

All dimensions in millimeters

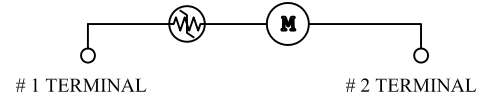
Opposite Hand: 589217

## Technical Data

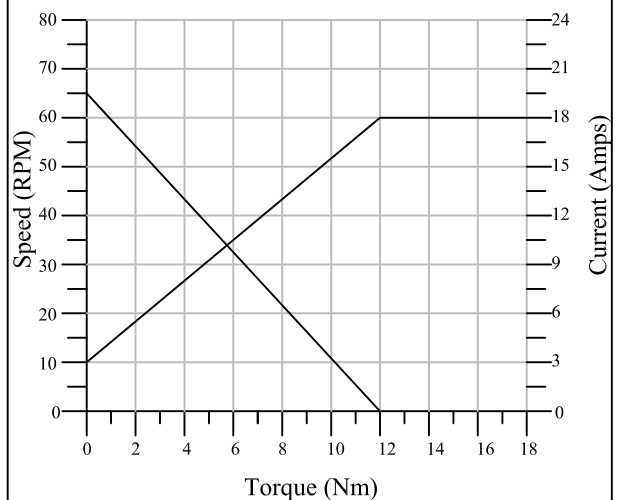
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	21.5 mm
Output Shaft Length:	=	4.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

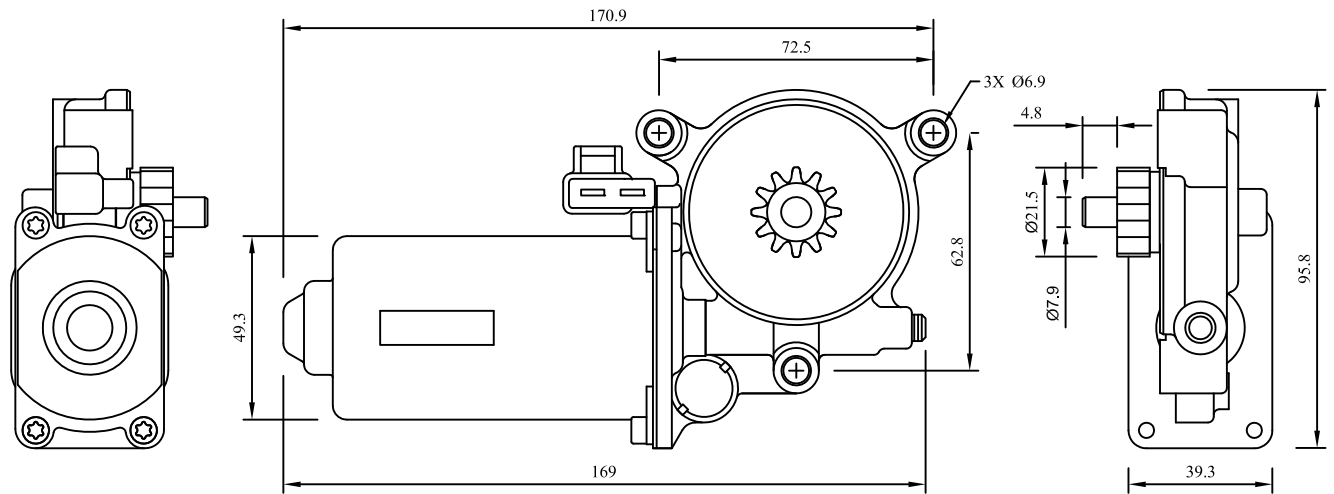
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

Opposite Hand: 589216

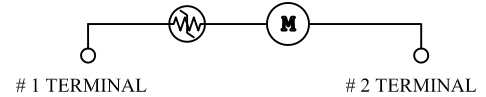
## Technical Data

Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	21.5 mm
Output Shaft Length:	=	4.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

