

STEERING COLUMN

Article Text

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

ARTICLE BEGINNING

1991-92 STEERING

Chrysler Motors/Mitsubishi - Steering Columns - FWD

Dodge; Colt, Colt 200, Colt Vista, Stealth

Eagle; Summit & 1992 Summit Wagon

Mitsubishi; Eclipse, Galant, Mirage, Precis,

3000GT, 1992 Diamante & Expo/Expo LRV

DESCRIPTION

The steering system consists of solid steering shaft with a lower joint assembly. Stealth and 3000GT models are equipped with a Supplemental Restraint System (SRS) that includes an air bag and clockspring located in the steering column.

WARNING: On Stealth and 3000GT, before doing any repairs, disconnect and shield battery ground. Disconnect SRS connector at control unit. Use caution when working around steering column (air bag could deploy).

TROUBLE SHOOTING

Refer to TROUBLE SHOOTING - BASIC PROCEDURES article in the GENERAL TROUBLE SHOOTING section.

REMOVAL & INSTALLATION

STEERING WHEEL & HORN PAD R & I

Removal (All Models Except Stealth & 3000GT)

1) Remove horn pad. On Galant, push horn pad toward top of steering wheel for removal. On Precis, push and turn horn pad assembly to remove and disconnect horn button connector. On all other models, remove screws and/or pry horn pad from steering wheel.

2) On all models, place reference mark on steering wheel and steering column shaft for reassembly reference. Remove steering wheel retaining nut and washer. Using steering wheel puller, remove steering wheel.

CAUTION: DO NOT hammer on steering wheel during removal, as it may damage steering column.

Installation

To install, reverse removal procedure. Ensure reference marks are aligned. Tighten steering wheel retaining nut to specification. See TORQUE SPECIFICATIONS table at end of article.

Removal (Stealth & 3000GT)

1) Set front wheels in the straight-ahead position. Remove

STEERING COLUMN

Article Text (p. 2)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

ignition key. Disconnect negative battery cable and cover with tape. Wait 30 seconds before continuing.

CAUTION: Wait at least 30 seconds after disconnecting battery before servicing SRS components. DO NOT use excessive force when disconnecting clockspring-to-air bag connector.

2) Remove air bag module mounting nuts from back side of steering wheel. See Fig. 1. Remove air bag module. When disconnecting clockspring, press air bag lock toward outer side to spread open. See Fig. 2. Gently remove connector with a screwdriver.

3) Place air bag in clean, dry area with pad cover face up. Place reference mark on steering wheel and steering column shaft for reassembly reference. Remove steering wheel retaining nut and washer. Using steering wheel puller, remove steering wheel.

CAUTION: DO NOT hammer on steering wheel during removal. Steering column may be damaged.

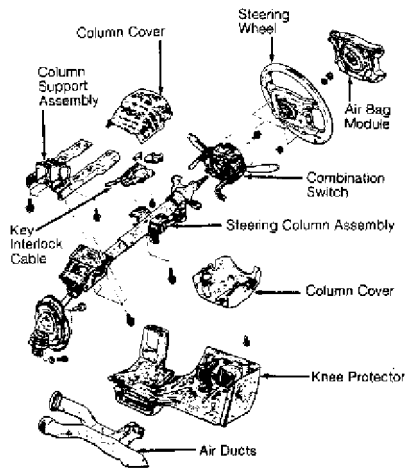


Fig. 1: Exploded View of Steering Column (Typical)
Courtesy of Mitsubishi Motor Sales of America

