

## 1. GENERAL INFORMATION

### 1.1 Scope of this leaflet

Congratulations on your purchase of a Sturmey-Archer internal gear hub. For the best performance, please follow instructions in this leaflet. Please contact your dealer if any problems are experienced with these products.

**Riding the gear hub out of the adjustment may cause damage to the internal parts and possible malfunction !**

This leaflet refers to the following DUOMATIC kick shift 2-speed hubs:

- ⊙ Type S2 2-speed freewheel hub ,without brake
- ⊙ Type S2C 2-speed hubs, with coaster brake.

### 1.2 Lubrication

No routine lubrication is required. During a major service, the hub greases should be replenished or replaced especially for transmission parts of internal hub. Please contact your Sturmey-Archer dealer who is equipped to carry this out.

### 1.3 Gear Changing

Gear shifting is activated by back pedaling slightly. Different chainring and sprocket combinations will require a different back pedal angle to activate shifting.

### 1.4 Gear Ratio

|                      |     |                      |      |
|----------------------|-----|----------------------|------|
| 1 <sup>st</sup> Gear | 1.0 | 2 <sup>nd</sup> Gear | 1.38 |
|----------------------|-----|----------------------|------|

### 1.5 Brake Operation

#### 1.5.2 S2C, B2C

The coaster brake is activated by back-pedaling. To apply maximum braking effort, begin brake application when the pedals are horizontal. When descending down a long steep slope it is advisable to apply front and rear brakes alternately to prevent the coaster brake from overheating.

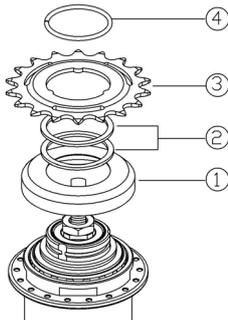
## <NOTICE> FREEWHEELING TICKING

- The ticking sound when freewheeling comes from the pawl-ratchet. It is normal.
- The ticking sound in each gear is different because there are two different pawl-ratchet sets relating to high gear and low gear.

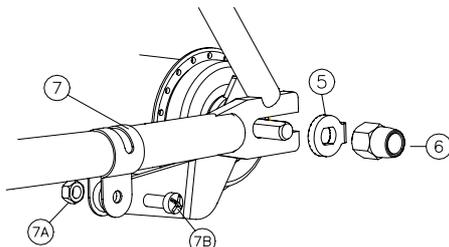
## 2. INSTALLATION

### 2.1 S2C

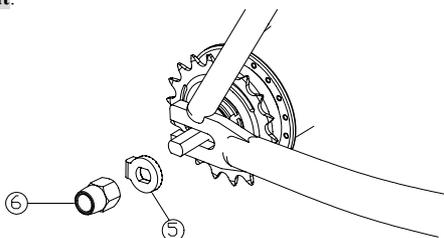
1. Build hub into complete wheel set.
2. Fit the dust-cup (1), two spacers (2), sprocket (3), circlip (4) onto the driver.



3. Put the hub axle into the rear fork end and place the chain around the sprocket (4).
4. Fit the lock-washer (5) \ dome nut (6) on the left side of the axle. **Screw the nut finger tight.**
5. Fit brake arm into brake arm clip (7) with nut (7A) and bolt (7B). **Do not tighten at this point.**



6. Locate the right-side lock-washer (5) and dome nut (6), **Do not tighten nuts at this point.**



7. Align the wheel and tension the chain. Tighten both dome nuts to **28Nm** and the brake arm clip (14) nut to **7Nm**.

### 2.2 S2 hub without brake.

See section 2.1. No dust-cap (1) and spacers (2) requirement in Step 2. Step 5 is not applicable.