

SECTION **FSU**  
FRONT SUSPENSION

A  
B  
C  
D  
E  
F  
G  
H  
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J  
K  
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M  
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P

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CONTENTS

<b>SERVICE INFORMATION</b> .....	2	Removal and Installation .....	10	F
<b>PRECAUTIONS</b> .....	2	Disassembly and Assembly .....	10	
Precaution .....	2	<b>STABILIZER BAR</b> .....	12	G
<b>PREPARATION</b> .....	3	Removal and Installation .....	12	
Special Service Tool .....	3	<b>TRANSVERSE LINK</b> .....	14	H
Commercial Service Tool .....	3	Removal and Installation .....	14	
<b>NOISE, VIBRATION, AND HARSHNESS</b>		<b>FRONT SUSPENSION MEMBER</b> .....	16	I
<b>(NVH) TROUBLESHOOTING</b> .....	5	Removal and Installation .....	16	
NVH Troubleshooting Chart .....	5	<b>SERVICE DATA AND SPECIFICATIONS</b>		
<b>FRONT SUSPENSION ASSEMBLY</b> .....	6	<b>(SDS)</b> .....	19	J
Component .....	6	General Specification (Front) .....	19	
On-vehicle Service .....	6	Front Wheel Alignment (Unladen*1) .....	19	
Front Wheel Alignment .....	7	Lower Ball Joint .....	20	
<b>COIL SPRING AND SHOCK ABSORBER</b> .....	10	Wheelarch Height (Unladen*) .....	20	K

# PRECAUTIONS

< SERVICE INFORMATION >

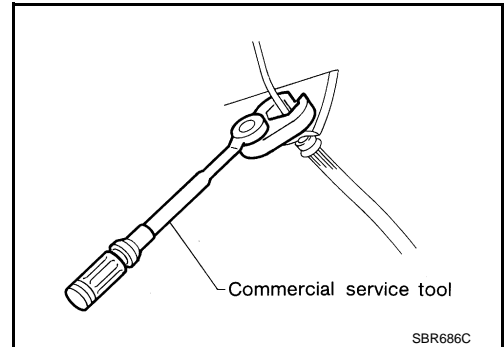
## SERVICE INFORMATION

### PRECAUTIONS

#### Precaution

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- When installing rubber parts, final tightening must be carried out under unladen condition\* with tires on ground.  
Oil will shorten the life of rubber bushings. Be sure to wipe off any spilled oil.  
\*: Fuel, engine coolant and engine oil full. Spare tire, jack, hand tools and mats in designated positions.
- After installing removed suspension parts, check wheel alignment and adjust if necessary.
- Use flare nut wrench when removing or installing brake tubes.
- Always torque brake lines when installing.
- Lock nuts are un reusable parts; always use new ones.  
When replacing, do not wipe the oil off the new lock nut before tightening.



# PREPARATION

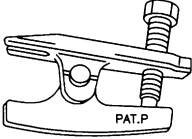
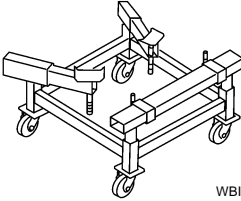
< SERVICE INFORMATION >

## PREPARATION

### Special Service Tool

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The actual shapes of Kent-Moore tools may differ from those of special service tools illustrated here.

Tool number (Kent-Moore No.) Tool name	Description
HT72520000 (J25730-A) Ball joint remover   NT146	Removing outer tie-rod end and lower ball joint
KV101J0010 (J-47242) Engine support table   WBIA0658E	Front suspension member removal

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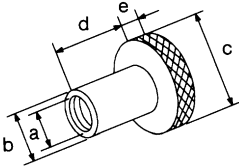
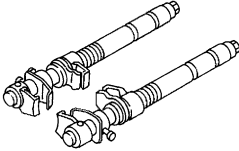
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### Commercial Service Tool

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Tool name	Description
Attachment wheel alignment   NT148	Measure wheel alignment <b>a: Screw M24 x 1.5 pitch</b> <b>b: 35 mm (1.38 in) dia.</b> <b>c: 65 mm (2.56 in) dia.</b> <b>d: 56 mm (2.20 in)</b> <b>e: 12 mm (0.47 in)</b>
Spring compressor   NT717	Removing and installing coil spring

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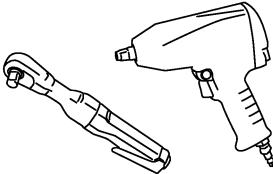
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# PREPARATION

## < SERVICE INFORMATION >

Tool name	Description
<p>Engine lifting bracket</p>  <p>LEIA0062E</p>	<p>Removing and installing suspension member</p>
<p>Power tool</p>  <p>PBIC0190E</p>	<p>Loosening bolts and nuts</p>

# NOISE, VIBRATION, AND HARSHNESS (NVH) TROUBLESHOOTING

< SERVICE INFORMATION >

## NOISE, VIBRATION, AND HARSHNESS (NVH) TROUBLESHOOTING

### NVH Troubleshooting Chart

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Use the following chart to help you find the cause of the symptom. If necessary, repair or replace these parts.

Reference page		<a href="#">FSU-6</a>	<a href="#">FSU-10</a>	<a href="#">FSU-10</a>	—	<a href="#">FSU-10</a>	<a href="#">FSU-6</a>	<a href="#">FSU-7</a>	<a href="#">FSU-12</a>	<a href="#">FAX-4, "NVH Troubleshooting Chart"</a>	<a href="#">FAX-4, "NVH Troubleshooting Chart"</a>	<a href="#">WT-4, "NVH Troubleshooting Chart"</a>	<a href="#">WT-4, "NVH Troubleshooting Chart"</a>	<a href="#">BR-4, "NVH Troubleshooting Chart"</a>	<a href="#">PS-5, "NVH Troubleshooting Chart"</a>
Possible Cause and SUSPECTED PARTS		Improper installation, looseness	Shock absorber deformation, damage or deflection	Bushing or mounting deterioration	Parts interference	Spring fatigue	Suspension looseness	Incorrect wheel alignment	Stabilizer bar fatigue	DRIVE SHAFT	AXLE	TIRES	ROAD WHEEL	BRAKES	STEERING
Symptom	Noise	x	x	x	x	x	x			x	x	x	x	x	x
	Shake	x	x	x	x		x			x	x	x	x	x	x
	Vibration	x	x	x	x	x				x	x	x			x
	Shimmy	x	x	x	x			x			x	x	x	x	x
	Shudder	x	x	x							x	x	x	x	x
	Poor quality ride or handling	x	x	x	x	x		x	x		x	x	x		

