

# Wheel Balancing

## WHEEL AND TIRE SYSTEM

### 5. Wheel Balancing

#### A: ADJUSTMENT

##### NOTE:

Change the setting of wheel balancer to adhesive type weight if adhesive type weight is adopted.

1) Remove the balance weights.

##### CAUTION:

- Be careful not to damage the wheel.
- Completely remove the double-sided tape of the adhesive weight from the wheel.

2) Using the wheel balancer, measure wheel balance.

3) Select a weight close to the value measured by wheel balancer.

##### CAUTION:

Use SUBARU genuine balance weights.

| Balance weight part number<br>(Knock-on type weight for steel wheels) | Weight         |
|-----------------------------------------------------------------------|----------------|
| 28101TC000                                                            | 5 g (0.18 oz)  |
| 28101SA060                                                            | 10 g (0.35 oz) |
| 28101SA070                                                            | 15 g (0.53 oz) |
| 28101SA080                                                            | 20 g (0.71 oz) |
| 28101SA090                                                            | 25 g (0.88 oz) |
| 28101SA160                                                            | 30 g (1.06 oz) |
| 28101SA170                                                            | 35 g (1.23 oz) |
| 28101SA180                                                            | 40 g (1.41 oz) |
| 28101SA190                                                            | 45 g (1.59 oz) |
| 28101SA200                                                            | 50 g (1.76 oz) |
| 28101SA210                                                            | 55 g (1.94 oz) |
| 28101SA220                                                            | 60 g (2.12 oz) |

| Balance weight part number<br>(Knock-on type weight for aluminum wheel) | Weight         |
|-------------------------------------------------------------------------|----------------|
| 28101SA000                                                              | 5 g (0.18 oz)  |
| 28101SA010                                                              | 10 g (0.35 oz) |
| 28101SA020                                                              | 15 g (0.53 oz) |
| 28101SA030                                                              | 20 g (0.71 oz) |
| 28101SA040                                                              | 25 g (0.88 oz) |
| 28101SA100                                                              | 30 g (1.06 oz) |
| 28101SA110                                                              | 35 g (1.23 oz) |
| 28101SA120                                                              | 40 g (1.41 oz) |
| 28101SA130                                                              | 45 g (1.59 oz) |
| 28101SA140                                                              | 50 g (1.76 oz) |
| —                                                                       | 55 g (1.94 oz) |
| 28101SA150                                                              | 60 g (2.12 oz) |

