

Inspection and adjustment of front wheel alignment

caution After adjusting the front wheel alignment, perform calibration to let the ASC-ECU learn the neutral point of the steering wheel sensor. <Vehicles equipped with ASC> (Refer to Group 35C - On-Board Maintenance, Steering Wheel Sensor Calibration →.)

1. **Make** sure the front suspension, steering system, wheels and tires are in good condition before the wheel alignment measurement.

2. Stop the vehicle on a level surface and measure the wheel alignment with the front wheels pointing straight ahead.

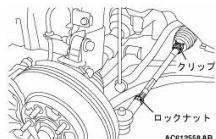
toe-in

Standard value: $1 \pm 2\text{ mm}$

1. To adjust, remove the tie rod clip and loosen the lock nut, then turn the tie rod left and right in the opposite direction by the same amount.

notes If you turn the left in the forward direction of the vehicle and the right in the backward direction of the vehicle, the toe will move to the out side.

2. **Check** that the steering angle is at the standard value with the turning radius gauge after adjustment (→ refer to Group 37 - Car Maintenance).



camber caster

camber

Standard value:

<2WD>

$0^{\circ}00' \pm 0^{\circ}30'$ (within $0^{\circ}30'$ left/right difference)

<4WD>

$0^{\circ}15' \pm 0^{\circ}30'$ (within $0^{\circ}30'$ left/right difference)

caster

Standard value:

<2WD>

$2^{\circ}35' \pm 0^{\circ}30'$ (within $0^{\circ}30'$ left/right difference)

<4WD>

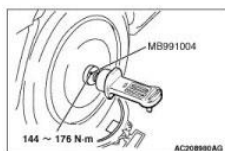
$2^{\circ}25' \pm 0^{\circ}30'$ (within $0^{\circ}30'$ left/right difference)

notes Camber and caster are preset to standard values and are non-adjustable.

caution Do not put the weight of the vehicle on the wheel bearing with the drive shaft nut loosened.

notes For cars with aluminum wheels, measure after tightening the special tool wheel alignment gauge attachment (MB991004) to the specified torque.

Tightening torque: 144 to 176 N m



Side slip amount

caution Even if the amount of side slip is within the standard value range, be sure to check the toe-in, camber, and caster as wheel alignment.

Using a side slip tester, check that the amount of side slip is within the standard value range.

Standard value: $0 \pm 5\text{ mm}$ (per 1 m)

Checking and adjusting the rear wheel alignment

1. Maintain the rear suspension, wheels and tires in normal condition before wheel alignment measurement.
2. Stop the vehicle on a level surface and measure the wheel alignment.

toe-in

Standard value: 3 ± 2 mm

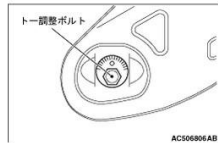
If it deviates from the standard value, adjust as follows.

Adjust by turning the toe adjustment bolt (mounting bolt inside the control link body).

Left wheel: Clockwise (+) toe -in

Right wheel: Clockwise (-) Toe

-in changes by approx.

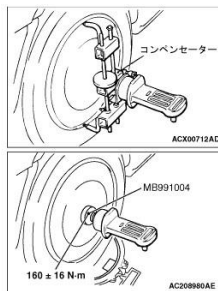


camber

Standard value:

$-0^{\circ}40' \pm 0^{\circ}30'$ (left/right difference within $0^{\circ}30'$) <2WD>

$-0^{\circ}10' \pm 0^{\circ}30'$ (left/right difference within $0^{\circ}30'$) <4WD>



notes

- Measure camber using a compensator. <2WD>
- For cars with aluminum wheels, measure after tightening the special tool wheel alignment gauge attachment (MB991004) to the specified torque. <4WD>
- Camber is pre-set to a standard value and is non-adjustable.