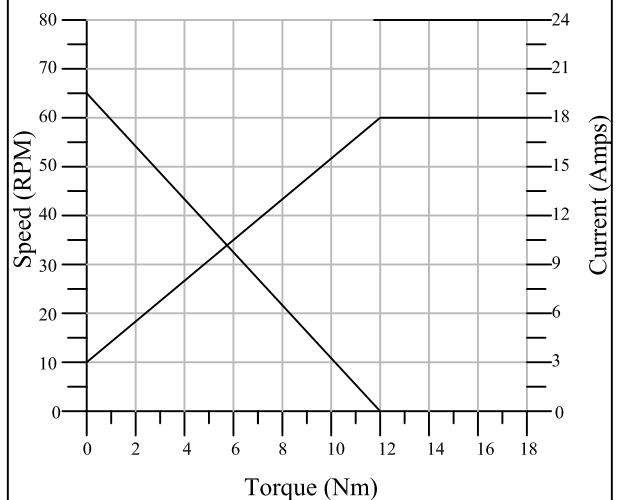
## Schematic

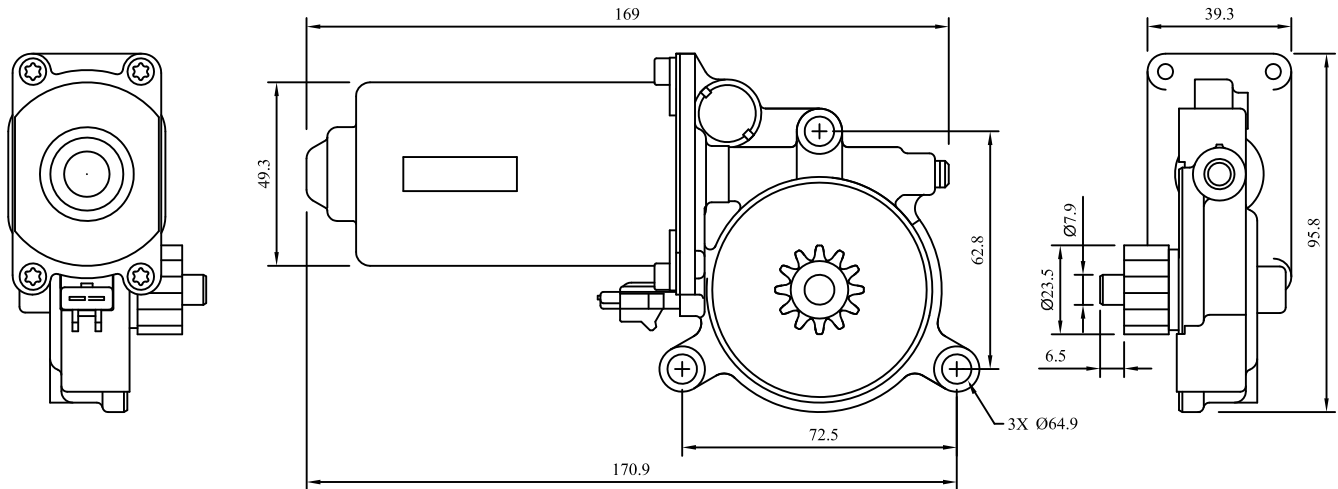
# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.

# 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

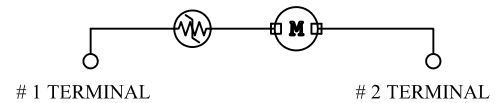
Opposite Hand: 589219

## Technical Data

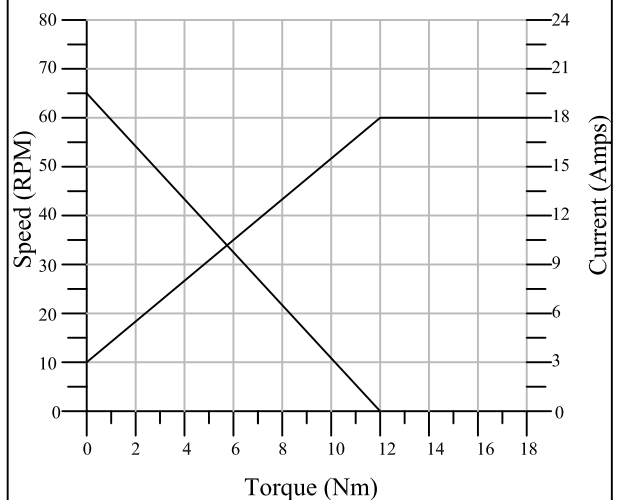
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	6.5 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12033911
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

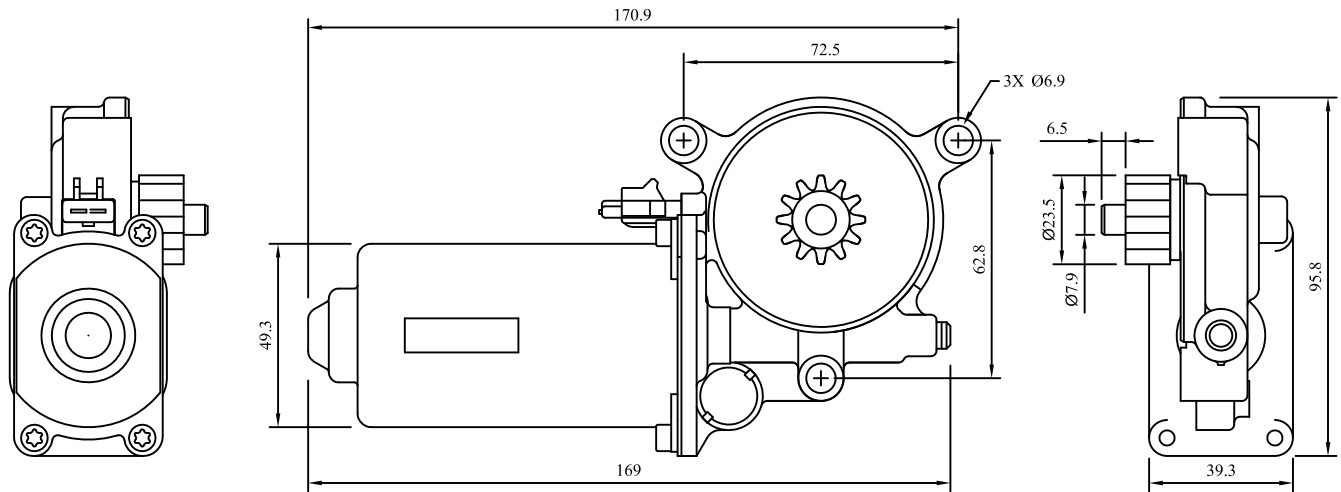
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

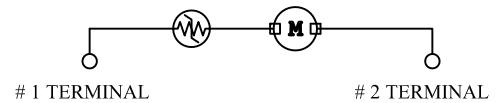
Opposite Hand: 589218

## Technical Data

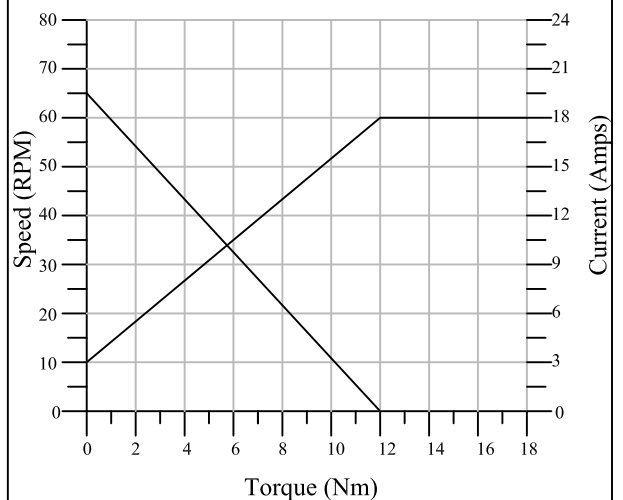
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Plastic
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	6.5 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12033911
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