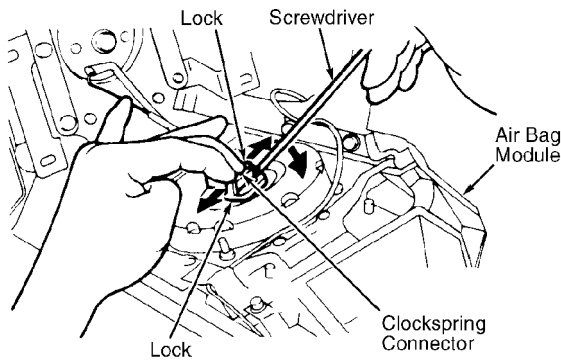


Fig. 2: Disconnecting Clockspring Conn. (Diamante, Stealth & 3000GT)
Courtesy of Mitsubishi Motor Sales of America

STEERING COLUMN

Article Text (p. 3)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

Inspection

Check air bag module, pad cover and inflator case for dents, cracks or deformities. Check hooks and connectors for damage, terminal deformities and binding harnesses. Replace air bag module if damaged. Check clockspring connectors and wiring for damage or wear. Replace as necessary.

WARNING: NEVER measure circuit resistance of air bag module.

Accidental deployment, which can cause serious injury, may result.

Installation

1) To install, reverse removal procedure. Before installing steering wheel, ensure NEUTRAL mark of clockspring is aligned with mating mark on outer housing.

2) Reverse removal procedure to install remaining components. Ensure steering wheel reference marks are aligned. Tighten steering wheel retaining nut to specification. See TORQUE SPECIFICATIONS table at end of article. Ensure air bag wiring is not pinched or bent during installation.

3) After installation is complete, turn ignition switch to the ON or START position. SRS warning light on dashboard should come on for about 7 seconds and then go off.

COMBINATION SWITCH R & I

Removal & Installation

1) Remove the steering wheel and the horn pad. Refer to STEERING WHEEL & HORN PAD R & I. Remove lower instrument panel cover (if equipped). Remove steering column covers.

2) On Stealth and 3000GT, disconnect clockspring connectors at SRS diagnosis unit and at body harness. Remove harness clips. Remove clockspring.

3) On all models, disconnect combination switch electrical connectors. Remove retaining screws and combination switch(s). See Fig. 3. To install, reverse removal procedure.

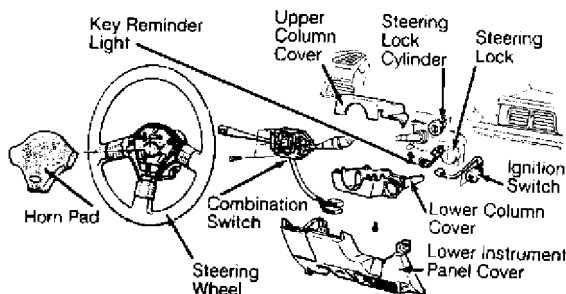


Fig. 3: Exploded View of Steering Column Switches (Typical)
Courtesy of Chrysler Motors

IGNITION SWITCH & STEERING LOCK CYLINDER R & I

STEERING COLUMN

Article Text (p. 4)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

Removal

1) Remove the steering wheel and the combination switch.

Refer to STEERING WHEEL & HORN PAD R & I under REMOVAL & INSTALLATION.

Also, see COMBINATION SWITCH R & I under REMOVAL & INSTALLATION.

Disconnect electrical lead for ignition switch.

2) On Colt Vista (1991) and Precis, use a hacksaw to cut groove on head of special bracket bolt. Remove bolts with screwdriver. On all other models, use a hacksaw to cut the special bolts at steering lock bracket side. Remove ignition switch, steering lock and bracket.

Installation

To install, reverse removal procedure. Use new steering lock bracket and bolts. Temporarily install ignition switch and steering lock cylinder onto steering column. Ensure ignition switch functions normally, then tighten steering cylinder lock bolts until heads twist off.

STEERING COLUMN R & I

NOTE: Before removing, ensure wheels are in straight-ahead position and note steering wheel location for reassembly reference.

Removal (All Models Except Precis)

1) Remove the steering wheel and the combination switch.

Refer to STEERING WHEEL & HORN PAD R & I under REMOVAL & INSTALLATION.