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# FRONT SUSPENSION ASSEMBLY

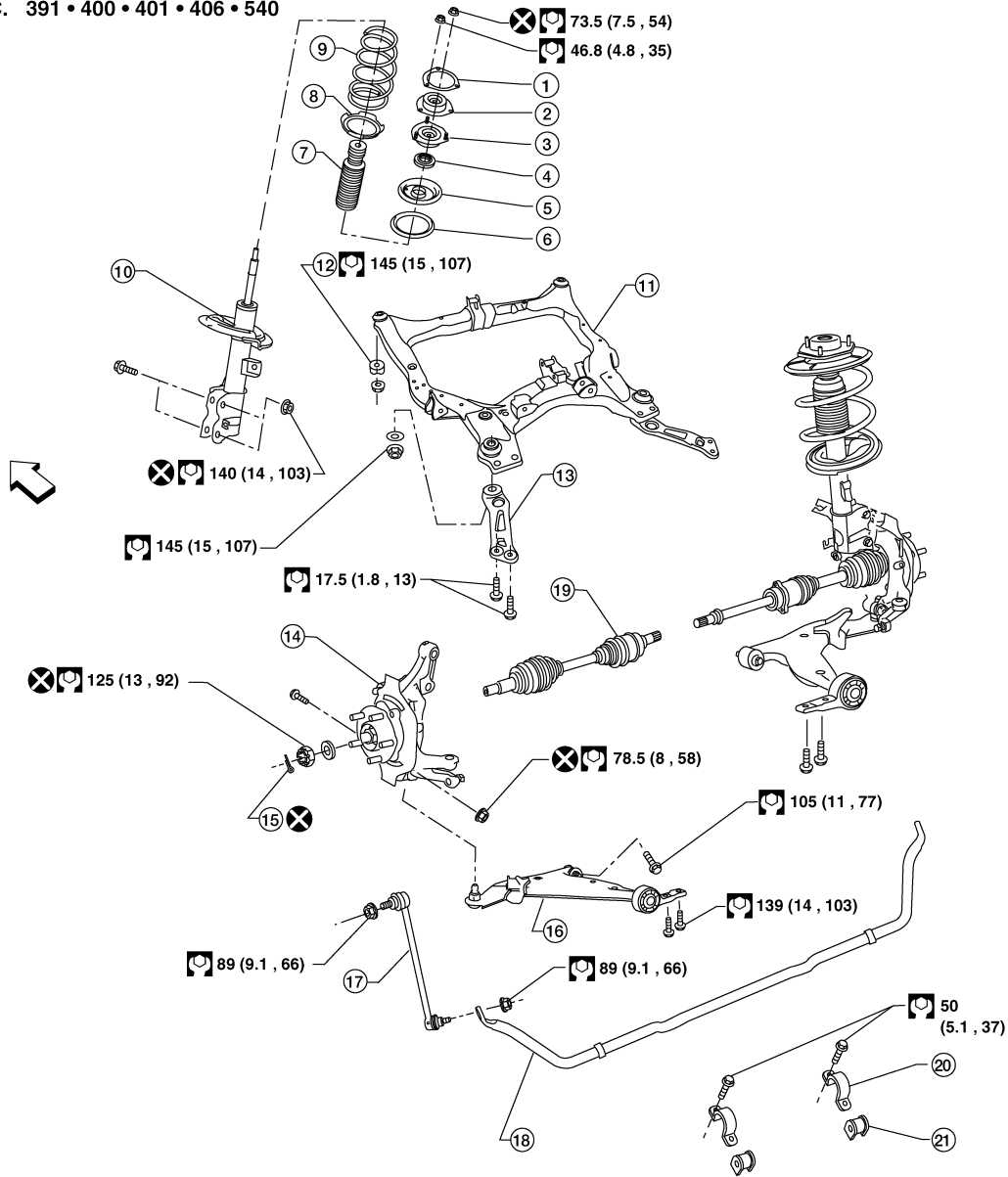
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## FRONT SUSPENSION ASSEMBLY

Component

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SEC. 391 • 400 • 401 • 406 • 540



WEIA0107E

- |                            |   |                               |
|----------------------------|---|-------------------------------|
| 1. Strut spacer            | 2. Strut mount insulator                    | 3. Mounting insulator bracket |
| 4. Thrust bearing          | 5. Upper spring seat                        | 6. Upper rubber seat          |
| 7. Dust cover              | 8. Lower rubber seat                        | 9. Coil spring                |
| 10. Shock absorber (Strut) | 11. Front suspension member                 | 12. Cup                       |
| 13. Member pin stay        | 14. Wheel hub and steering knuckle assembly | 15. Cotter pin                |
| 16. Transverse link        | 17. Connecting rod                          | 18. Stabilizer bar            |
| 19. Drive shaft            | 20. Stabilizer clamp                        | 21. Stabilizer bushing        |

### On-vehicle Service

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### FRONT SUSPENSION PARTS

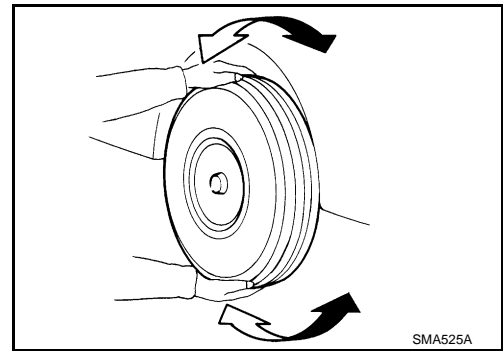
Check the front axle and front suspension parts for any excessive play, cracks, wear, or other damage.

# FRONT SUSPENSION ASSEMBLY

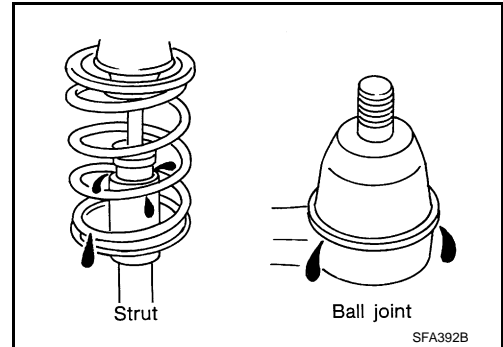
## < SERVICE INFORMATION >

- Raise the vehicle on a hoist and shake each front wheel to check for excessive play.
- Make sure that the cotter pin is inserted in the lower ball joint.
- Retighten all of the axle and suspension nuts and bolts to the specified torque.

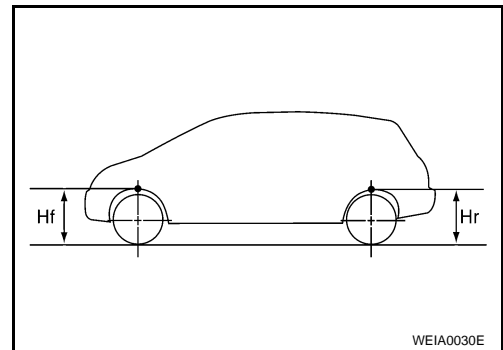
**Tightening torque** : Refer to [FSU-6, "Component"](#).



- Check the strut (shock absorber) for any oil leakage or other damage.
- Check the suspension ball joint for grease leakage and the ball joint dust cover for any cracks or other damage. If the ball joint dust cover is cracked or damaged, replace the transverse link.



