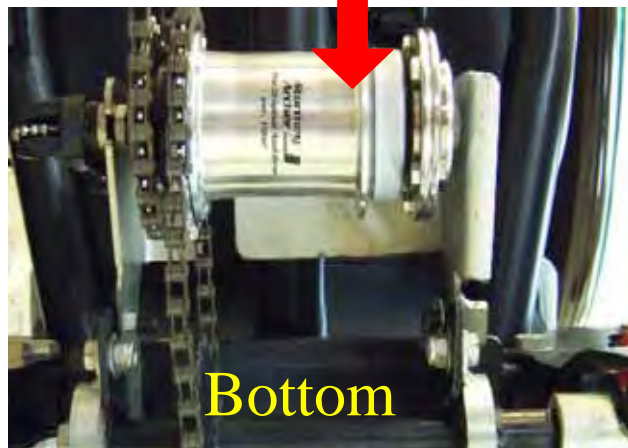
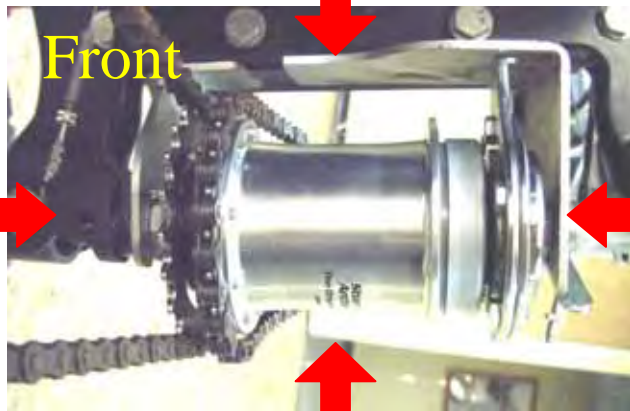
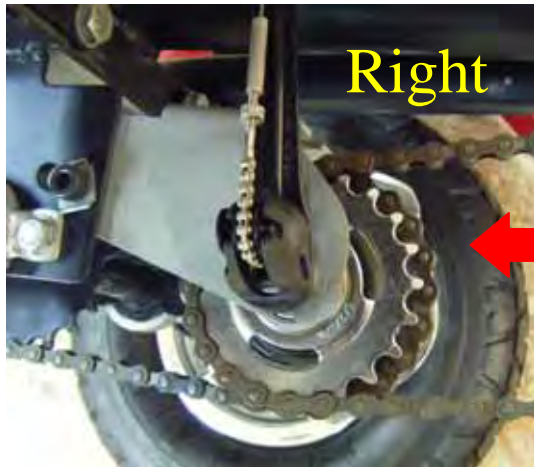
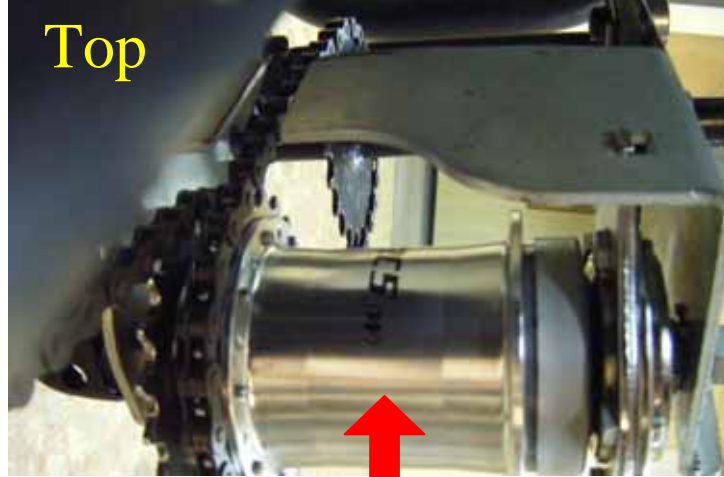
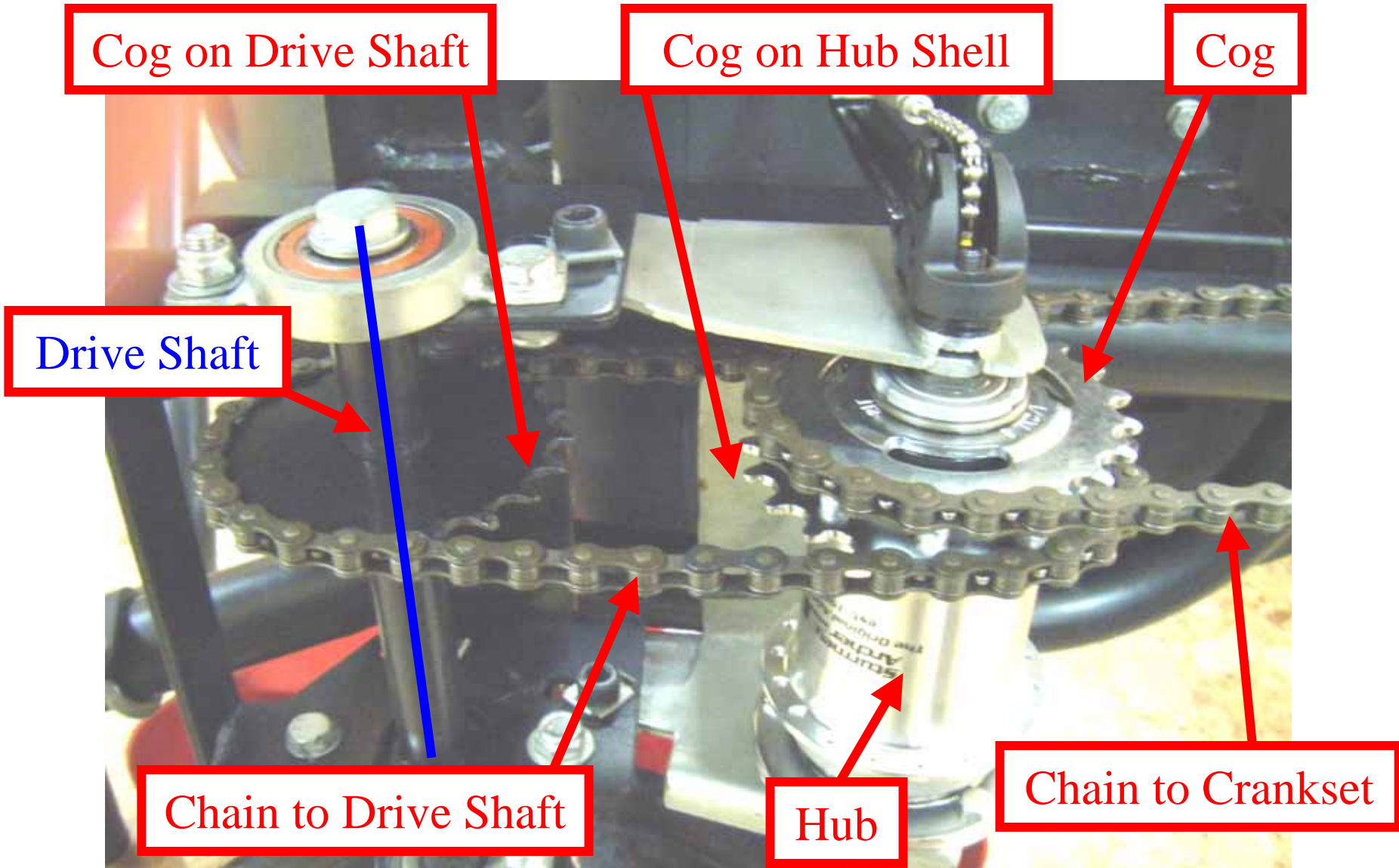


