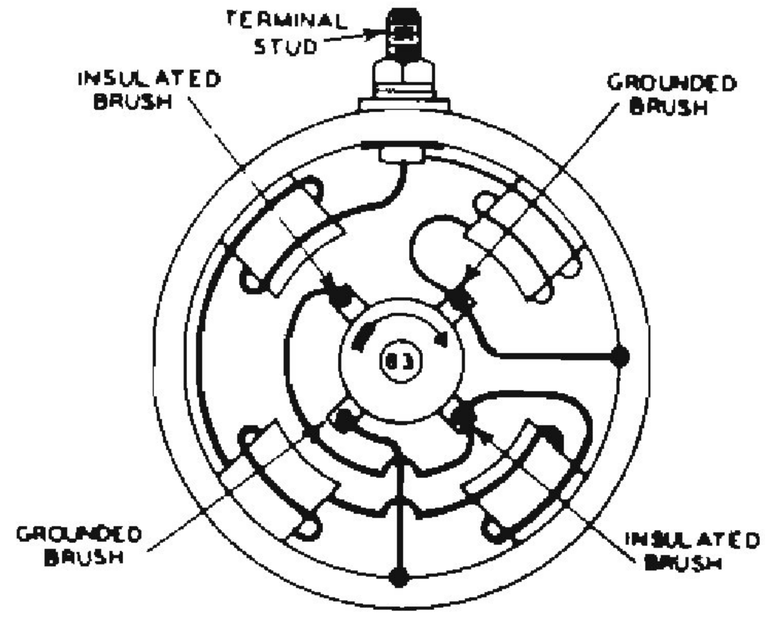
Unit	Rot.	Start. Switch Mounted	Transmission	Pinion Position*	Special Instructions
MEX-7002	CCWDE	Separate	Bendix	1-7/32"-1-11/32"	
MEX-7101	CWDE	On Motor	Mag. Clutch	1-9/32"-1-15/32"	
MEX-7101T	CWDE	On Motor	Mag. Clutch	1-9/32"-1-15/32"	See Note 1
MEX-7102	CCWDE	On Motor	Mag. Clutch	1-9/32"-1-15/32"	
MEX-7102T	CCWDE	On Motor	Mag. Clutch	1-9/32"-1-15/32"	See Note 1
MEX-7103	CWDE	On Motor	Mag. Clutch	1-19/64"-1-15/32"	
MEX-7103T	CWDE	On Motor	Mag. Clutch	1-19/64"-1-15/32"	See Note 1

*This dimension is measured from the mounting face of the pinion housing to the outer edge of the pinion in the "at rest" position. Check with the armature thrust to the commutator end and again with the armature thrust to the drive end.

Note 1 - After inspection of the various parts, paint terminal stud and brush holder insulation with red glyptol. Cover glyptol and all metal surfaces except pilots, head seats, threads, commutator and bearing surfaces with an air-drying, fungus-resistant varnish. Allow varnish to soak into field coils and armature windings. Drain and dry thoroughly before assembling motor.



Internal Wiring of CWDE Motors



Internal Wiring of CCWDE Motors

VOLTAGE 24 ROTATION See Tabulation BRUSHES 4 POLES 4

VENTILATED No FRAME DIAMETER 4 1/2"

BEARINGS Absorbent bronze bearing used at commutator end. Ball bearing used at drive end on all except MEX-7001 which has an absorbent bronze bearing.

LUBRICATION Soak absorbent bronze bearings and saturate the felt oiling pad with SAE 20 oil. Allow excess oil to drain out before assembling end head on motor. Pack open ball bearings 1/4 to 1/2 full with a good grade ball bearing lubricant.

BRUSH REPLACEMENT The brushes must be replaced when they have worn down to a length of 7/16" or less on the 6100 series and 1/4" or less on the 7000 series.

BRUSH SPRING TENSION 32 to 40 ounces with new brushes. Measure with a spring scale hooked under the brush spring at the brush. Pull the scale on a line opposite the line of force exerted by the brush spring and take the reading just as the spring leaves the brush.

POLE SHOE INSTALLATION When replacing field coils install the pole shoes so that the longer tip is pointing in the same direction as armature rotation.

END PLAY Adjust to .005" minimum with thrust washers on the commutator end of the armature shaft. Maintain the following dimension hetween the end of the armature shaft and the outside edge of the drive end head.
MEX-7001 - 17/64" to 19/64"
All others - 27/64" to 15/32"

