

# WHEELS AND TIRES

## CONTENTS

TROUBLE SHOOTING .....	1	SERVICING STANDARD .....	4
SERVICE PROCEDURES .....	2	TIGHTENING TORQUE .....	4
SPECIFICATIONS .....	4		



# WHEELS AND TIRES

## CONTENTS

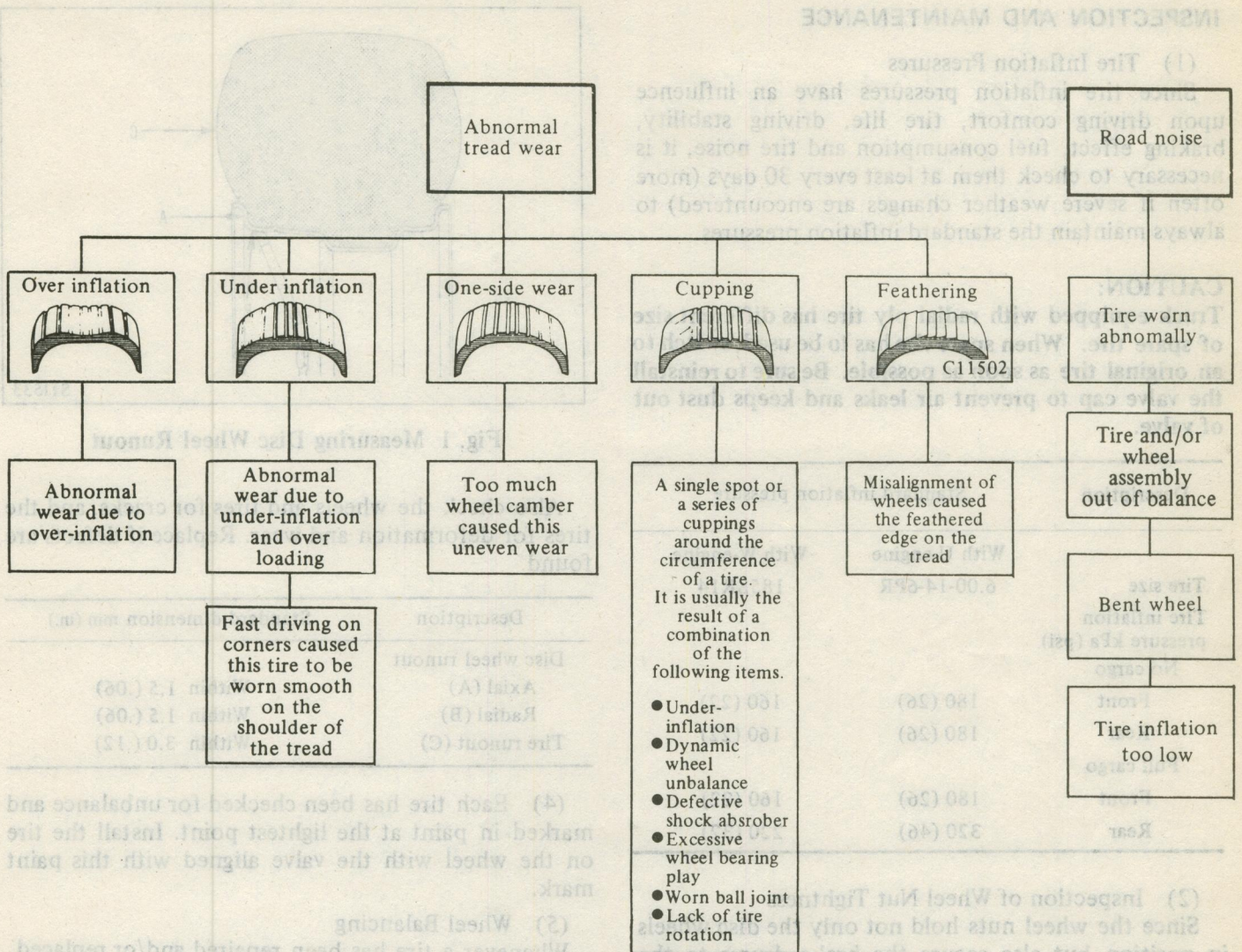
4	.....	1	.....	TROUBLE SHOOTING
4	.....	2	.....	SERVICE PROCEDURES
	.....	4	.....	SPECIFICATIONS
	.....		.....	SERVICING STANDARD
	.....		.....	TIGHTENING TORQUE

Wheel Tire

Wheels Tire



# TROUBLE SHOOTING



(4) Each tire has been checked for unbalance and marked in paint at the lightest point. Install the tire on the wheel with the valve aligned with this paint mark.

