



GEARED IN-WHEEL MOTOR WGI SERIES

CORELESS MOTOR CO.,LTD

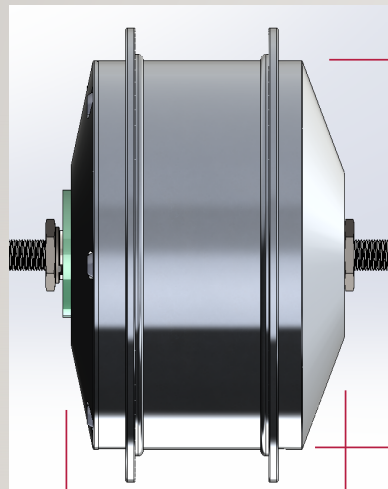
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FEATURES OF WGI SERIES

- Miniaturization ⇒ **30 % size down**
- Weight saving ⇒ Less than **50 %**
- High-Torque : More than **1.3 times** (Conventional ratio)
- High-efficiency ⇒ Motor efficiency of **90% or more** due to new winding method
- Strong start-up acceleration (Due to Coreless structure)
- Realizes smooth ace/deceleration (Due to cogging-less)
- Rotation speed and torque can be adjusted by changing the gear ratio
- Due to through shaft structure, excellent hang-load resistance.

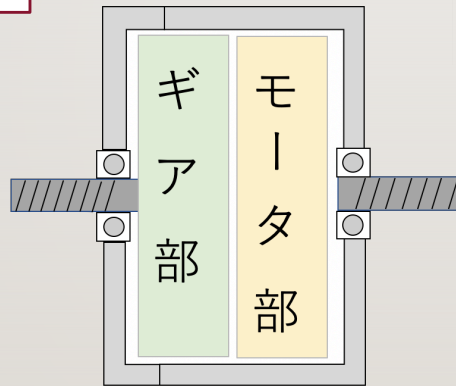
DIMENSION COMPARISON AND INTERNAL CROSS-SECTION STRUCTURE