- Check the wheelarch height "Hf" and "Hr" from the top of the wheelarch to the ground.
- For proper measurement of the wheelarch height, the vehicle must be unladen\*, parked on a level surface, and tires checked for proper inflation and wear (the tread wear indicators must not be showing).
- \*: Fuel, engine coolant and engine oil full. Spare tire, jack, hand tools and mats in designated positions.
- Bounce the vehicle up and down several times before measuring the height.



**Wheelarch height** : Refer to [FSU-20, "Wheelarch Height \(Unladen\\*\)"](#).

- The wheelarch height is not adjustable. If the height is out of specification, check for worn springs or suspension parts.

## Front Wheel Alignment

INFOID:000000001717820

### DESCRIPTION

#### NOTE:

Before checking the front wheel alignment, be sure to make a preliminary inspection (Unladen\*).

\*: Fuel, engine coolant and engine oil full. Spare tire, jack, hand tools and mats in designated positions.

### PRELIMINARY INSPECTION

- Check the tires for wear and improper inflation. Refer to [WT-29, "Tire"](#).
- Check the wheel runout. Refer to [WT-5, "Inspection"](#).
- Check the front wheel bearings for looseness. Refer to [FAX-5, "On-Vehicle Inspection and Service"](#).
- Check the front suspension for looseness. Refer to [FSU-6, "On-vehicle Service"](#).
- Check the steering linkage for looseness. Refer to [PS-14, "On-Vehicle Service"](#).
- Check that the front shock absorbers work properly.
- Check the vehicle height (posture) in the unladen condition. Refer to [FSU-6, "On-vehicle Service"](#).

### GENERAL INFORMATION AND RECOMMENDATIONS

1. A Four-Wheel Thrust Alignment should be performed.
  - This type of alignment is recommended for any NISSAN vehicle.

# FRONT SUSPENSION ASSEMBLY

## < SERVICE INFORMATION >

- The four-wheel “thrust” process helps ensure that the vehicle is properly aligned and the steering wheel is centered.
  - The alignment machine itself should be capable of accepting any NISSAN vehicle.
  - The alignment machine should be checked to ensure that it is level.
2. Make sure the alignment machine is properly calibrated.
    - Your alignment machine should be regularly calibrated in order to give correct information.
    - Check with the manufacturer of your specific alignment machine for their recommended Service/Calibration Schedule.

## THE ALIGNMENT PROCESS

**IMPORTANT:** Use only the alignment specifications listed in this Service Manual. Refer to [FSU-19, "Front Wheel Alignment \(Unladen\\*1\)"](#).

1. When displaying the alignment settings, many alignment machines use “indicators”: (Green/red, plus or minus, Go/No Go). **Do NOT use these indicators.**
  - The alignment specifications programmed into your alignment machine that operate these indicators may not be correct.
  - This may result in an ERROR.
2. Some newer alignment machines are equipped with an optional “Rolling Compensation” method to “compensate” the sensors (alignment targets or head units). **Do NOT use this “Rolling Compensation” method.**
  - Use the “Jacking Compensation” method. After installing the alignment targets or head units, raise the vehicle and rotate the wheels 1/2 turn both ways.
  - See Instructions in the alignment machine you are using for more information.

## CAMBER, CASTER AND KINGPIN INCLINATION

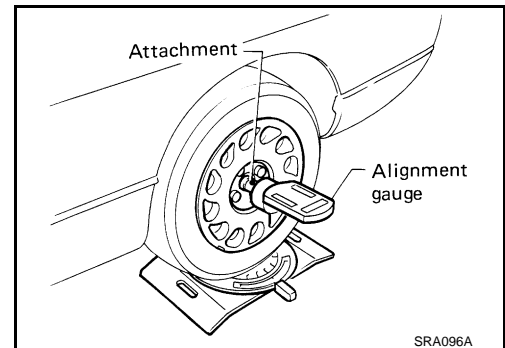
### NOTE:

Camber, caster and kingpin inclination are preset at factory and cannot be adjusted.

1. Measure the camber, caster and kingpin inclination of both the right and left wheels using attachment Tool and a suitable alignment gauge.

**Camber, caster and kingpin inclination** : Refer to [FSU-19, "Front Wheel Alignment \(Unladen\\*1\)"](#).

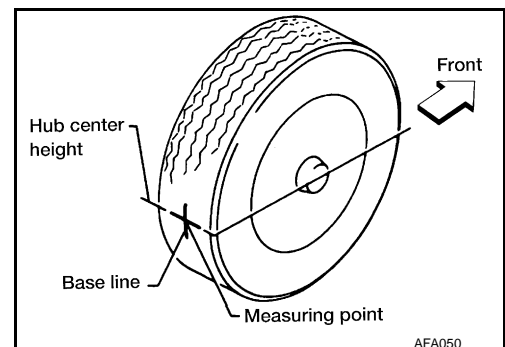
2. If the camber, caster or kingpin inclination is not within specification, inspect the front suspension parts. Replace any damaged or worn out parts.



## TOE-IN

### WARNING:

- Always perform the following procedure on a flat surface.
  - Make sure that no person is in front of the vehicle before pushing it.
1. Bounce the front of vehicle up and down to stabilize the vehicle height (posture).
  2. Push the vehicle straight ahead about 5 m (16 ft).
  3. Put a mark on base line of the tread (rear side) of both front tires at the same height as hub center as shown. These marks are measuring points.





# FRONT SUSPENSION ASSEMBLY

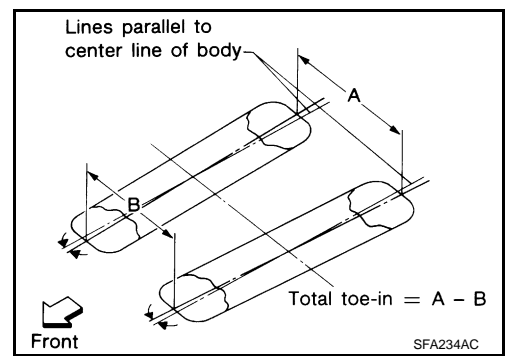
## < SERVICE INFORMATION >

4. Measure the distance "A" on the rear side of the front tires as shown.
5. Push the vehicle slowly ahead to rotate the wheels 180° degrees (1/2 a turn).

**CAUTION:**

**If the wheels have rotated more than 180° degrees (1/2 turn), start this procedure again from the beginning. Never push the vehicle backward.**

6. Measure the distance "B" on the front side of the front tires at the same marks as shown.

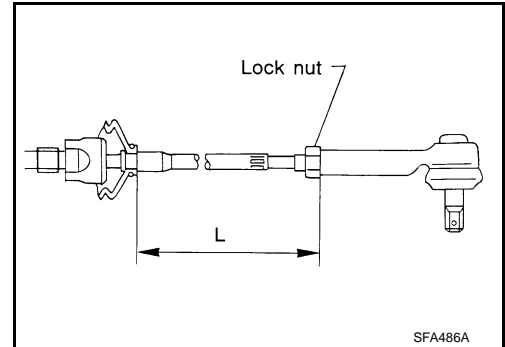


**Total toe-in** : Refer to [FSU-19, "Front Wheel Alignment \(Unladen\\*1\)"](#).

7. Adjust the toe-in by varying the length of the steering outer tie-rods.
  - a. Loosen the outer tie-rod lock nuts.
  - b. Adjust the toe-in by screwing the outer tie-rods in or out.