(2) Wheel Balancing

Whenever a tire has been repaired and/or replaced, the wheel should be balanced. Since there are various types of wheel balancing machines, follow the machine manufacturer's instructions to correctly balance the wheel.

**NOTES:** 1. The extreme outside edge of any balance weight should not project more than 3 mm (.12 in.) from the disc wheel edge.

2. No more than one balance weight should be installed on each side of a wheel.

INSPECTION AND MAINTENANCE

(1) The Inflation Pressures

Upon driving comfort, tire life, driving stability, braking effect, fuel consumption and tire noise, it is necessary to check them at least every 30 days (more often in severe weather changes are encountered) to always maintain the standard inflation pressures.

CAUTION: The valve cap to prevent air leaks and keep dust out of the valve.

Tire worn abnormally

Tire and/or wheel assembly out of balance

Bent wheel

Tire inflation too low

(2) Inspection of Wheel Nut Tightness

Since the wheel nuts hold not only the wheels in position but also secure the brake drums or discs in position, they must always be tightened in diagonal sequence to the standard torque.

Parts to be tightened	Torque, Nm (ft-lbs)
Wheel nuts	69 to 78 (51 to 58)

(3) Inspection of Wheel and Tire Runout

Jack up the truck so that the wheels are clear of the floor. While rotating the wheel by hand, apply the surface gauge to the tire and wheel (disc) for inspection of runout. If measured runout exceeds the standard specification, the wheel and/or tire should be replaced (Fig. 1).



## SERVICE PROCEDURES

### INSPECTION AND MAINTENANCE

#### (1) Tire Inflation Pressures

Since tire inflation pressures have an influence upon driving comfort, tire life, driving stability, braking effect, fuel consumption and tire noise, it is necessary to check them at least every 30 days (more often if severe weather changes are encountered) to always maintain the standard inflation pressures.

#### CAUTION:

Truck equipped with radial ply tire has different size of spare tire. When spare tire has to be used, switch to an original tire as soon as possible. Be sure to reinstall the valve cap to prevent air leaks and keeps dust out of valve.

Description	Standard inflation pressure	
	With U-engine	With W-engine
Tire size	6.00-14-6PR	185SR14
Tire inflation pressure kPa (psi)		
No cargo		
Front	180 (26)	160 (22)
Rear	180 (26)	160 (22)
Full cargo		
Front	180 (26)	160 (22)
Rear	320 (46)	220 (32)

#### (2) Inspection of Wheel Nut Tightness

Since the wheel nuts hold not only the disc wheels in position but also secure the brake drums to the wheel hubs, they must always be tightened in diagonal sequence to the standard torque.

Parts to be tightened	Torque Nm (ft-lbs.)
Wheel nuts	69 to 78 (51 to 58)

#### (3) Inspection of Wheel and Tire Runout

Jack up the truck so that the wheels are clear of the floor. While rotating the wheel by hand, apply the surface gauge to the tire and wheel (disc) for inspection of runout. If measured runout exceeds the standard specification, the wheel and/or tire should be replaced. (Fig. 1)

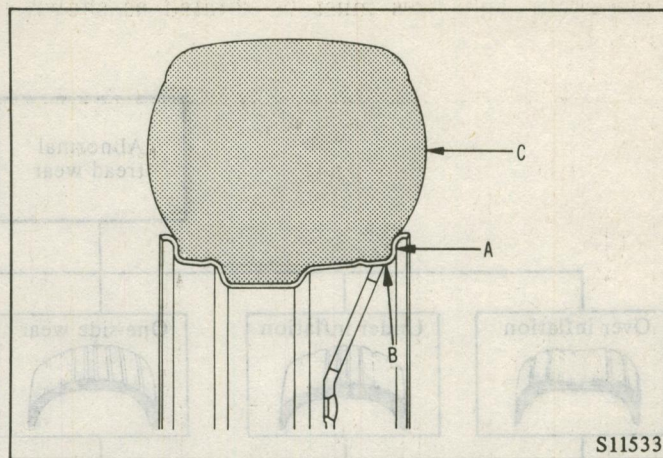


Fig. 1 Measuring Disc Wheel Runout

Also check the wheels and tires for cracks, and the tires for deformation and wear. Replace if defects are found.