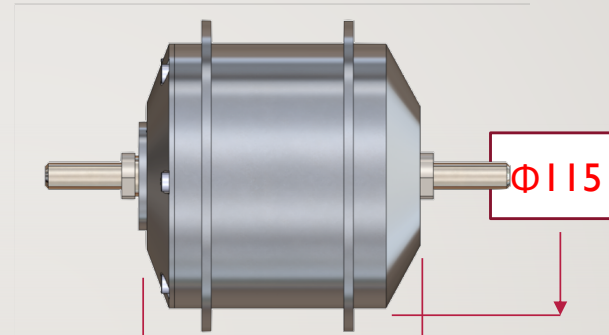
$\Phi 145$

107

Conventional product



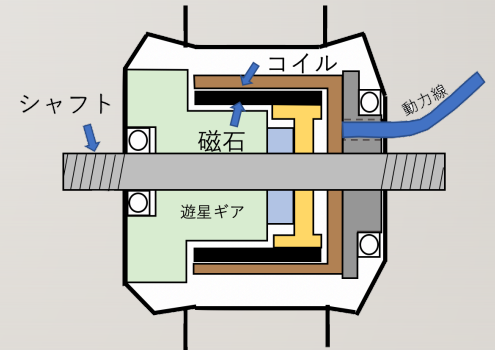