| Balance weight part number<br>(Adhesive type weight for aluminum wheel) | Weight            |
|-------------------------------------------------------------------------|-------------------|
| 28101AG002                                                              | 5 g (0.18 oz)     |
| 28101AG012                                                              | 7.5 g (0.26 oz)   |
| 28101AG022                                                              | 10 g (0.35 oz)    |
| 28101AG032                                                              | 12.5 g (0.44 oz)  |
| 28101AG042                                                              | 15 g (0.53 oz)    |
| 28101AG052                                                              | 17.5 g (0.62 oz)  |
| 28101AG062                                                              | 20 g (0.71 oz)    |
| 28101AG072                                                              | 22.5 g (0.79 oz)  |
| 28101AG082                                                              | 25 g (0.88 oz)    |
| 28101AG092                                                              | 27.5 g (0.97 oz)  |
| 28101AG102                                                              | 30 g (1.06 oz)    |
| 28101AG112                                                              | 32.5 g (1.15 oz)  |
| 28101AG122                                                              | 35 g (1.23 oz)    |
| 28101AG132                                                              | 37.5 g (1.32 oz)  |
| 28101AG142                                                              | 40 g (1.41 oz)    |
| 28101AG152                                                              | 42.5 g (1.50 oz)  |
| 28101AG162                                                              | 45 g (1.59 oz)    |
| 28101AG172                                                              | 47.5 g (1.68 oz)  |
| 28101AG182                                                              | 50 g (1.76 oz)    |
| 28101AG192                                                              | 52.5 g (1.85 oz)  |
| 28101AG202                                                              | 55 g (1.94 oz)    |
| 28101AG212                                                              | 57.5 g (2.03 oz)  |
| 28101AG222                                                              | 60 g (2.12 oz)    |
| 28101AG232                                                              | 62.5 g (2.20 oz)  |
| 28101AG242                                                              | 65 g (2.29 oz)    |
| 28101AG252                                                              | 67.5 g (2.38 oz)  |
| 28101AG262                                                              | 70 g (2.47 oz)    |
| 28101AG272                                                              | 72.5 g (2.56 oz)  |
| 28101AG282                                                              | 75 g (2.65 oz)    |
| 28101AG292                                                              | 77.5 g (2.73 oz)  |
| 28101AG302                                                              | 80 g (2.82 oz)    |
| 28101AG312                                                              | 82.5 g (2.91 oz)  |
| 28101AG322                                                              | 85 g (3.00 oz)    |
| 28101AG332                                                              | 87.5 g (3.09 oz)  |
| 28101AG342                                                              | 90 g (3.17 oz)    |
| 28101AG352                                                              | 92.5 g (3.26 oz)  |
| 28101AG362                                                              | 95 g (3.35 oz)    |
| 28101AG372                                                              | 97.5 g (3.44 oz)  |
| 28101AG382                                                              | 100 g (3.53 oz)   |
| 28101SA300                                                              | 102.5 g (3.62 oz) |
| 28101SA310                                                              | 105 g (3.70 oz)   |
| 28101SA320                                                              | 107.5 g (3.79 oz) |
| 28101SA330                                                              | 110 g (3.88 oz)   |
| 28101SA340                                                              | 112.5 g (3.97 oz) |
| 28101SA350                                                              | 115 g (4.06 oz)   |
| 28101SA360                                                              | 117.5 g (4.14 oz) |
| 28101SA370                                                              | 120 g (4.23 oz)   |

4) Install the selected weight to the point designated by the wheel balancer.

## CAUTION:

- Degrease the wheel surface where the adhesive type weight will be applied.
- Press the adhesive type weight by 25 N (2.5 kgf, 5.6 lbf) or more per 5 g (0.18 oz) for 2 seconds or more and attain full adhesion.
- Total application of the adhesive type weight should be 120 g (4.23 oz) or less.

5) Using the wheel balancer, measure the wheel balance again. Check that wheel balance is correctly adjusted.

## B: INSPECTION

1) When a tire is replaced or worn, proper wheel balance may be lost. Check the tire dynamic balance and repair if necessary.

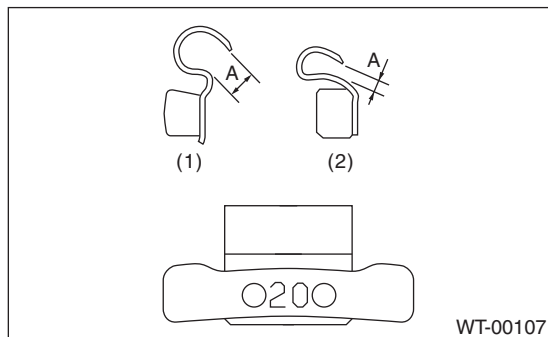
2) When checking the dynamic balance, use the wheel balancer. Insert the balance weights into the top and the rear side of rim.

3) With some types of balancer, wheels may be damaged. When adjusting the wheel balance, use a proper balancer.

4) Use Subaru genuine balance weights.

## NOTE:

- Balance weights are not available in 55 g (1.94 oz) size for aluminum wheels.
- Balance weights can be used for any 15 to 18-inch wheels.



- (1) Knock-on type weight for aluminum wheel  
(2) Knock-on type weight for steel wheel

## Service limit A:

**Knock-on type weight for steel wheel:**

**2.0 mm (0.079 in)**

**Knock-on type weight for aluminum wheel:**

**5.0 mm (0.197 in)**