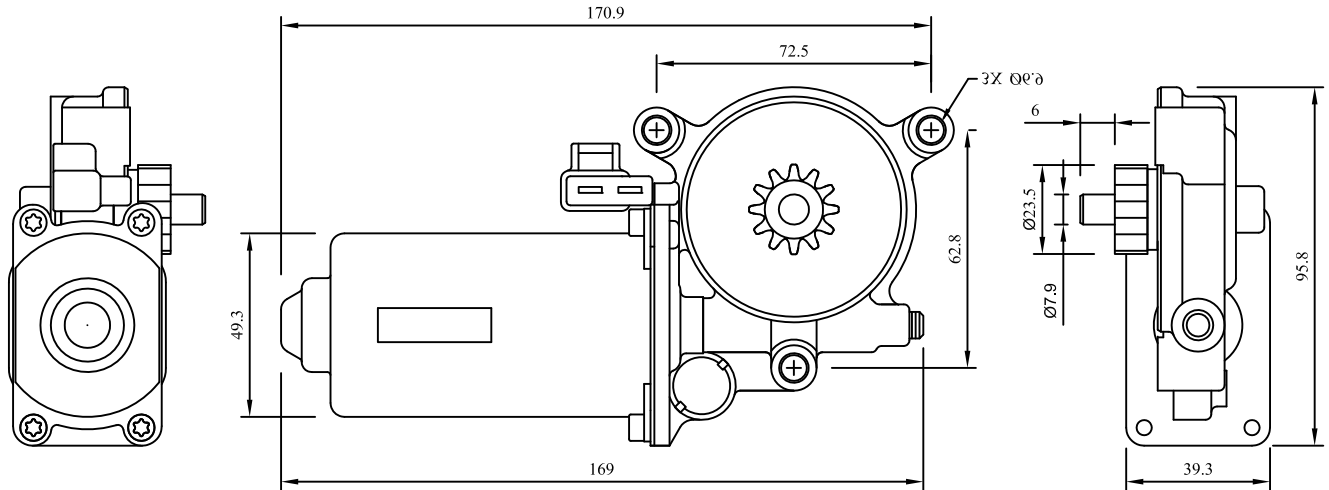
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

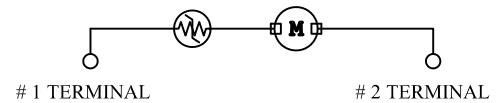
Opposite Hand: 589229

## Technical Data

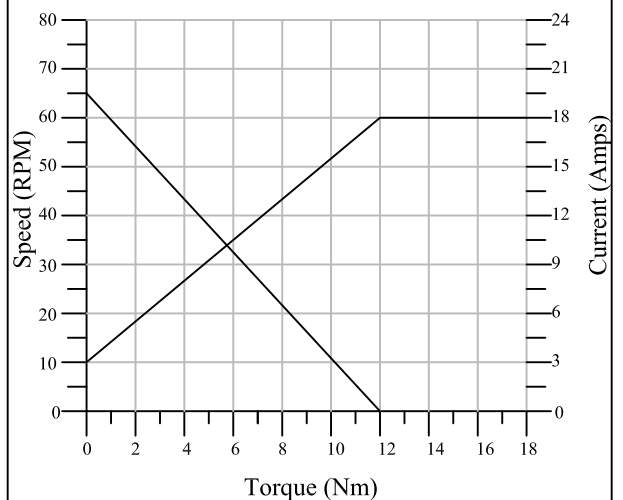
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	21.5 mm
Output Shaft Length:	=	6 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

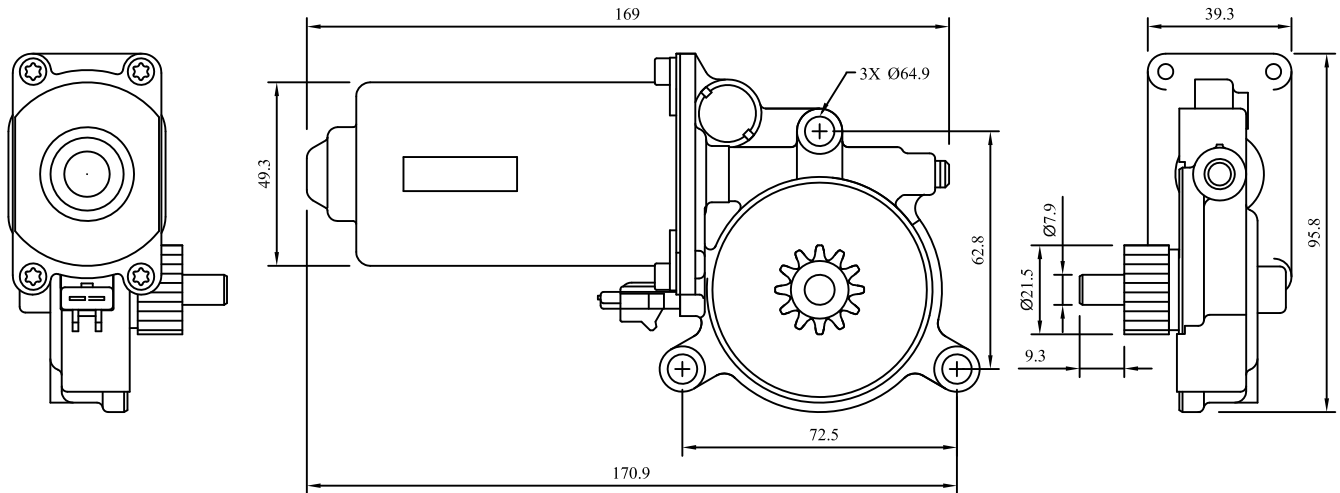
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