Cross-section of conventional product



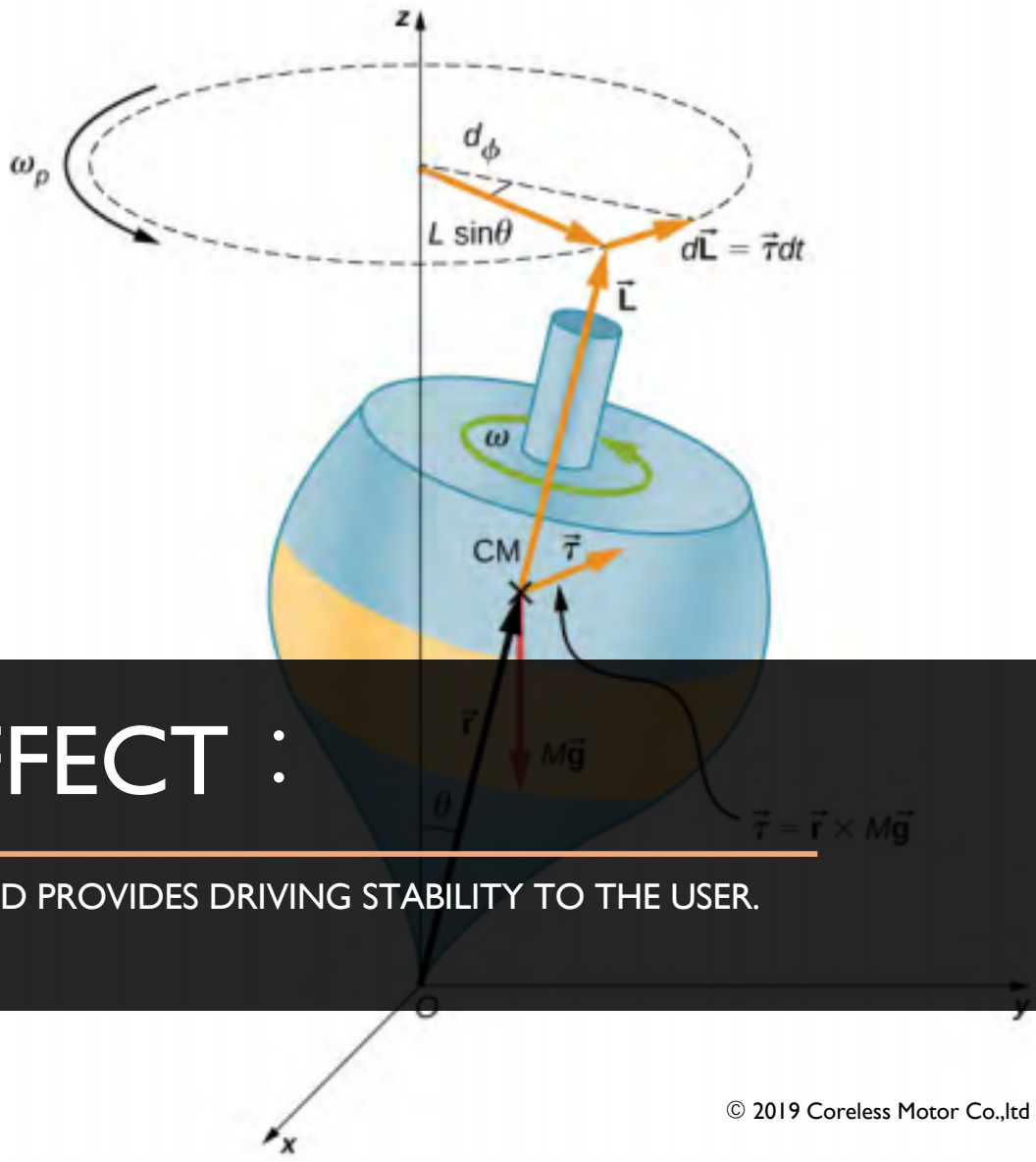
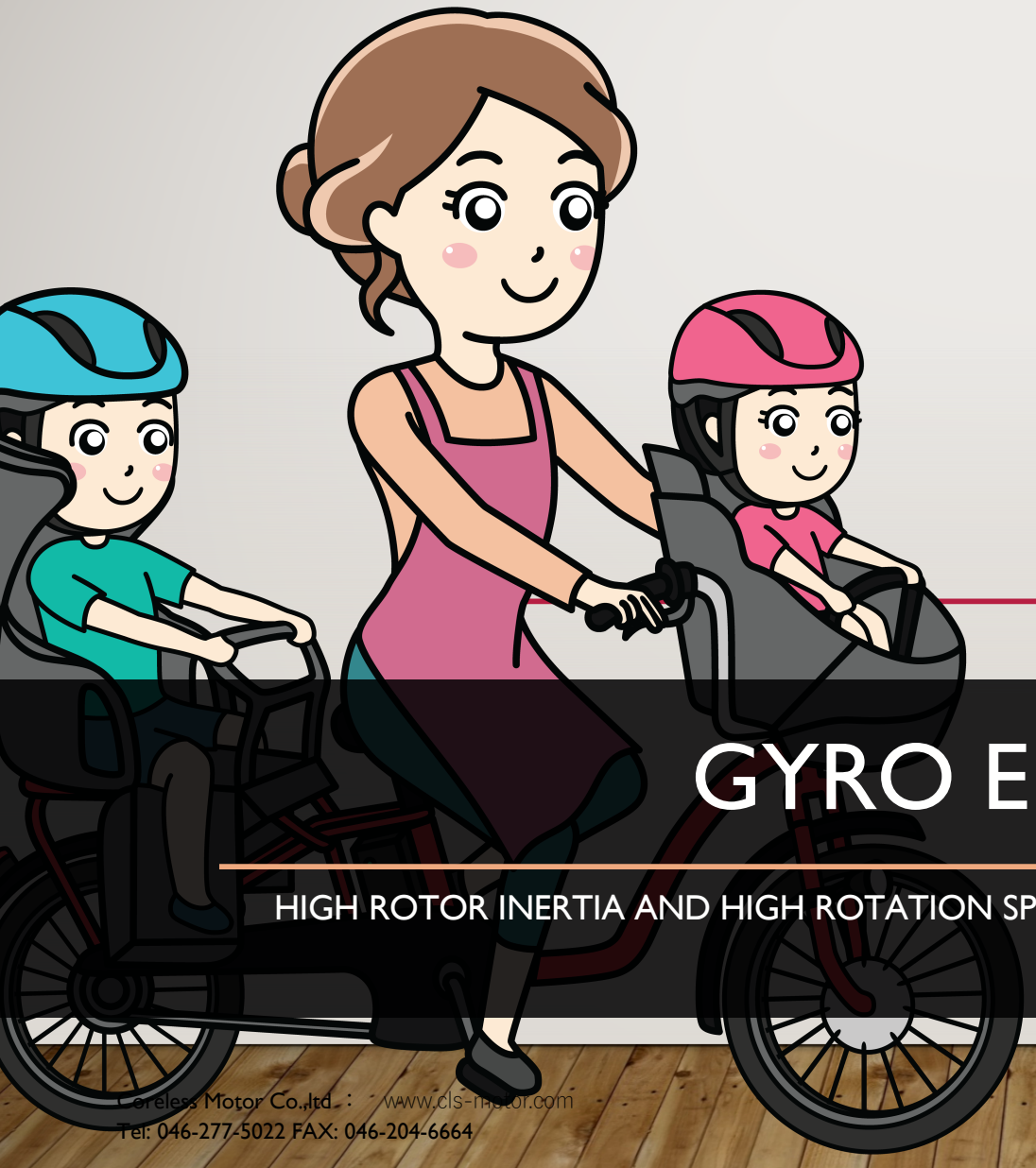
$\Phi 115$