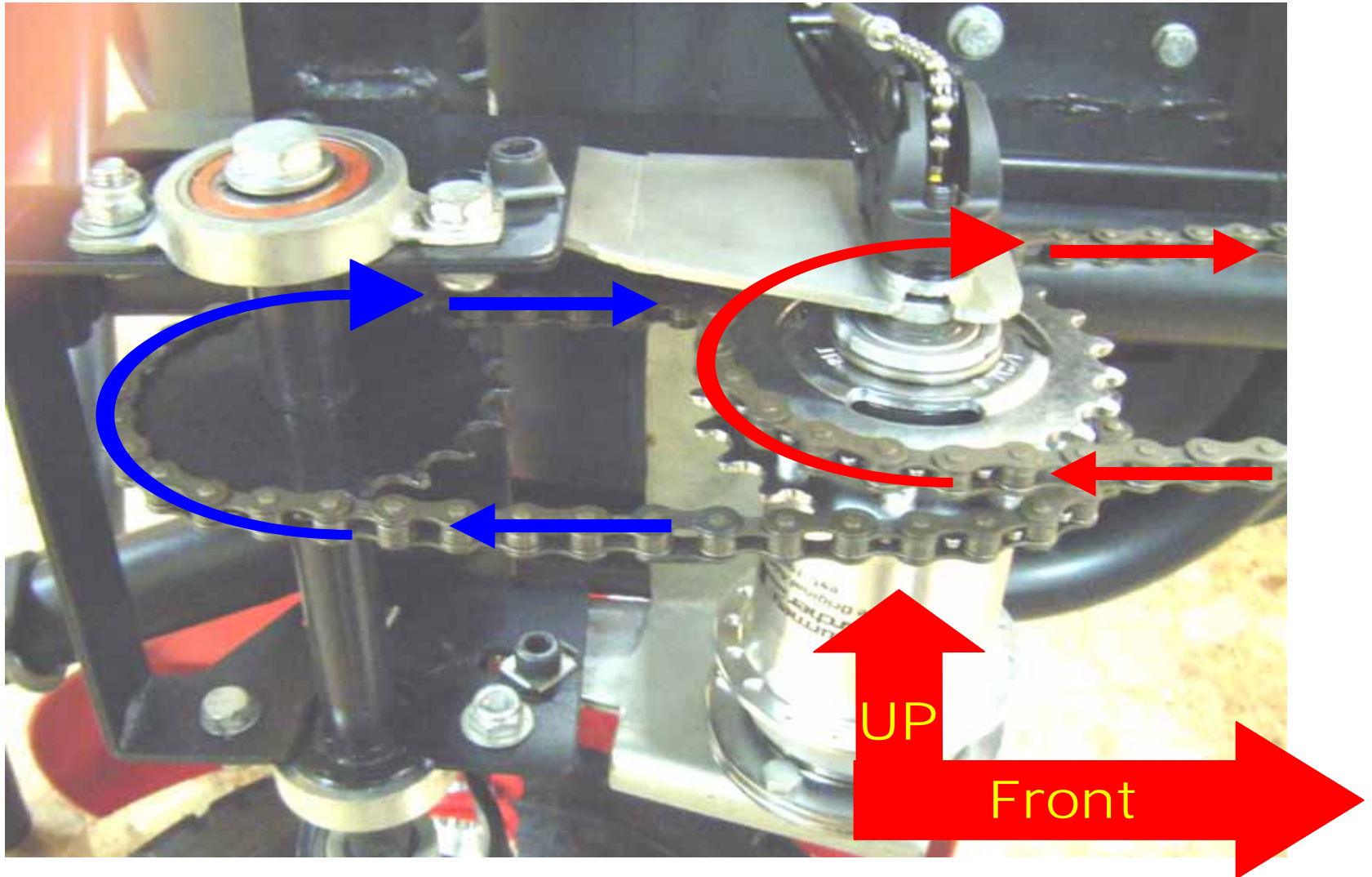
# Information of QSRC Hubs Assembling



# Transmission General Arrangement

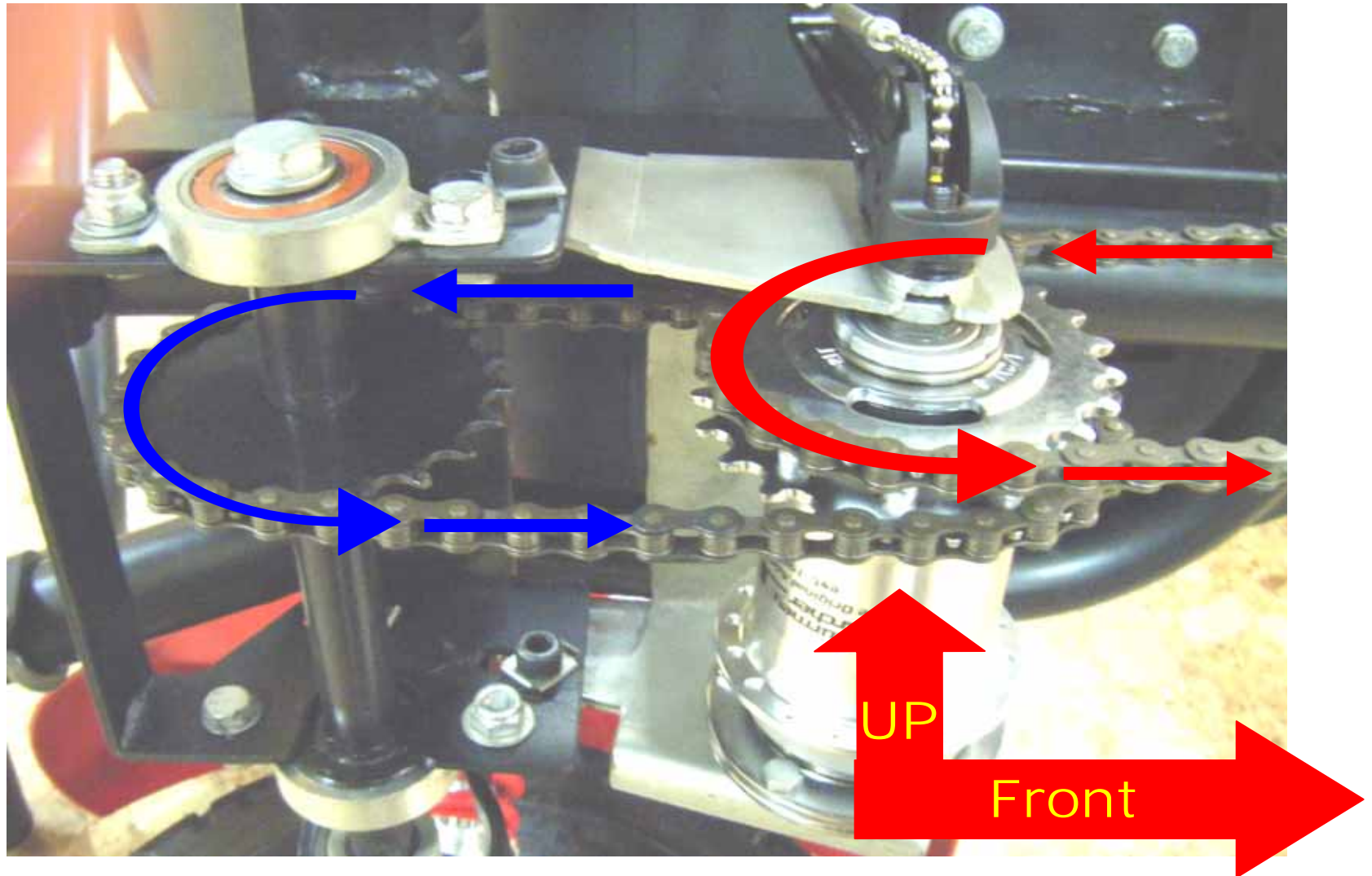


# System Moving Forward

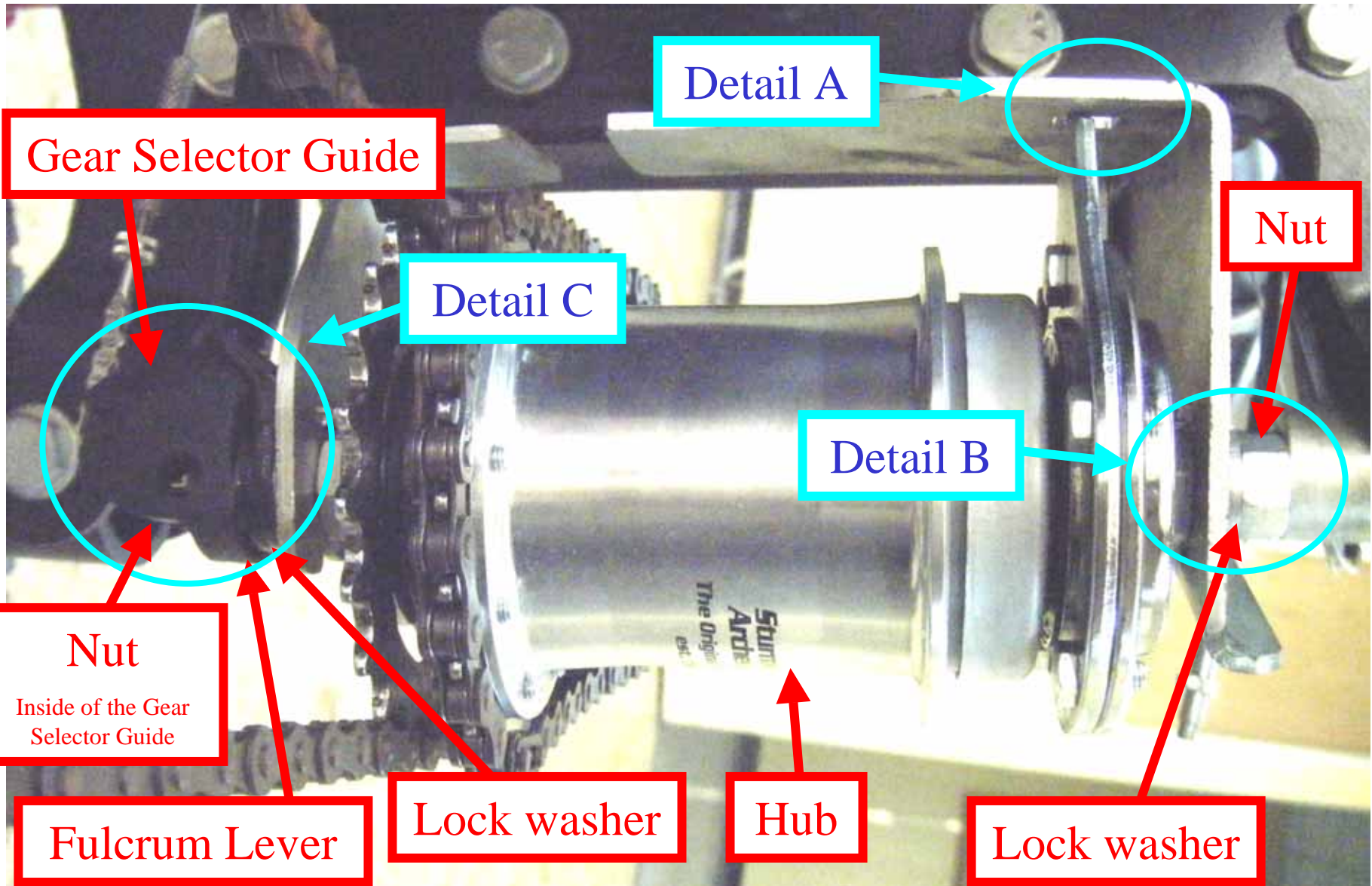




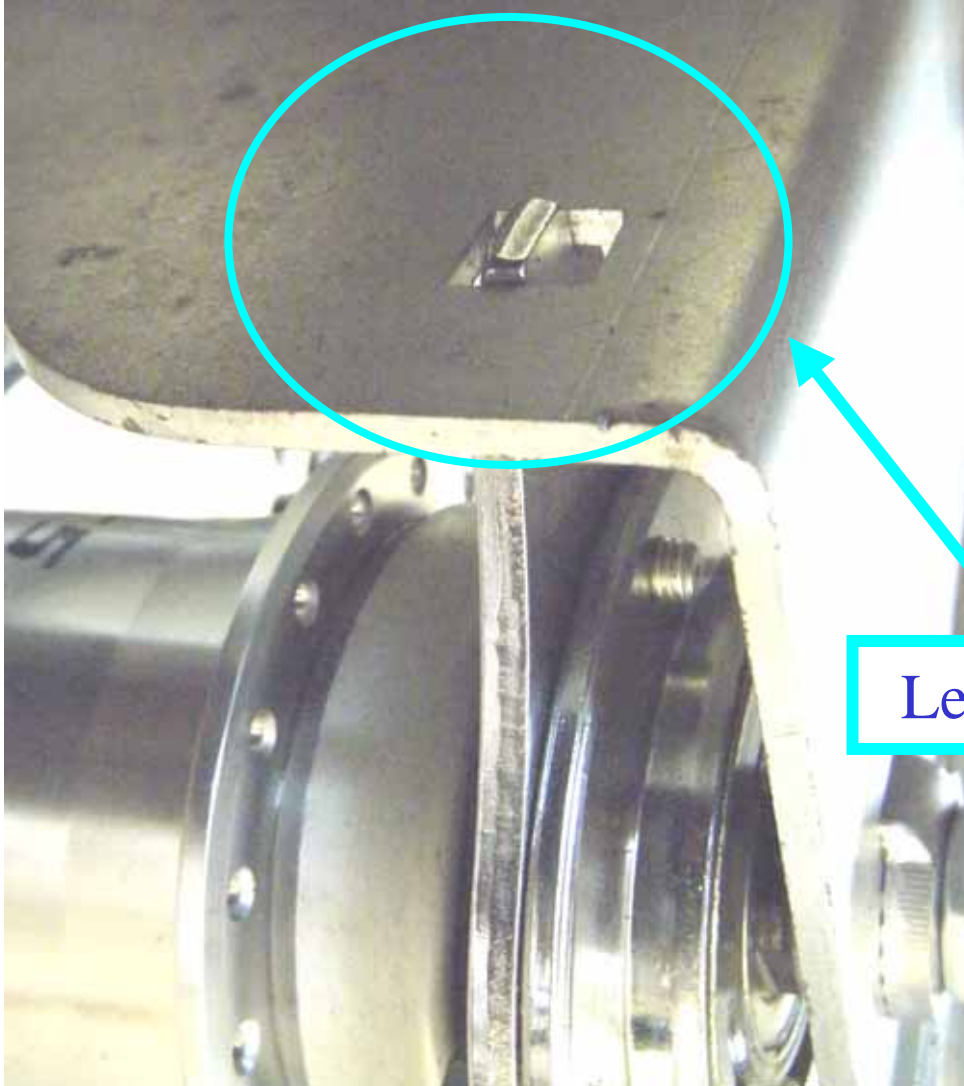
# System Moving Backward



# Hub General Arrangement



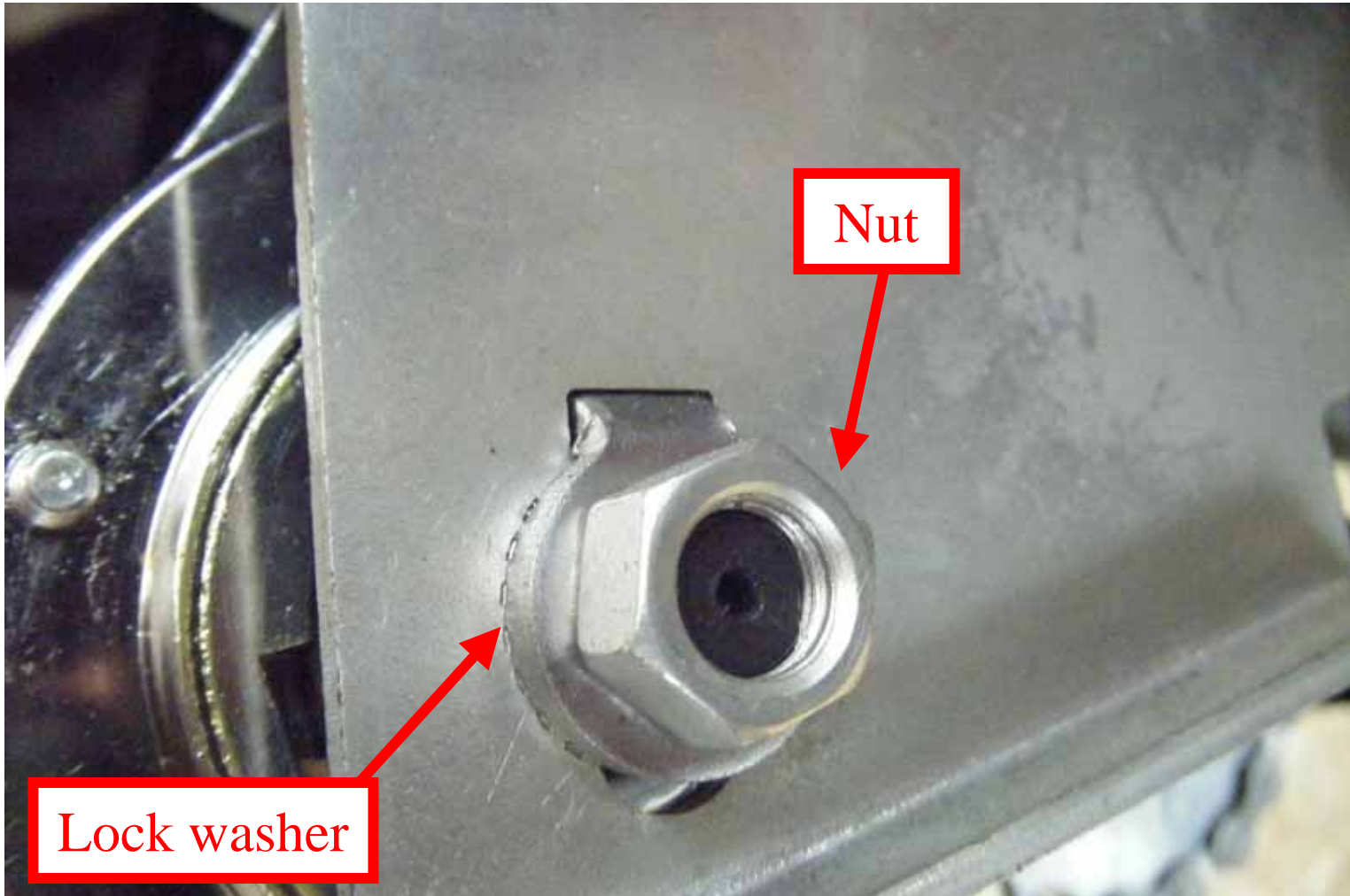
# Detail A



Lever end must be fastened



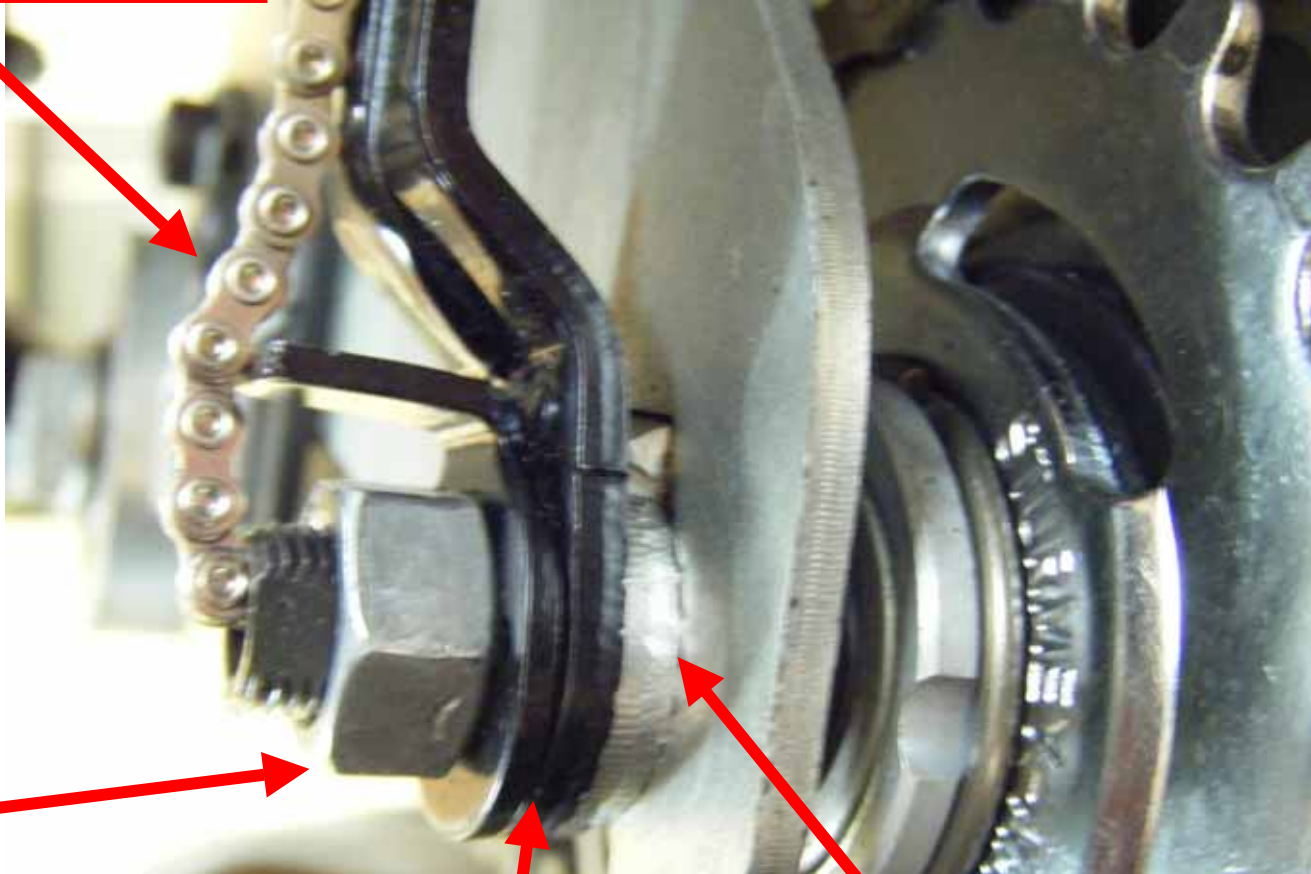
# Detail B





# Detail C

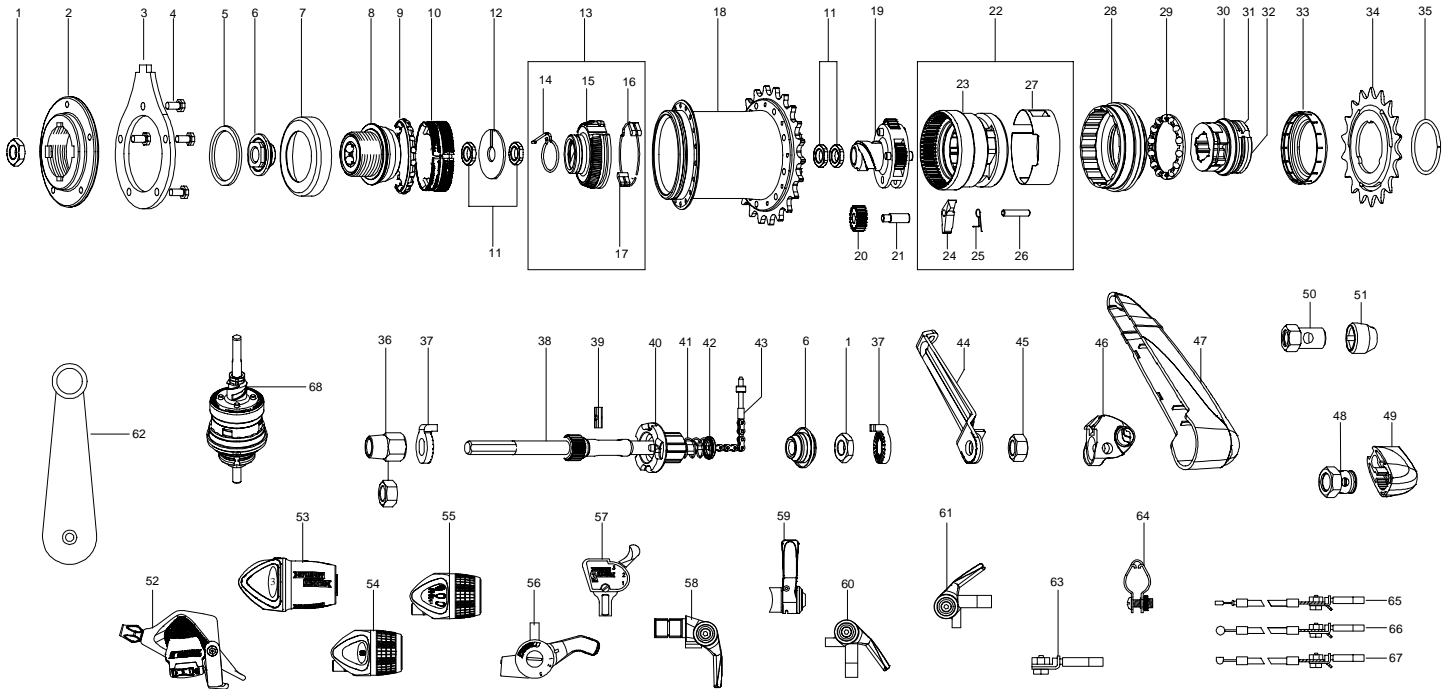
Indicator



Nut

Fulcrum Lever

Lock washer



Item No.	Sales No.	Description	Item No.	Sales No.	Description	Item No.	Sales No.	Description