**Standard length "L"** : Refer to [PS-25, "Steering Gear and Linkage"](#).

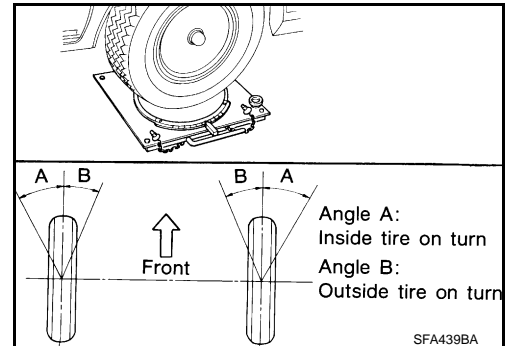
- c. Tighten the outer tie-rod lock nuts to specified torque.



**Lock nut** : Refer to [PS-15, "Removal and Installation"](#).

## FRONT WHEEL TURNING ANGLE

1. Set the front wheels in a straight-ahead position. Then move the vehicle forward until the front wheels rest on the turning radius gauge as shown.
2. Rotate steering wheel all the way right and left; measure the turning angles "A" and "B" as shown.



**Wheel turning angle (full turn)** : Refer to [FSU-19, "Front Wheel Alignment \(Unladen\\*1\)"](#).

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# COIL SPRING AND SHOCK ABSORBER

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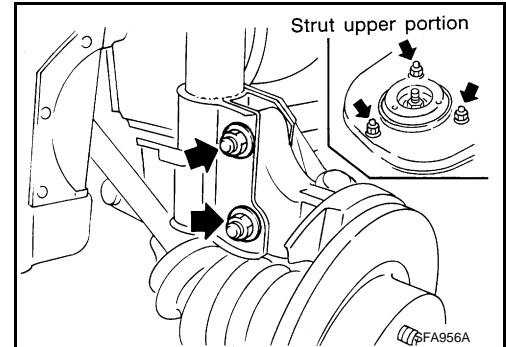
## COIL SPRING AND SHOCK ABSORBER

### Removal and Installation

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#### REMOVAL

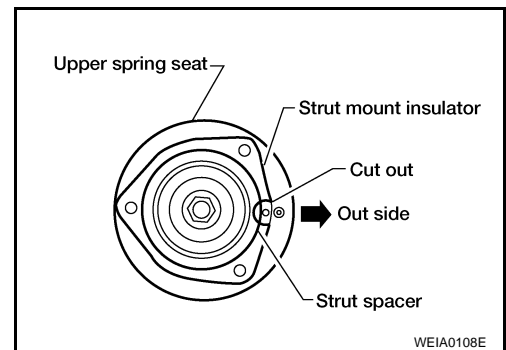
1. Remove the wheel and tire using power tool. Refer to [WT-6, "Conventional Tire and Wheel"](#).
2. Remove cowl top and cowl top extension. Refer to [EI-18, "Removal and Installation"](#).
3. Disconnect the wheel sensor wire and front brake hose from the brackets on the front shock absorber (strut).
4. Disconnect the connecting rod upper link using power tool.
5. Support the wheel hub and steering knuckle assembly with a suitable wire.
6. Remove the shock absorber (strut) lower bolts and nuts using power tool.
7. Remove the three upper strut mounting nuts using power tool.  
**CAUTION:**  
**Do not remove piston rod lock nut on vehicle.**
8. Remove the coil spring and shock absorber (strut) assembly.



#### INSTALLATION

Installation is in the reverse order of removal.

- After installation, check that the front wheel alignment is within specification. Refer to [FSU-7, "Front Wheel Alignment"](#).
  - When installing the strut spacer, it must be positioned as shown.
  - Tighten all nuts and bolts to specification. Refer to [FSU-6, "Component"](#).
- WARNING:**
- Always replace the shock absorber (strut) lower mounting nuts.
  - When installing shock absorber (strut) to steering knuckle, be sure to hold bolts when tightening nuts.
- Install wheel and tire. Refer to [WT-6, "Conventional Tire and Wheel"](#).



### Disassembly and Assembly

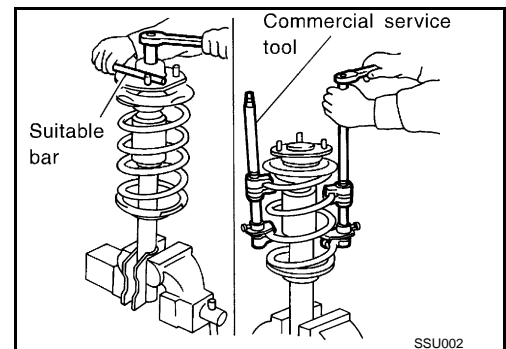
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#### DISASSEMBLY

1. Set the shock absorber (strut) in a vise, then loosen (without removing) the piston rod lock nut as shown.  
**CAUTION:**  
**Do not remove piston rod lock nut at this time.**
2. Compress the spring using commercial service tool until the shock absorber (strut) mounting insulator can be turned by hand.

**WARNING:**

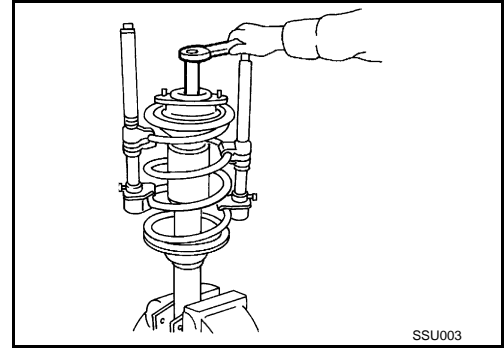
**Make sure that the pawls of the two spring compressors are firmly hooked on the spring. The spring compressors must be tightened alternately and evenly so as not to tilt the spring.**



# COIL SPRING AND SHOCK ABSORBER

## < SERVICE INFORMATION >

3. Remove the piston rod lock nut.



## INSPECTION AFTER DISASSEMBLY

### Shock Absorber Assembly

- Check for smooth operation through a full stroke, both compression and extension.
- Check for oil leakage on welded or gland packing portions.
- Check piston rod for cracks, deformation or other damage and replace if necessary.

### Mounting Insulator and Rubber Parts

Check cemented rubber-to-metal portion for separation or cracks. Check rubber parts for deterioration and replace if necessary.

### Thrust Bearing

Check thrust bearing parts for abnormal noise or excessive rattle in axial direction and replace if necessary.