105

New coreless product



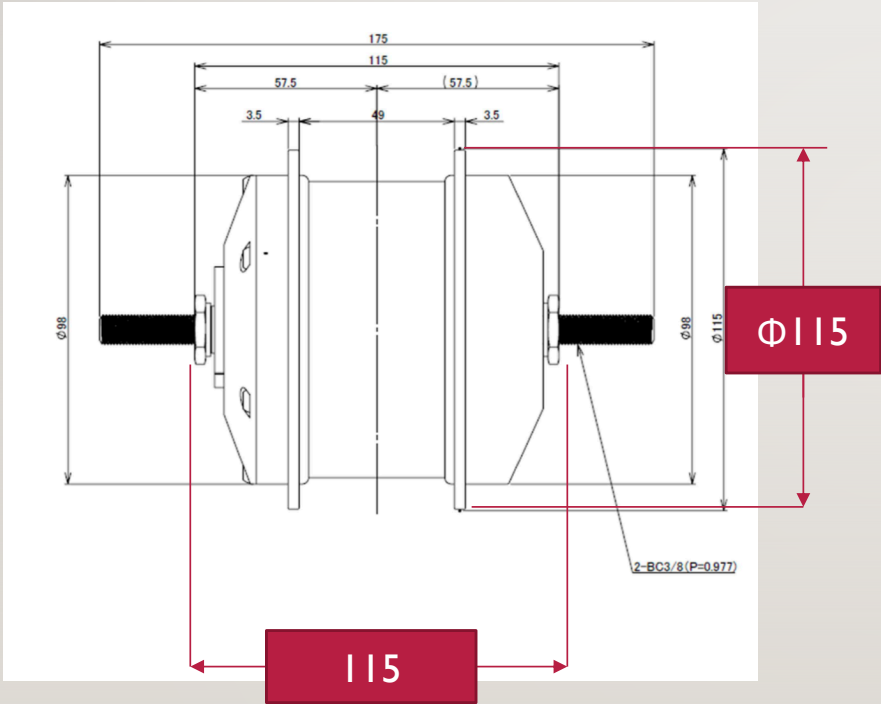
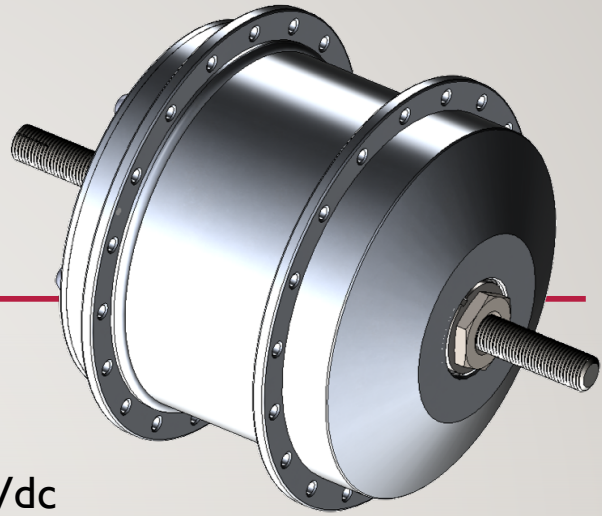
Cross-section



GYRO EFFECT :

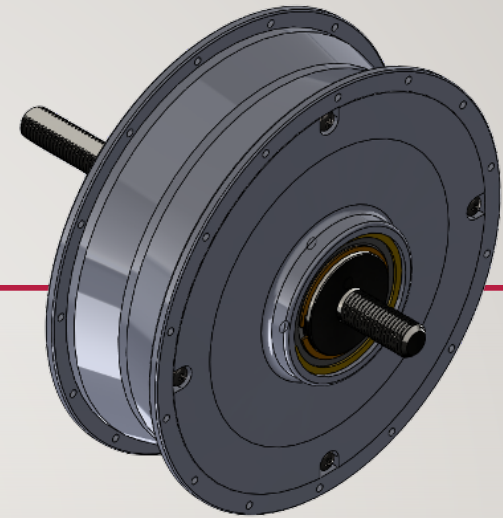
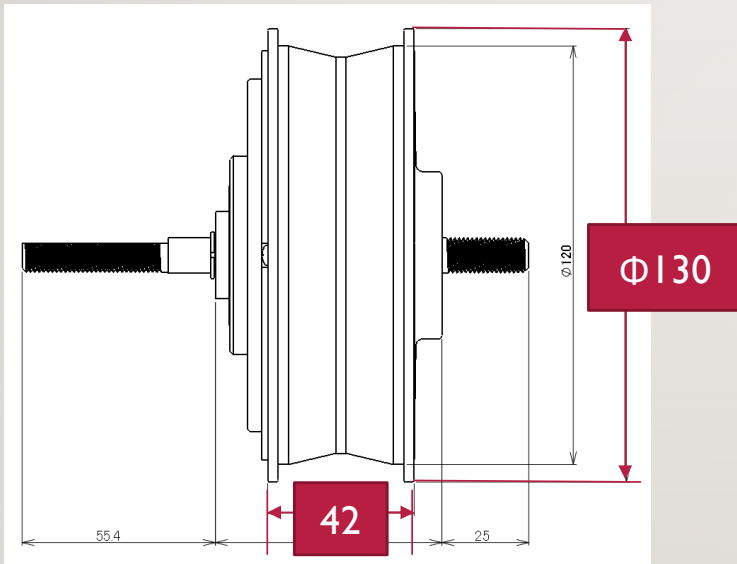
HIGH ROTOR INERTIA AND HIGH ROTATION SPEED PROVIDES DRIVING STABILITY TO THE USER.