Also, see COMBINATION SWITCH R & I under REMOVAL & INSTALLATION.

Remove lower instrument panel covers and air ducts. Disconnect all electrical connections.

2) On Stealth (A/T) and 3000GT (A/T), remove key interlock cable and slide lever. On all models, remove coupling bolt at steering gear. Remove cover bolts or retaining band. Remove steering column bracket bolts. Remove steering column assembly.

Installation

To install, reverse removal procedure. Ensure coupling is installed on steering gear so steering wheel will be centered.

Removal (Precis)

1) Remove the steering wheel and the combination switch.

Refer to STEERING WHEEL & HORN PAD R & I under REMOVAL & INSTALLATION.

Also, see COMBINATION SWITCH R & I under REMOVAL & INSTALLATION.

Remove lower crash pad, and disconnect rheostat connector. Remove column shroud. Disconnect all electrical connectors to steering column.

CAUTION: Note direction and location of installed lower joint assembly before removing. Ensure joint assembly is installed correctly, as joints at ends of shaft are of different length. See Fig. 4.

STEERING COLUMN

Article Text (p. 5)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

2) Remove coupling bolt at bottom of lower joint assembly. Remove steering column support bracket bolts. Remove steering column assembly. Remove lower joint assembly from steering shaft.

Installation

1) Connect lower joint assembly upper joint to steering shaft. Ensure joint is installed in correct direction. See Fig. 4. Align lower joint assembly to steering gear pinion and temporarily tighten lower joint bolt.

2) Install lower joint assembly on steering gear so steering wheel is centered. Attach steering column brackets to dash. Tighten lower bolt of lower joint assembly. Tighten column bracket bolts. To install remaining components, reverse removal procedure.

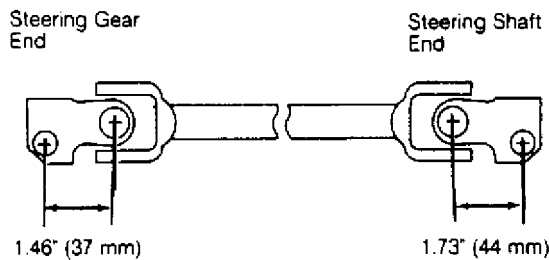


Fig. 4: Installing Lower Joint Assembly (Precis)
Courtesy of Mitsubishi Motor Sales of America

OVERHAUL

STEERING COLUMN OVERHAUL

Disassembly (Eclipse & Galant)

1) Remove steering column. See STEERING COLUMN R & I. Remove joint assembly. Remove boot, bearing and cover. Remove snap ring, stopper and spacer. See Fig. 5.

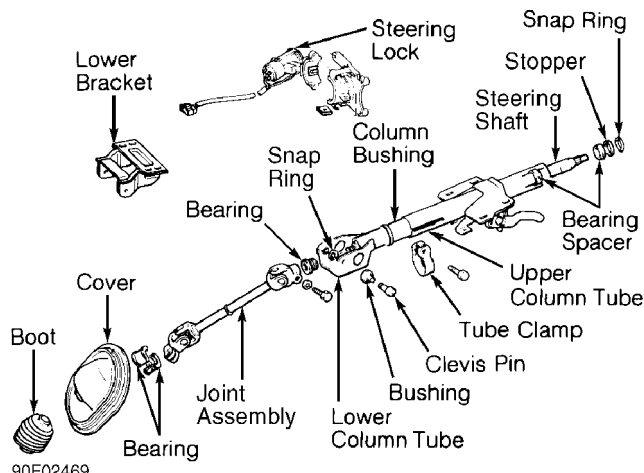


Fig. 5: Exploded View of Steering Column Assembly (Eclipse & Galant)
Courtesy of Mitsubishi Motor Sales of America.