### Coil Spring

- Check for cracks, deformation or other damage and replace if necessary.
- Check the free spring height.

### Front spring free height

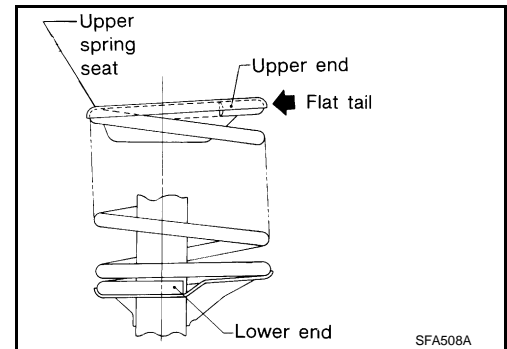
**SE model : 340 mm (13.39 in)**

**Base, S and : 350 mm (13.78 in)**

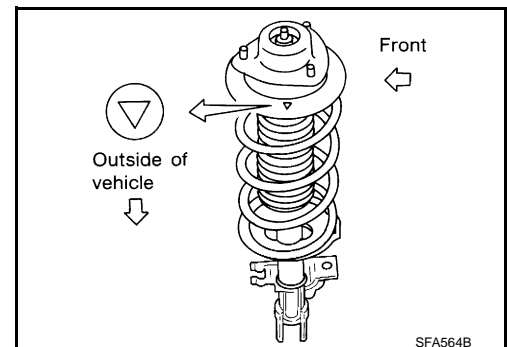
**SL models**

## ASSEMBLY

1. When installing coil spring on strut, it must be positioned as shown.



2. Install upper spring seat with alignment mark facing the outer side of vehicle, in line with strut-to-knuckle attachment points.



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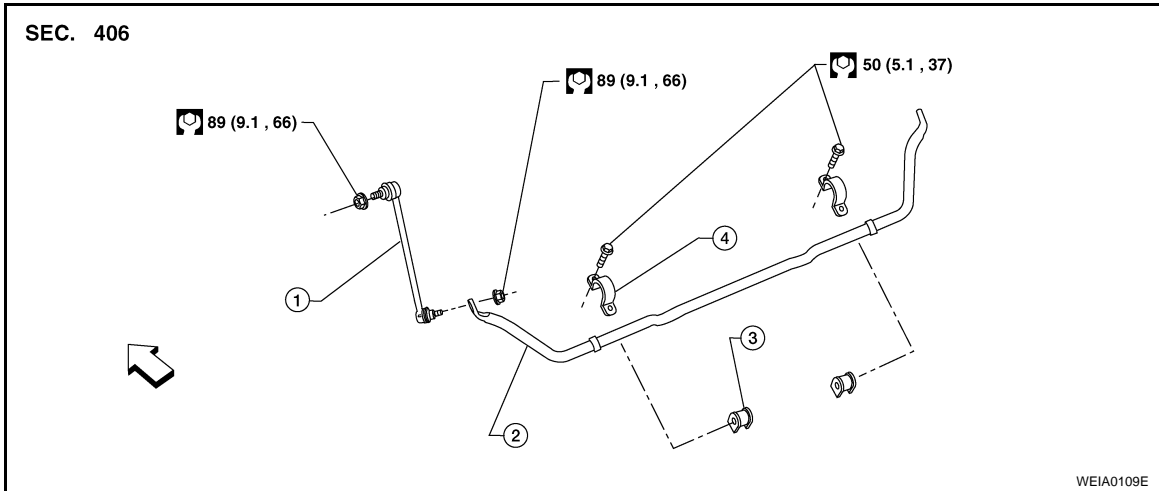
# STABILIZER BAR

< SERVICE INFORMATION >

## STABILIZER BAR

### Removal and Installation

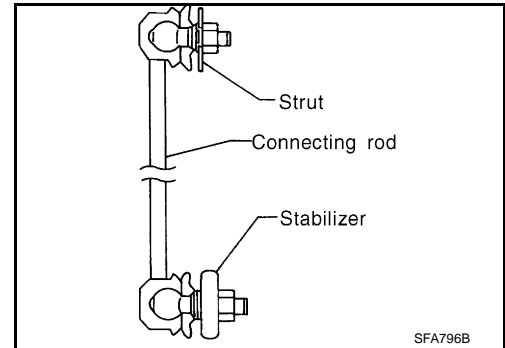
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1. Connecting rod
2. Stabilizer bar
3. Stabilizer bushing
4. Stabilizer clamp

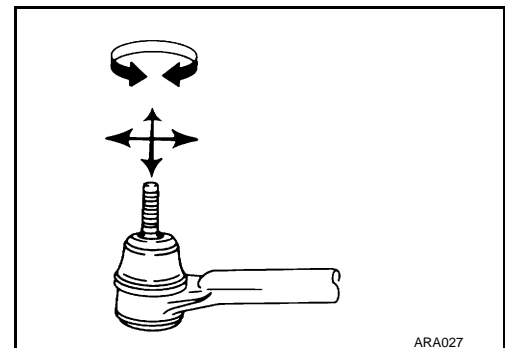
### REMOVAL

1. Remove the wheel and tire using power tool. Refer to [WT-6. "Conventional Tire and Wheel"](#).
2. Remove the steering gear bolts on the lower side. Refer to [PS-15. "Removal and Installation"](#).
  - Support steering gear.
3. Disconnect the connecting rod end at the stabilizer bar using power tool.
  - Prevent the connecting rod from turning by inserting a hex wrench into the end of the ball stud, then remove nut.
4. Remove the two stabilizer bar clamps from the front suspension member.
5. Remove the stabilizer bar by withdrawing from side.
  - Remove the two stabilizer bushings as necessary.



### INSPECTION AFTER REMOVAL

- Check the stabilizer bar for deformation or cracks and replace if necessary.
- Check the stabilizer bushings for deterioration or cracks. Replace if necessary.
- Check that the connecting rod ball joint can rotate in all directions. If movement is not smooth and free, replace connecting rod.



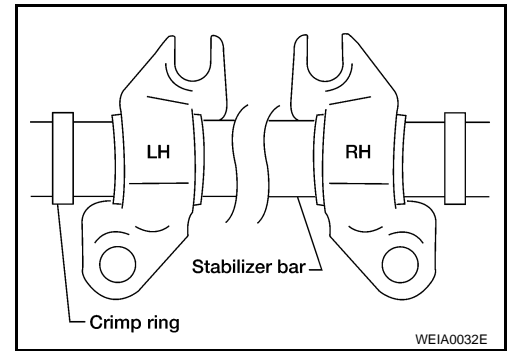
### INSTALLATION

Installation is in the reverse order of removal.