Ex. I : Electric assisted bicycle



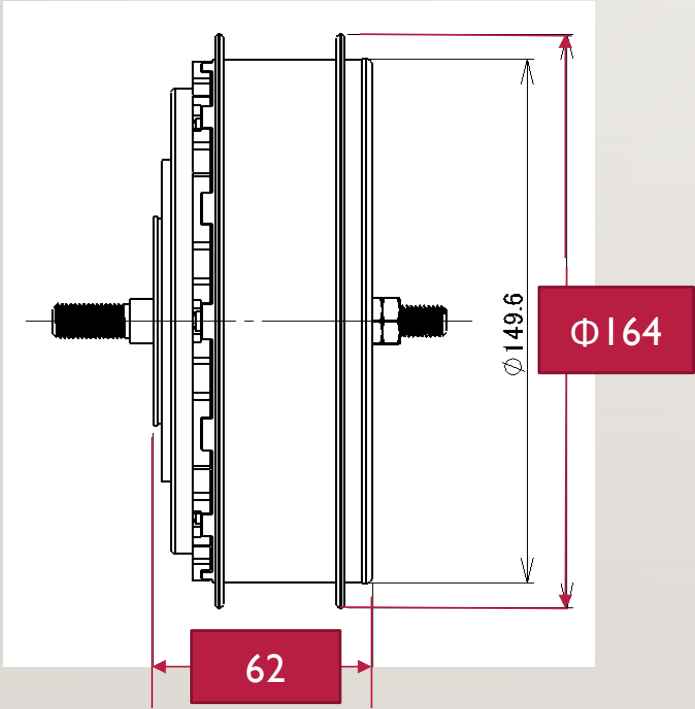
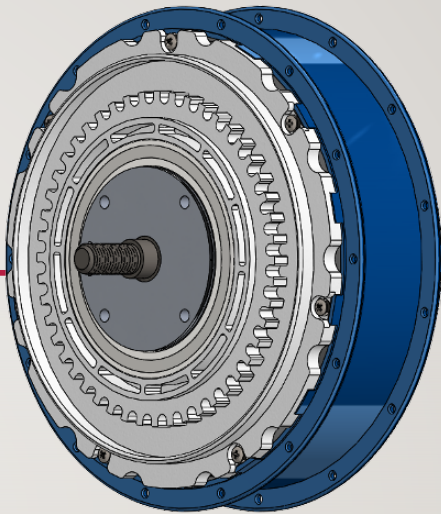
- Voltage : 36Vdc
- Rated output power : 300W, Max. 750W
- Rated torque 15.0Nm、 Max. Torque: 45Nm
- Rated speed : 200rpm
- Weight : 2.0kg
- Waterproof performance : IP56

Ex.2 : Electric wheelchair



- Voltage : 24Vdc
- Rated output power : 100W, Max. 180W
- Rated torque 6.0Nm、 Max. Torque: 30Nm
- Rated speed : 100rpm
- Weight : 1.8kg
- Waterproof performance : IP56

Ex.3 : Electric wheelchair



- Voltage : 24Vdc
- Rated output power : 150W, Max. 500W
- Rated torque 35.0Nm、 Max. Torque: 70Nm
- Rated speed : 40rpm
- Weight : 2.5kg
- Waterproof performance : IP56

SPOKE TYPE

- Spoke types are required when used for large wheels.
- You can use the bicycle wheels as they are.

URETHANE TYPE

- Easily installed instead of casters to change to wheel-motor.
- Ideal for low load carrier equipment and senior cars used indoors



RUBBER TIRE TYPE

- In-wheel motor with rubber tires when used outdoors.
- Even if there are slight irregularities or small stones, it is perfectly fine.

THANK YOU FOR WATCHING

* For more detail info, please contact us directly!