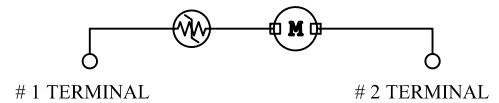
Opposite Hand: 589223

## Technical Data

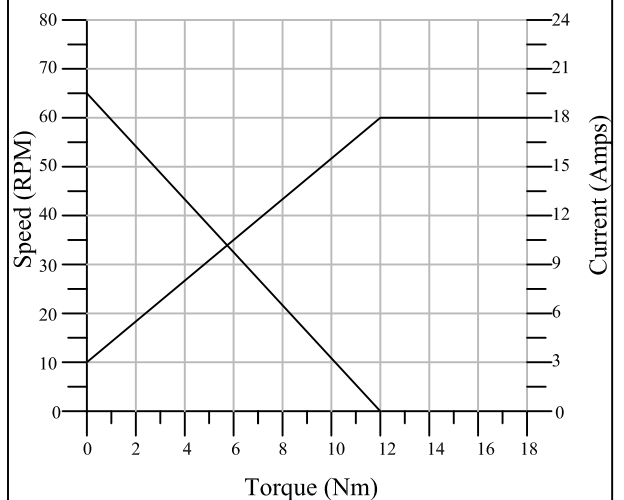
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	21.5 mm
Output Shaft Length:	=	9.3 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12033911
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

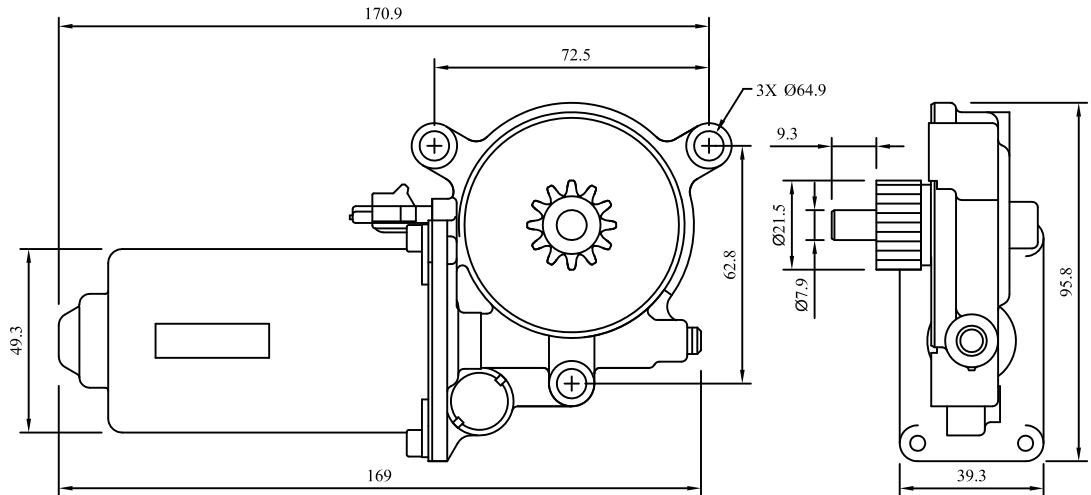
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
 # 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

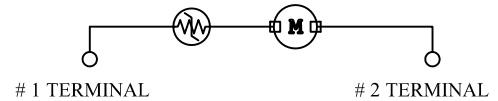
Opposite Hand:589222

## Technical Data

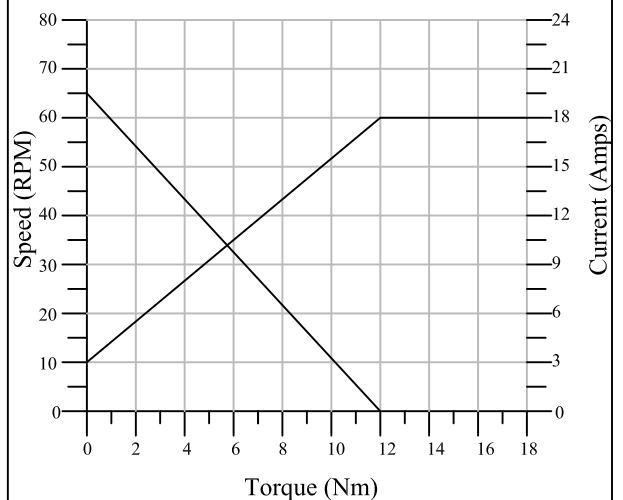
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	21.5 mm
Output Shaft Length:	=	9.3 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12033911
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

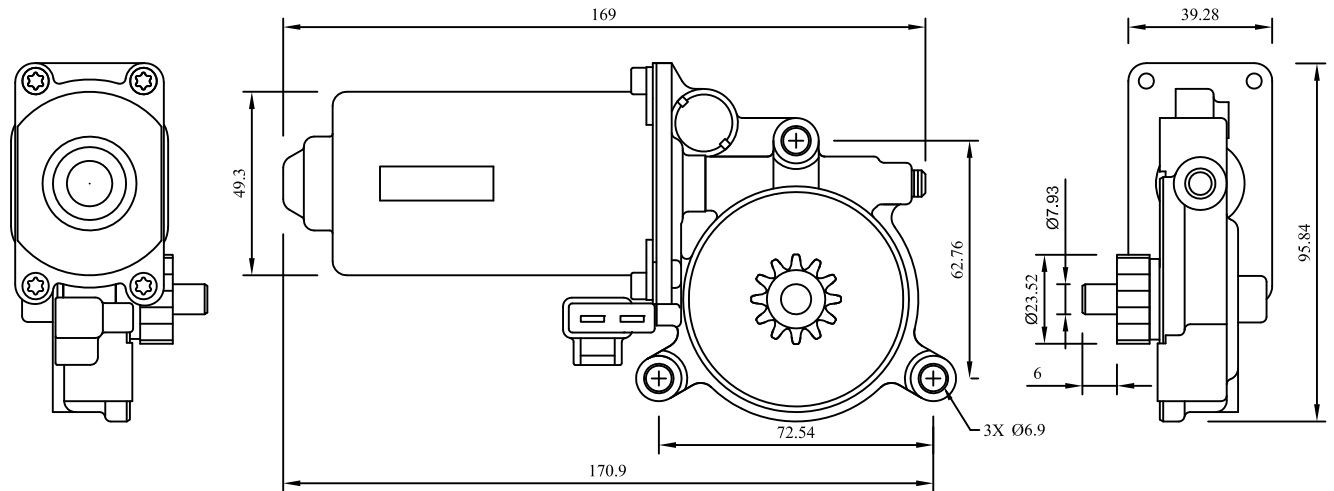
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