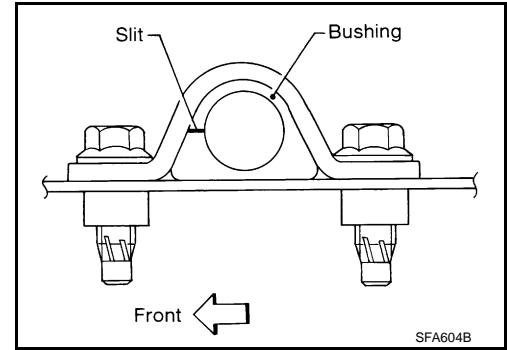
# STABILIZER BAR

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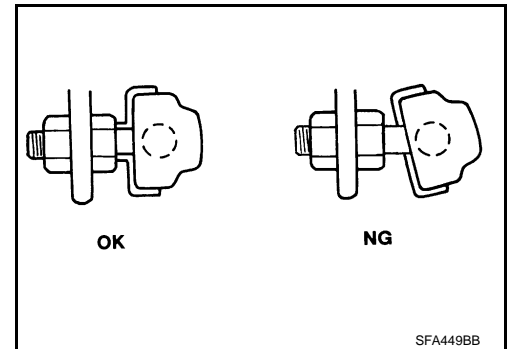
- When installing stabilizer bar, make sure that the stabilizer clamps are facing in the correct direction as shown.



- Make sure that slit in stabilizer bushing is in the position as shown.
- Lubricate the inner and outer surfaces of the stabilizer bushing using a silicone lubricant.



- Install stabilizer bar with ball joint socket properly placed as shown.
- When installing wheel and tire, refer to [WT-6. "Conventional Tire and Wheel"](#).



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# TRANSVERSE LINK

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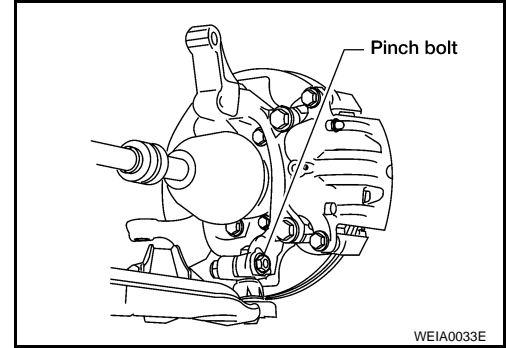
## TRANSVERSE LINK

### Removal and Installation

INFOID:000000001717824

#### REMOVAL

1. Remove the wheel and tire using power tool.
2. Remove lower ball joint pinch bolt and nut using power tool, then separate transverse link from the wheel hub and steering knuckle assembly.



3. Remove the two transverse link pivot bolts and transverse link bolt using power tool.
4. Remove the transverse link.

#### INSPECTION AFTER REMOVAL

##### Visual Check

- Check the transverse link for damage, cracks or deformation. Replace it if necessary.
- Check the bushing for damage, cracks and deformation. Replace the transverse link if necessary.

##### Lower Ball Joint

- Check the ball joint for excessive play. Replace the transverse link assembly if any of the following exists:
  - Lower ball joint stud is worn.
  - Lower ball joint is hard to swing.
  - Lower ball joint play in axial directions or end play is excessive.

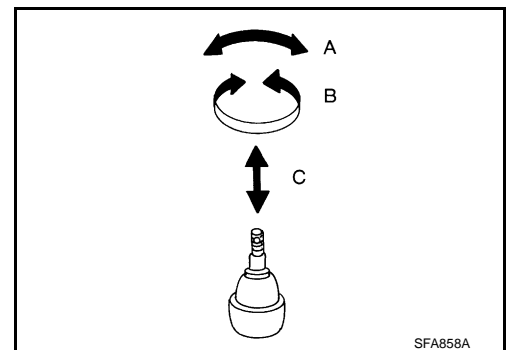
##### Swinging Force

Check ball joint swinging force.

##### NOTE:

Before checking the axial forces and end play, turn the lower ball joint at least 10 revolutions so that the ball joint is properly broken in.

**Swinging force "A" (measuring at groove of ball stud) : 7.8 - 54.9 N (0.8 - 5.6 kg-f, 1.8 - 12.3 lb-f)**



##### Turning Force

Check ball joint turning force.

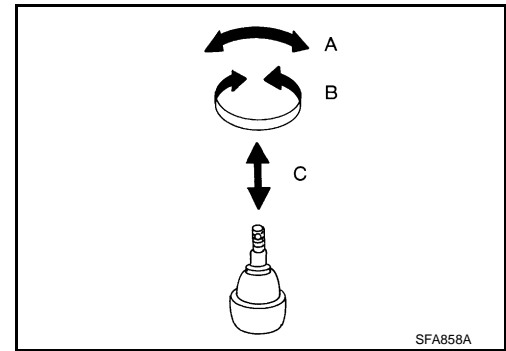
##### NOTE:

Before checking the axial forces and end play, turn the lower ball joint at least 10 revolutions so that the ball joint is properly broken in.

# TRANSVERSE LINK

## < SERVICE INFORMATION >

Turning torque "B" : 0.49 - 3.43 N·m (5.0 - 35.0 kg·cm,  
4.3 - 30.4 in·lb)



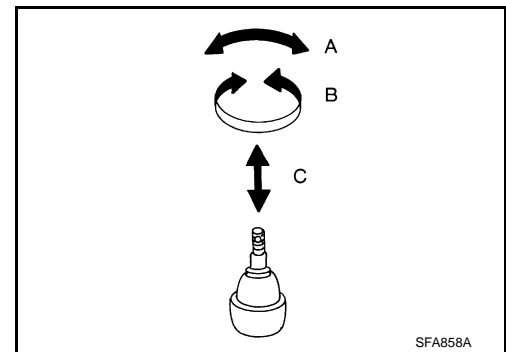
### Vertical End Play

Check dust cover for damage. Replace it and the cover clamp if necessary.

#### NOTE:

Before checking the axial forces and end play, turn the lower ball joint at least 10 revolutions so that the ball joint is properly broken in.

Vertical end play "C" : 0 mm (0 in)



## INSTALLATION

Installation is in the reverse order of removal.

- Tighten the transverse link mounting bolts and nuts to specified torque, refer to [FSU-6. "Component"](#). During installation, the final tightening must be done with the vehicle at curb weight and the tires on the ground.

#### CAUTION:

**Discard the old pinch nut and use a new pinch nut for installation of the lower ball joint pinch bolt.**

- After installation, check the wheel alignment. Refer to [FSU-7. "Front Wheel Alignment"](#).
- Install the wheel and tire. Refer to [WT-6. "Conventional Tire and Wheel"](#).