1	HMN405	Cone Locknut-4.8t	29	HSA438	Ball Cage Assembly	49	HSL884	Cover for Short Guide Nut – Black
2	HSH499	Reversible Coaster Clutch	30	HSA407	Driver Assembly		HSL906	Cover for Short Guide Nut – Silver
3	HSH500	Bracket for Reversible Coaster Clutch	31	HSA102	Outer Dustcap	50	HMN129	Guide Nut – Standard
4	HMB424	Screw M5*L10.2 – 5 off	32	HSA284	Ball Cage Assembly R.H.	51	HSL711	Indicator Guard
5	HMW522	Spacer – 2mm	33	HSL871	Plastic Sprocket Dustcap	52	HSJ943	DLS30 Shifter w/Cable
6	HSA101	Cone	34	HSL 854	Sprocket 13T(Chrome)	53	HSJ978	TSS37 Shifter w/Cable
7	HSH506	Coaster Cone Dustcap		HSL 852	Sprocket 14T(Chrome)	54	HSJ977	TSS36 Shifter w/Cable
8	HSH501	QS-RC Coaster Cone		HSL 850	Sprocket 15T(Chrome)	55	HSJ939	TSS33 Shifter w/Cable
9	HSA164	L.H. Ball Cage Assembly		HSL 848	Sprocket 16T(Chrome)	56	HSJ823	SLS3N Thumb Shifter
10	HSH502	QS-RC Brake Shoes		HSL 846	Sprocket 17T(Chrome)	57	HSJ762	SLS3C Trigger Shifter
11	HMN382	Axle Nut		HSL 844	Sprocket 18T(Chrome)	58	HSJ963	SLS30(B-type) Shifter w/ Cable
12	HSH503	QS-RC Brake Actuator Drag Spring Stopper		HSL 836	Sprocket 19T(Chrome)	59	HSJ981	SLS30(S-type) Shifter w/ Cable
13	HSH502	QS-RC Brake Actuator Assy.		HSL 834	Sprocket 20T(Chrome)	60	HSJ962	SLS30(T-type) Shifter w/ Cable
14	HSH504	QS-RC Brake Actuator Drag Spring		HSL 832	Sprocket 21T(Chrome)	61	HSJ995	SLS30(H-type) Shifter w/ Cable
15	HSH476	Brake Actuator		HSL 830	Sprocket 22T(Chrome)	62	HSJ947	CLS3M Shifter