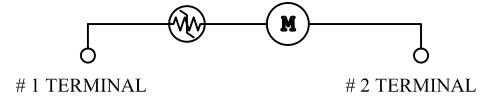
Opposite Hand: 589220

## Technical Data

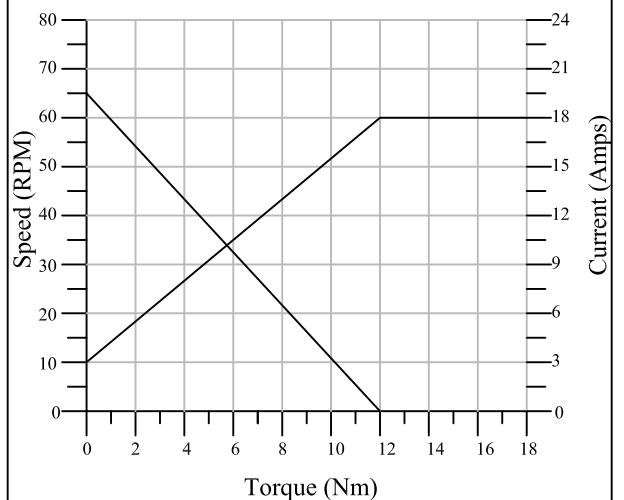
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	12-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	6 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

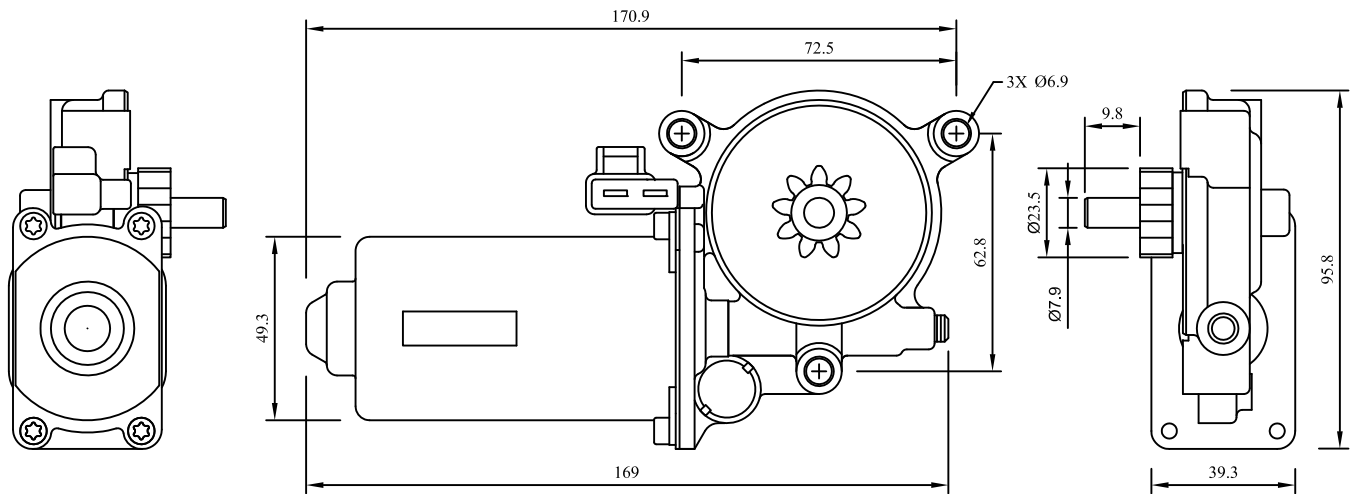
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
 # 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

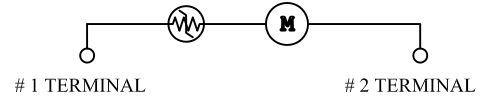
Opposite Hand: 589237

## Technical Data

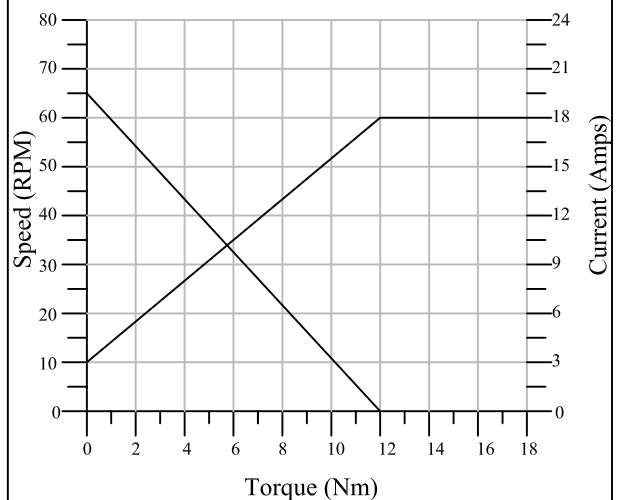
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	9-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	9.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