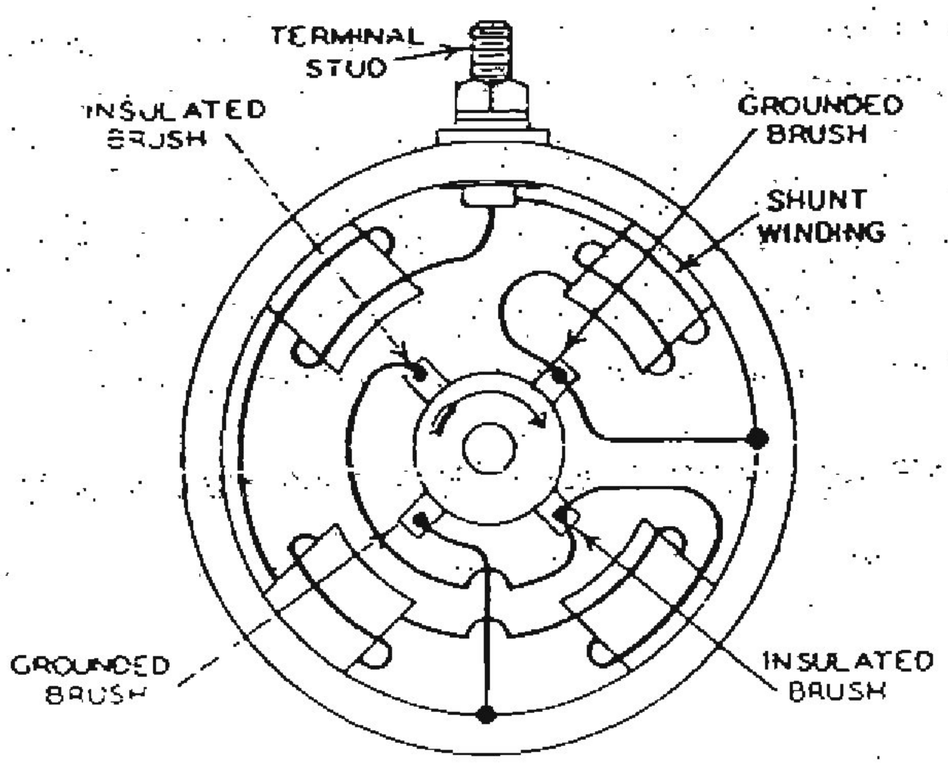
SHUNT FIELD DRAW (77°F) 4.9 to 5.7 amperes at 24.0 volts.

prestolite.
SERVICE
INFORMATION

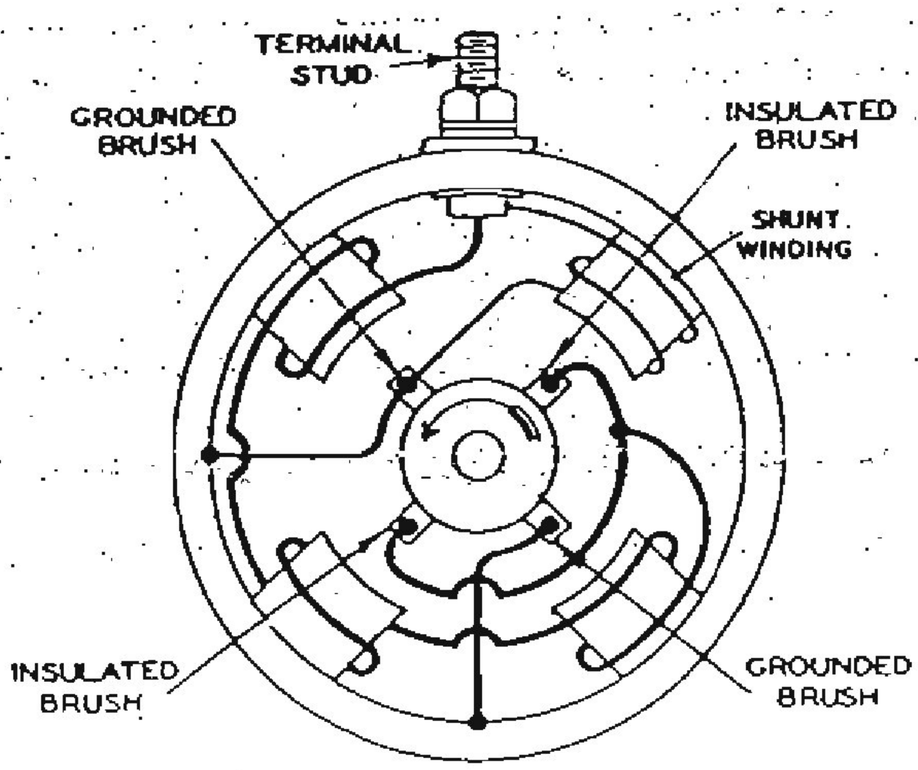
TEST SPECIFICATIONS

	(77°F) Terminal Voltage	Maximum Amperes	RPM	Torque Ft. Lbs.
No Load Test	20	43	6200 Min.	----
Stall Torque Test	8	170	0	6

Unit	Rotation
MEX-6101	CCWDE
MEX-6102	CCWDE
MEX-7001	CWDE
MEX-7003	CWDE
MEX-7004	CCWDE



Internal Wiring of
CCWDE Motors



Internal Wiring of
CWDE Motors