16	HSH494	Brake Actuator Pawl Spring	35	HSL721	Sprocket Circlip	63	HSJ945	CLS30 Shifter
17	HSH493	Brake Actuator Pawl	36	HMN388	Dome Nut-13/32"	64	HSJ553	Chainstay Fulcrum Clip Ø15.9mm
18	HSA836	TS/QS Hub Shell Assembly	37	HMW518	Lockwasher 4.0t – 9.5mm Slot	HSJ548		Chainstay Fulcrum Clip Ø17.9mm
19	HSA402	Planet Cage		HMW515	Lockwasher 1.8t – 9.5mm Slot	HSJ753		Chainstay Fulcrum Clip Ø19.1mm
20	HSA292	Planet Pinion	38	HSA645	Axle 175mm	65	HSJ102	SLS3C Shifter Cable w/Anchorage & 1450mm Black Casing
21	HSA401	Pinion Pin	39	HSA295	Axle Key	66	HSJ802	SLS3N Shifter Cable w/Anchorage & 1400mm Black Casing
22	HSA554	Gear Ring Assembly	40	HSA536	Clutch	67	HSJ887	Twist Shifter Cable w/Anchorage & 1420mm Black Casing
23	HSA558	Gear Ring	41	HSA128	Clutch Spring	68	HSX172	QS-RC3 Internal Assembly
24	HSA119	Pawl for Gear Ring	42	HSA129	Cap for Clutch Spring			
25	HSA120	Pawl Spring	43	HSA420	Indicator (Mark 5)			
26	HSA415	Pawl Pin	44	HSJ905	Fulcrum Lever w/Locating Washer			
27	HSA542	Drag Spring	45	HMN128	L.H. Axle Nut			
28	HSA437	Ball Ring	46	HSA650	Gear Selector Guide			
			47	HSA620	Gear Selector Guide Full Cover			
			48	HMN420	Guide Nut – Short			

**Sun Race Sturmey-Archer Inc.**  
No.51, Hai-Shan-Jung St., Hai-Hu Village,  
Lu-Ju City, Taoyuan County 338, Taiwan  
Tel: +886(3)354-3900, Fax: +886(3)354-2858  
http://www.sunrace.com; www.sturmey-archer.com  
E-mail: info@sunrace.com

**Sun Race Sturmey-Archer Europe**  
Keienbergweg 79, 1101 GE Amsterdam,  
The Netherlands  
Tel: +31(20)609-0221, Fax: +31(20)609-0211  
http://www.sunrace.com; www.sturmey-archer.com  
E-mail: info@sunrace.nl

**Sun Race Sturmey-Archer USA**  
1436 Second Street #409, Napa, CA 94559 USA  
Tel: +1(707)259-6700, Fax: +1(707)259-6710  
http://www.sunrace.com; www.sturmey-archer.com  
E-mail: info@sunrace.com

## 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 QS- RC3 gear hub with reverse drive.

### 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

Continue pedaling, but ease pressure on the pedals and select the gear required. If the bicycle is stationary simply select gear required.