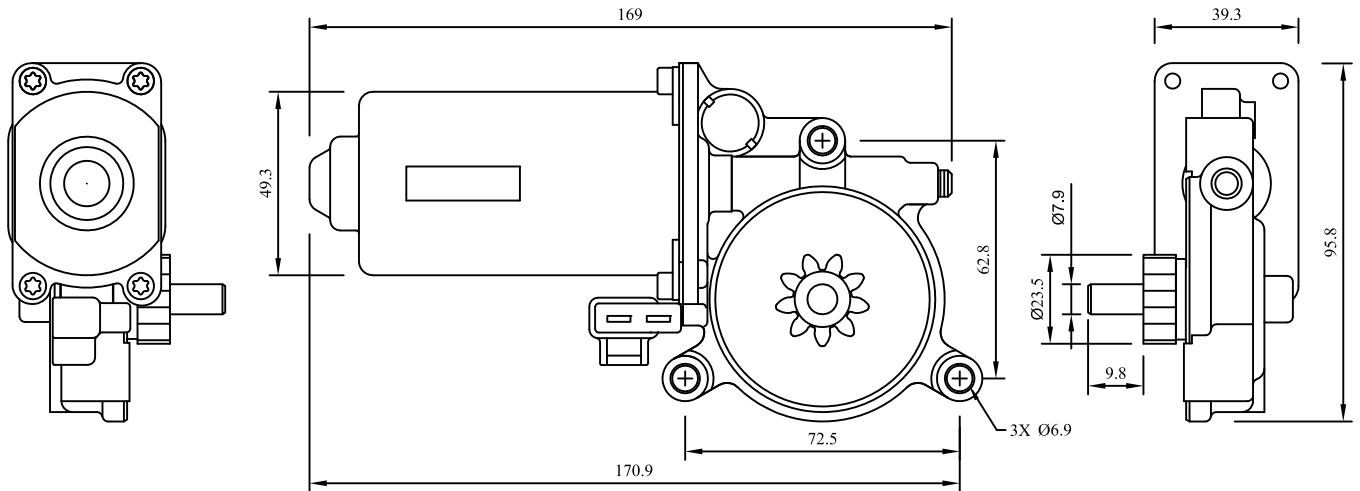
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

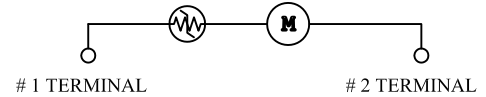
Opposite Hand: 589236

## Technical Data

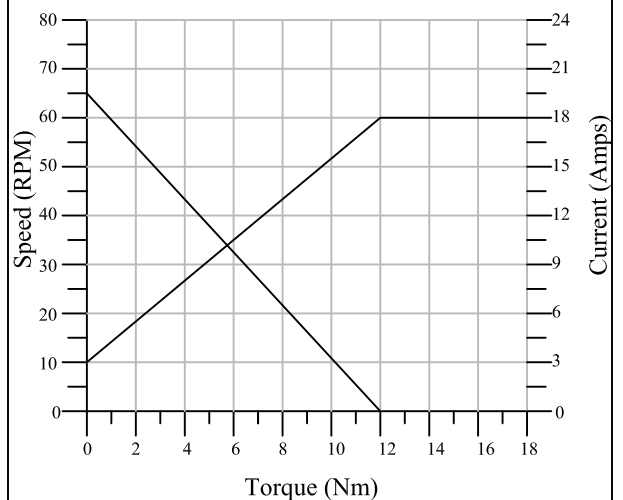
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	9-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	9.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

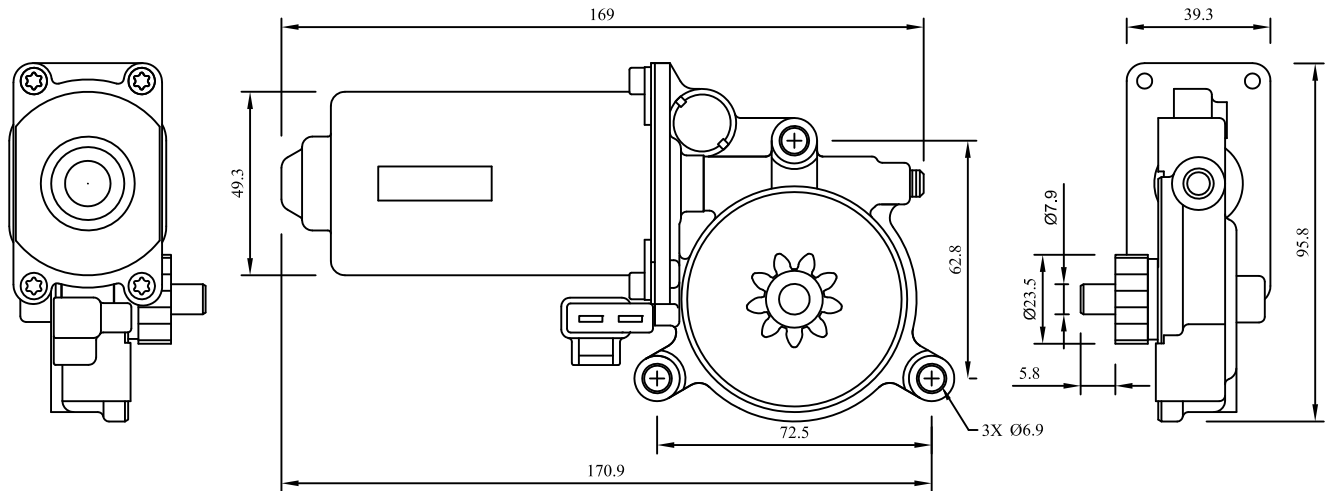
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
 # 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