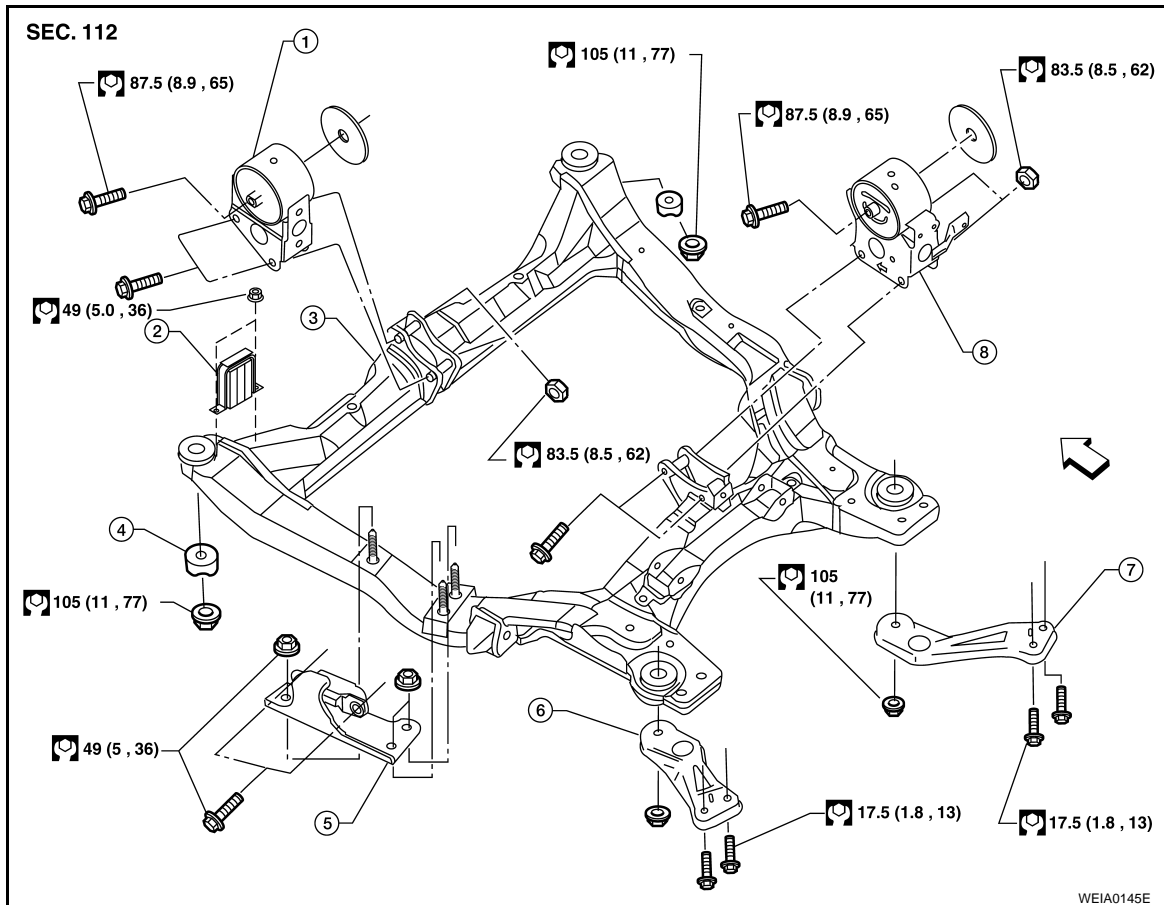
# FRONT SUSPENSION MEMBER

< SERVICE INFORMATION >

## FRONT SUSPENSION MEMBER

### Removal and Installation

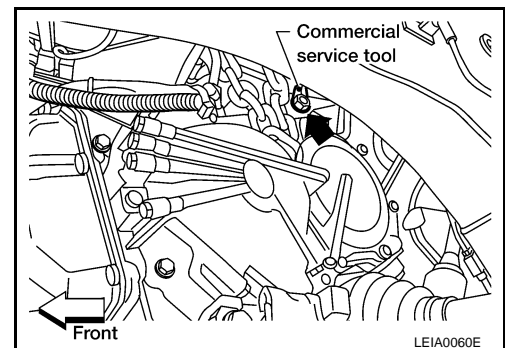
INFOID:000000001717825



- |                        |                                    |                            |
|------------------------|------------------------------------|----------------------------|
| 1. Front engine mount  | 2. Dynamic damper                  | 3. Front suspension member |
| 4. Cup                 | 5. LH transaxle mounting insulator | 6. Member pin stay, LH     |
| 7. Member pin stay, RH | 8. Rear engine mount               | ← Front                    |

### REMOVAL

1. Remove the front wheels and tires using power tool. Refer to [WT-6, "Conventional Tire and Wheel"](#).
2. Remove the engine under cover.
3. Remove the splash shields.
4. Remove the LH transaxle mounting insulator nuts using power tool.
  - a. Remove cowl top and cowl top extension. Refer to [EI-18, "Removal and Installation"](#).
  - b. Install a commercially available engine lifting bracket onto the transaxle with bolt as shown.





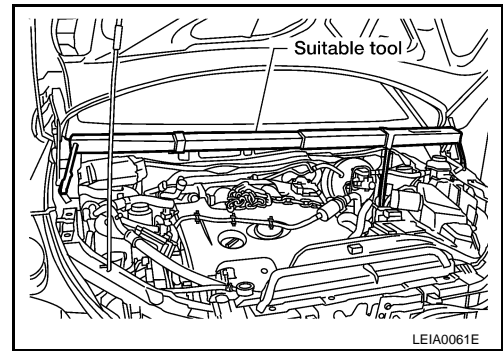
# FRONT SUSPENSION MEMBER

## < SERVICE INFORMATION >

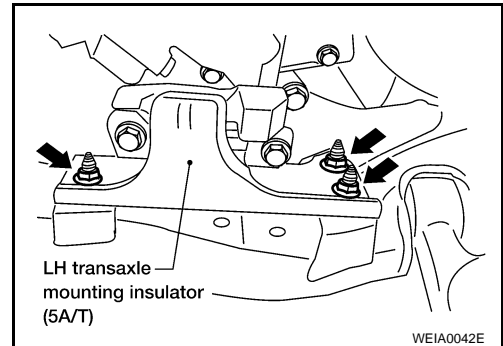
- c. Support engine from engine lifting bracket using suitable tool as shown.

**CAUTION:**

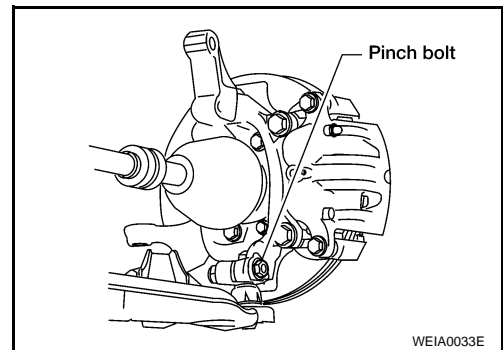
Be sure suitable tool is securely resting on hoodledge as shown.



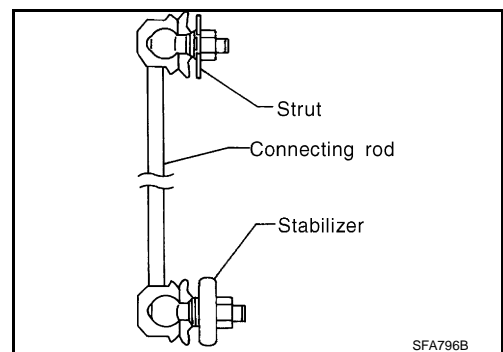
- d. Remove the three LH transaxle mounting insulator nuts using power tool.