STEERING COLUMN

Article Text (p. 6)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

2) Remove tube clamp bolt, upper column tube, bushing, tube clamp and lower column tube. Using ignition key, unlock steering wheel shaft. Remove steering shaft from column by lightly tapping steering shaft with soft mallet.

3) If removing steering lock, cut retaining screws with hacksaw. Remove steering lock and bracket.

Inspection

Check steering shaft for damage. Check for worn or damaged bushings or cover. Check for play or rough movement of joint assembly. Replace damaged components.

CAUTION: If steering lock is removed, use new steering lock bracket and bolts when reassembling steering lock.

Reassembly

1) To reassemble, reverse disassembly procedure. Align steering lock with column boss. Ensure steering lock is operational. Tighten steering lock bracket bolt until bolt head breaks off.

2) Apply multipurpose grease to bearing spacer and lower column tube-to-shaft contact areas.

3) Install tube clamp so edge of clamp is positioned .73-.81" (18.5-20.5 mm) from end of upper column tube, and end of steering shaft is .98-.99" (24.8-25.2 mm) from center of the clevis pin. See Fig. 6.

4) Install cover on joint assembly. Fill inside of bearing with multipurpose grease. Install bearing on joint assembly. Wrap tape around circumference of bearing approximately 1 1/2 times. Press bearings into cover.

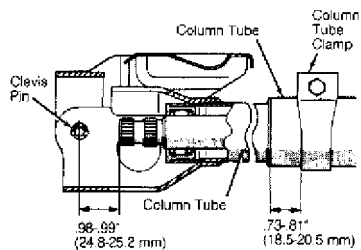


Fig. 6: Installing Column Tube Clamp (Eclipse & Galant)
Courtesy of Mitsubishi Motor Sales of America.

Disassembly (All Except Eclipse & Galant)

NOTE: Disassembly procedures are not available.
For exploded views of steering column assemblies, see Fig. 7, 8, 9 or 10 for appropriate model.

STEERING COLUMN

Article Text (p. 7)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

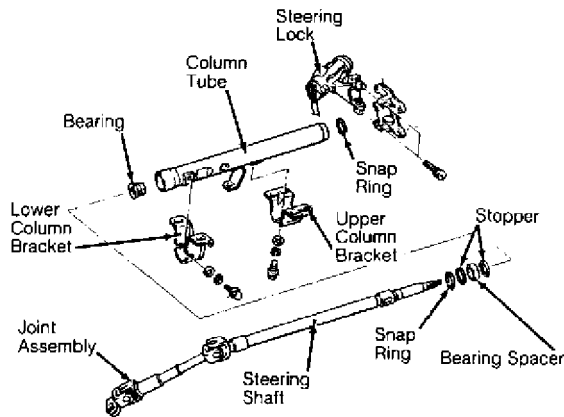


Fig. 7: Exploded View of Steering Column Assembly (Colt, Colt 200, Mirage & Summit Non-Tilt; Tilt Models Are Similar)
Courtesy of Mitsubishi Motor Sales of America

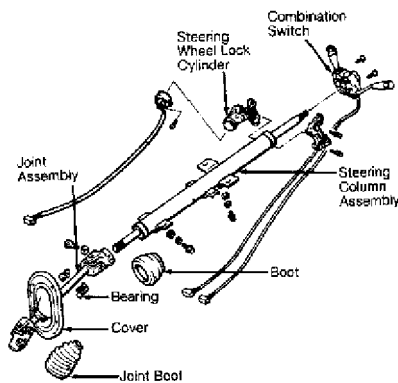


Fig. 8: Exploded View of Steering Column Assembly (1991 Colt Vista)
Courtesy of Chrysler Motors

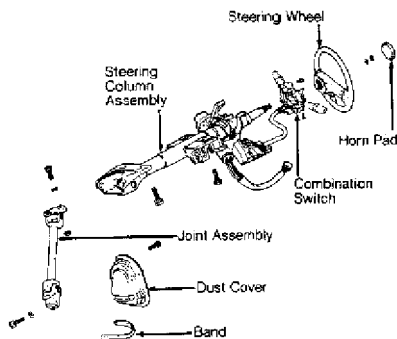


Fig. 9: Exploded View of Steering Column Assembly (Precis)
Courtesy of Mitsubishi Motor Sales of America