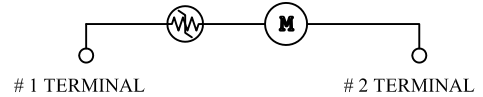
Opposite Hand: 589240

## Technical Data

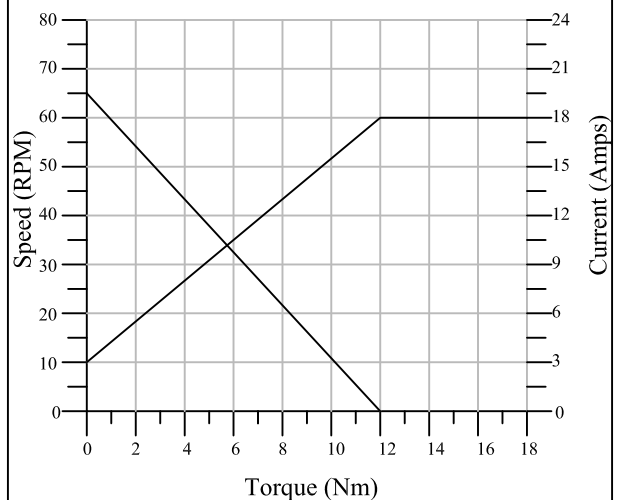
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	9-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	5.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

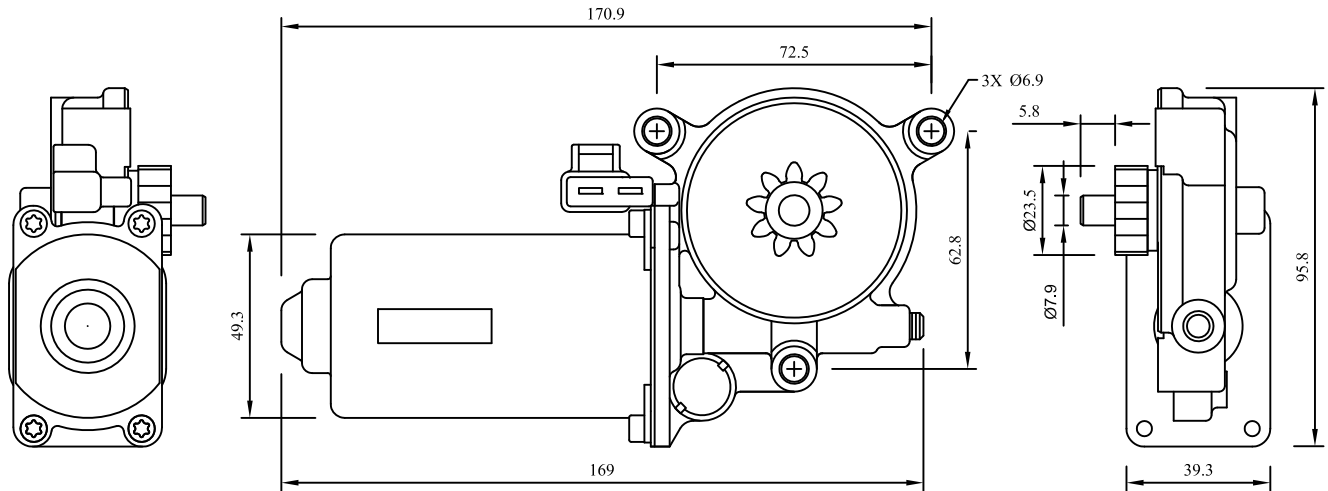
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

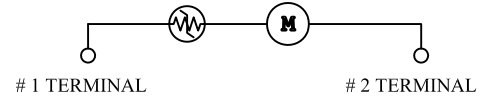
Opposite Hand: 589239

## Technical Data

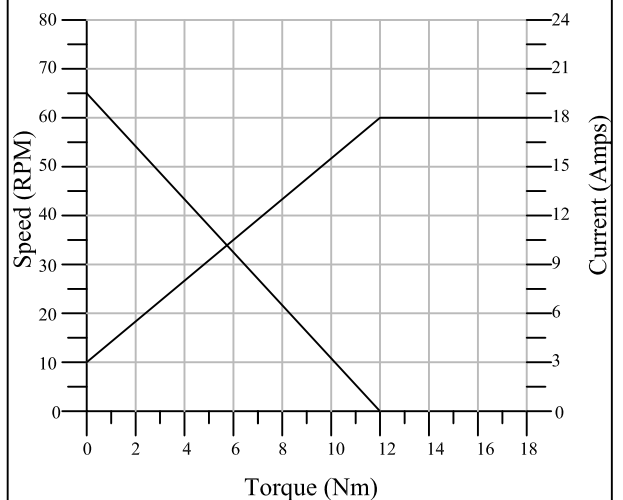
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	9-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	5.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12064749
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