5. Remove the lower ball joint pinch bolt and nut using power tool, then separate the transverse link from the wheel hub and steering knuckle assembly. Refer to [FSU-6. "Component"](#).
6. Remove the front exhaust tube using power tool. Refer to [EX-5. "Removal and Installation"](#).
7. Remove the power steering line bracket from the front suspension member.
8. Remove the bolts on the lower side of the steering gear. Refer to [PS-15. "Removal and Installation"](#).
9. Disconnect the front engine mount electrical connector.



10. Disconnect the connecting rod from the front strut using power tool.
11. Set a transmission jack under the front suspension member, then remove the nuts from the front suspension member using power tool.
12. Remove the bolts from the member pin stay on the vehicle body side using power tool.
13. Remove the through bolts from the front and rear engine mounts.
14. Lower the transmission jack slowly to remove the front suspension member.
- If necessary, remove the exhaust hanger bracket from the front suspension member.
  - If necessary, remove the front and rear engine mounts.
  - If necessary, remove the transverse link.
  - If necessary, remove dynamic damper.



## INSPECTION AFTER REMOVAL

Check the front suspension member for deformation, cracks, or any other damage. Replace if necessary.

## INSTALLATION

Installation is in the reverse order of removal noting the following:

- Install the stabilizer bar bushings and clamps in the specified orientation. Refer to [FSU-12. "Removal and Installation"](#).
- Tighten the stabilizer bar and connecting rod nuts and bolts to specification. Refer to [FSU-6. "Component"](#).

A  
B  
C  
D  
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F  
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N  
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P

## FRONT SUSPENSION MEMBER

### < SERVICE INFORMATION >

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- Tighten the steering gear bolts to specification. Refer to [PS-15, "Removal and Installation"](#).
- Tighten the transverse link bolts and nuts to specification. Refer to [FSU-14, "Removal and Installation"](#).
- Check the wheel alignment. Refer to [FSU-7, "Front Wheel Alignment"](#).

# SERVICE DATA AND SPECIFICATIONS (SDS)

< SERVICE INFORMATION >

## SERVICE DATA AND SPECIFICATIONS (SDS)

### General Specification (Front)

INFOID:000000001717826

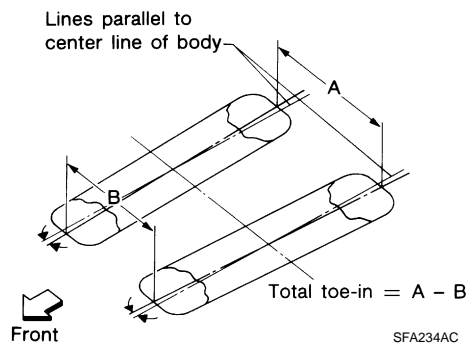
Unit: mm (in)

Model	SE	Base, S and SL
Suspension type	Independent strut with coil springs	
Shock absorber type	Double-acting hydraulic	
Stabilizer bar	Standard equipment	
Free spring height	340 (13.39)	350 (13.78)

### Front Wheel Alignment (Unladen\*1)

INFOID:000000001717827

Market		United States and Canada	Mexico
Camber degree minute (decimal degree)	Minimum	-1° 15' (-1.25°)	-0° 4' (-0.07°)
	Nominal	-0° 30' (-0.50°)	-0° 4' (-0.07°)
	Maximum	0° 15' (0.25°)	0° 41' (0.68°)
	Left and right difference	0° 45' (0.75°) or less	0° 45' (0.75°) or less
Caster degree minute (decimal degree)	Minimum	1° 57' (1.95°)	2° 27' (2.45°)
	Nominal	2° 42' (2.70°)	2° 27' (2.45°)
	Maximum	3° 27' (3.45°)	3° 12' (3.20°)
	Left and right difference	0° 45' (0.75°) or less	0° 45' (0.75°) or less
Kingpin inclination degree minute (decimal degree)	Minimum	13° 39' (13.65°)	13° 42' (13.70°)
	Nominal	14° 24' (14.40°)	13° 42' (13.70°)
	Maximum	15° 09' (15.15°)	14° 27' (14.45°)



Total toe-in	Distance (A - B) mm (in)	Minimum	-0.75 (-0.0295)	-0.75 (-0.0295)
		Nominal	0.25 (0.0098)	0.25 (0.0098)
		Maximum	1.25 (0.0492)	1.25 (0.0492)
	Angle (left plus right) degree minute (decimal degree)	Minimum	-0° 1' 54" (-0.03°)	-0° 1' 54" (-0.03°)
		Nominal	0° 0' 36" (0.01°)	0° 0' 36" (0.01°)
		Maximum	0° 3' 6" (0.05°)	0° 3' 6" (0.05°)
Wheel turning angle full turn*2	Inside degree minute (decimal degree)	Minimum	35° 15' (35.25°)	38° 00' (38.00°)
		Nominal	38° 45' (38.75°)	41° 30' (41.50°)
		Maximum	39° 45' (39.75°)	42° 30' (42.50°)
	Outside degree minute (decimal degree)	Nominal	32° 30' (32.5°)	33° 24' (33.4°)

# SERVICE DATA AND SPECIFICATIONS (SDS)

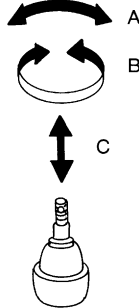
## < SERVICE INFORMATION >

\*1: Fuel, engine coolant and engine oil full. Spare tire, jack, hand tools and mats in designated positions.

\*2: On power steering models, wheel turning force (at circumference of steering wheel) of 98 to 147 N (10 to 15 kg-f, 22 to 33 lb-f) with engine idle.

## Lower Ball Joint

INFOID:000000001717828



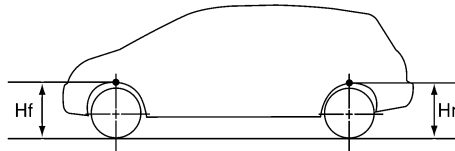
SFA858A

Swinging force "A" (Measuring point: groove of ball stud) N (kg-f, lb-f)	7.8 - 54.9 (0.8 - 5.6, 1.8 - 12.3)
Turning torque "B" N·m (kg-cm, in-lb)	0.49 - 3.43 (5.0 - 35.0, 4.3 - 30.4)
Vertical end play "C" mm (in)	0 (0)

## Wheelarch Height (Unladen\*)

INFOID:000000001717829

Unit: mm (in)



WEIA0030E

Market	United States and Canada	Mexico
Front (Hf)	740 (29.13)	770 (30.31)
Rear (Hr)	749 (29.49)	779 (30.67)

\*: Fuel, engine coolant, and engine oil are full. Spare tire, jack, hand tools and mats in designated positions.