### 1.4 Gear Ratio

1<sup>st</sup> Gear 0.75 | 2<sup>nd</sup> Gear 1.0 | 3<sup>rd</sup> Gear 1.33

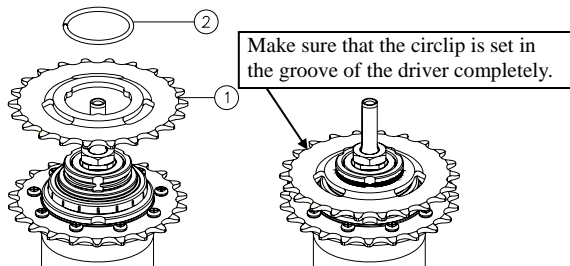
### 1.5 Back pedaling

Pedal backwards when the vehicle has come to a standstill and then the vehicle will move backwards. Reverse gear is direct drive. It is normal that a click from inside the hub when back pedaling in gear 3.

**⚠ Do not pedal back suddenly while the vehicle is moving forward.**

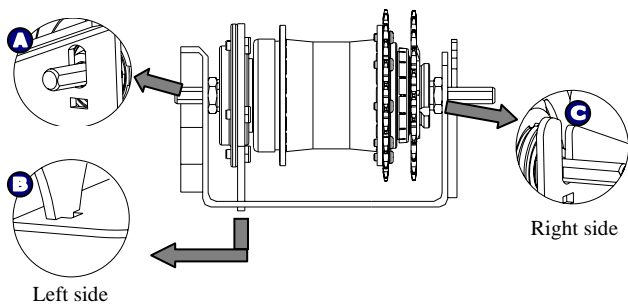
## 2. INSTALLATION

1. Fit the sprocket (1), circlip (2) onto the hub driver.



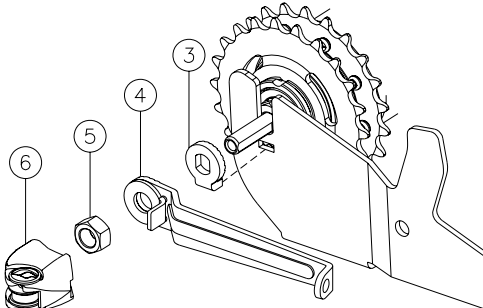
2. Set the chain and internal gear hub into the frame.

3. Put the left side of the axle into the oval hole of the frame (Fig. A). Set the bracket of the reverse clutch into the hole in the bottom of the frame (Fig. B), then put the right side the axle into the slot (Fig. C)



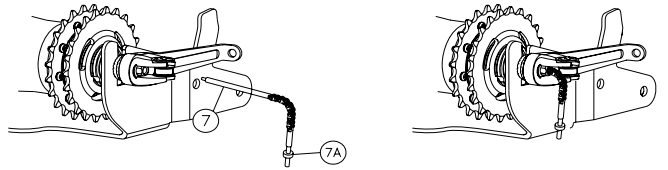
4. Fit the lock-washer (3), hex nut (5) on the left side of the axle. **Screw the nut finger tight.**

5. Locate the lock-washer (3), fulcrum lever (4), hex nut (5) and guide pulley set (6) on the right side, **Do not tighten nuts at this point.** Align the wheel, tension the chain and ensure the fulcrum lever (4) is parallel with the chainstay.

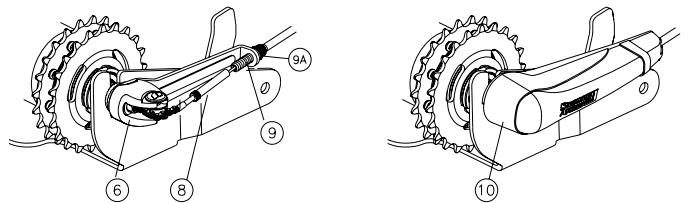


6. Tighten both axle nuts to **28Nm**.

7. Fit the indicator rod (7) into the axle and screw it finger tight. Put the indicator cover (10) on if necessary but not snap on at this point.



8. Ensure components are fitted to the right side of axle. Unscrew the indicator by up to half a turn if necessary to ensure easy fitment over the guide unit. Connect the indicator (7A) to the cable connector (8).

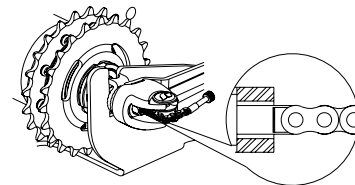


## 3. GEAR ADJUSTMENT

1. Move the indicator cover (10) for easy gear adjustment.

2. Make sure that no more than **2.5mm** of axle protrudes from the axle hex nut.

3. Select 2<sup>nd</sup> gear and turn the pedal crank forward to ensure the gear is engaged. Turn the cable adjuster (9) or cable connector (8) **until the end of the indicator rod is level with the end of the axle**, as show in diagram.



4. Tighten the cable-adjusting locknut (9A) and indicator locknut (7A) to lock in adjustment.

5. Select 3<sup>rd</sup> gear position, rotate the pedal crank, change back to 2<sup>nd</sup> gear and check adjustment. Retry the stages above if the gear changing is not correct.

6. If there is an indicator cover (10), snap it firmly onto the guide pulley set (6).