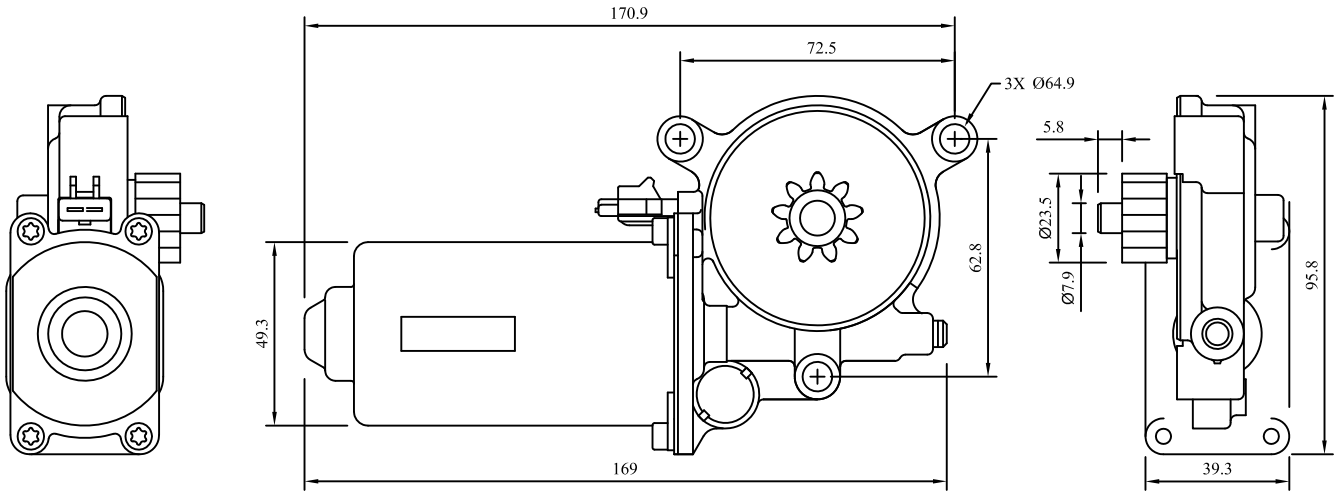
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.  
 # 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

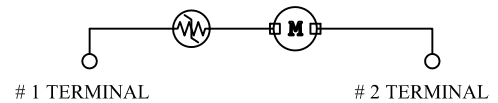
Opposite Hand: 589242

## Technical Data

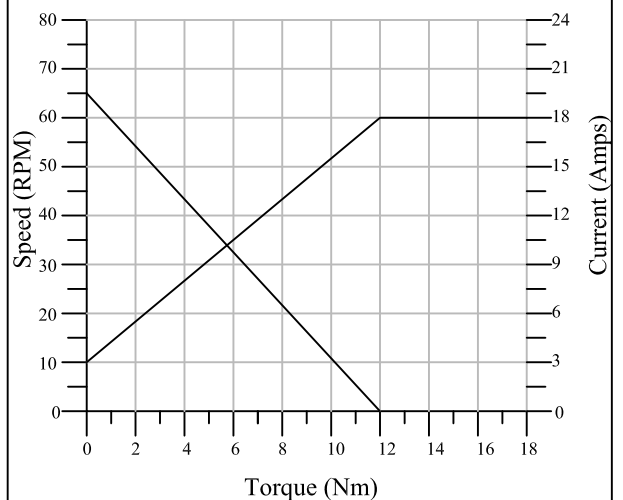
Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	9-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	23.5 mm
Output Shaft Length:	=	5.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12033911
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

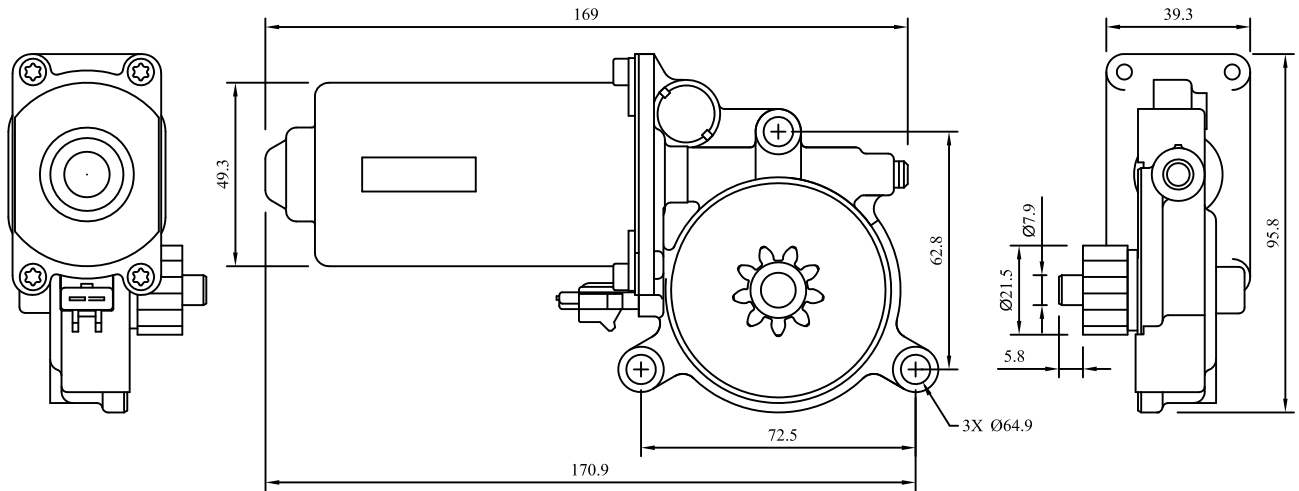
## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.



## Motor Performance





All dimensions in millimeters

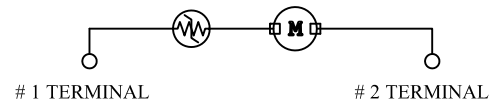
Opposite Hand: 589241

## Technical Data

Rated Voltage:	=	12 V DC
No Load Speed:	=	65 RPM
Stall Torque:	=	12 Nm
Stall Current:	=	18 Amps
Output Gear Type:	=	19-Tooth
Output Gear Material:	=	Metal
Output Gear O. D.:	=	21.5 mm
Output Shaft Length:	=	5.8 mm
Output Shaft Diameter:	=	7.9 mm
Gear Housing Material:	=	Metal
Connector Type:	=	Packard 12033911
Hall Sensor:	=	None
Protection Class:	=	IP 53
Approximative Weight:	=	0.9 Kg

## Schematic

# 1 TERMINAL TO POSITIVE LEAD FOR CLOCKWISE PINION ROTATION.  
# 2 TERMINAL TO POSITIVE LEAD FOR COUNTERCLOCKWISE PINION ROTATION.



## Motor Performance