STEERING COLUMN

Article Text (p. 8)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

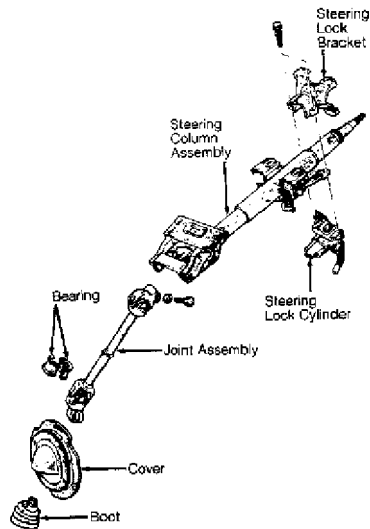
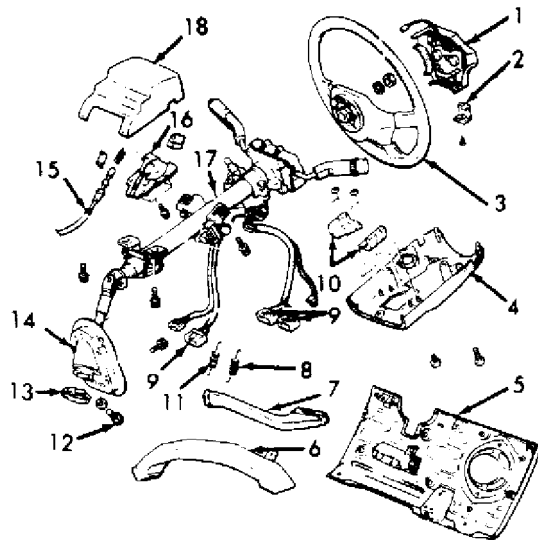


Fig. 10: View of Steering Column (Diamante, Stealth & 3000GT)
Courtesy of Mitsubishi Motor Sales of America



- | | |
|-------------------------|------------------------------|
| 1. Horn Pad | 11. Brake Pedal |
| 2. Spring Holder | 12. Return Spring |
| 3. Steering Wheel | 13. Joint Assembly-To-Gear |
| 4. Lower Column Cover | 14. Box Connecting Bolt |
| 5. Lower Instrument | 15. Band |
| 6. Panel Cover | 16. Dust Cover |
| 7. Lap Duct | 17. Key interlock |
| 8. Foot Duct | 18. Key interlock |
| 9. Clutch Pedal | 19. Cover (A/T) |
| 10. Return Spring (M/T) | 20. Steering Column Assembly |
| 11. Harness Connector | 21. Upper Column Cover |
| 12. Cover Protector | |

93F01158

Fig. 11: Exploded View of Steering Column (Expo Shown;
Summit Wagon & 1992 Colt Vista Similar)
Courtesy of Mitsubishi Motor Sales of America

STEERING COLUMN

Article Text (p. 9)

1992 Mitsubishi Mirage

For a a a a

Copyright © 1998 Mitchell Repair Information Company, LLC

Monday, April 01, 2002 10:16AM

TORQUE SPECIFICATIONS

TORQUE SPECIFICATIONS TABLE

Application	Ft. Lbs. (N.m)
Joint Clamp Bolt	11-14 (15-19)
Steering Wheel Nut	25-32 (34-43)
	INCH Lbs. (N.m)
Air Bag Module Nuts (Stealth & 3000GT)	48 (5.4)
Column Bracket Bolt	84-120 (10-14)
Tube Clamp Bolt	36-43 (3-4)
Dust Cover Bolt	36-50 (4-6)

END OF ARTICLE