Description	Standard dimension mm (in.)
Disc wheel runout	
Axial (A)	Within 1.5 (.06)
Radial (B)	Within 1.5 (.06)
Tire runout (C)	Within 3.0 (.12)

(4) Each tire has been checked for unbalance and marked in paint at the lightest point. Install the tire on the wheel with the valve aligned with this paint mark.

#### (5) Wheel Balancing

Whenever a tire has been repaired and/or replaced, the wheel should be balanced. Since there are various types of wheel balancing machines, follow the machine manufacturer's instructions to correctly balance the wheel.

NOTES: 1. The extreme outside edge of any balance weight should not project more than 3 mm (.12 in.) from the disc wheel edge.

2. No more than one balance weight should be installed on each side of a wheel.



### (6) Tire Rotation

If uneven tread wear has developed, rotation is suggested. The tires must be rotated as shown in Fig. 2.

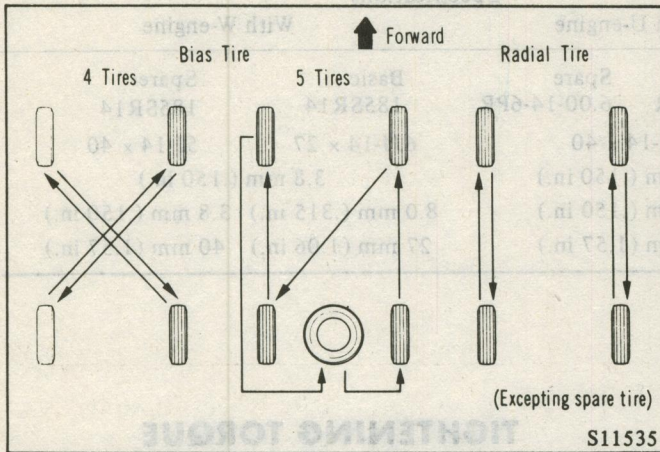


Fig. 2 Tire Rotation

### INSTALLATION

- (1) Inspect wheel after wire brushing inside wheel flange. All bead seats must be free of dirt and rust.
- (2) Remove all balance weights.
- (3) If wheel flange is bent, replace with a new wheel.
- (4) If evidence of distortion or impact damage exists, measure wheel for runout.

(5) New valve stems, cores, and caps should be installed before new tire is fitted to wheel.

(6) Lubricate tire beads to prevent bead damage with a mounting solution (such as soap and water).

(7) Insure the portion of bead opposite the tire tool is inside the wheel flange prior to mounting; then mount in the usual manner. Do not allow the tire to hang up on the tire tool. Relubricate bead, if necessary.

(8) Without valve core, inflate tire to 276 kPa (40 psi) – DEFLATE – install valve core and inflate to recommended tire pressure.

### CAUTION:

Carefully check bead to rim seat. Tire bead to rim clearance should be the same around the circumference. Repeat this process if bead has not seated.

NOTE: A radial tire with an improperly seated bead will cause vibration in service.

(9) Balance tires. Refer to the paragraph (5) Wheel Balancing in INSPECTION AND MAINTENANCE.

(10) Install tire and wheel assembly on vehicle.



## SPECIFICATIONS

Description	Specifications			
	With U-engine		With W-engine	
Tire size	Basic 6.00-14-6PR	Spare 6.00-14-6PR	Basic 185SR14	Spare 185SR14
Disc wheel size [Rim width (in.) × Offset (mm)]	5J-14 × 40		6JJ-14 × 27	5J-14 × 40
Thickness of wheel rim plate	3.8 mm (.150 in.)		3.8 mm (.150 in.)	
Thickness of wheel disc	3.8 mm (.150 in.)		8.0 mm (.315 in.)	3.8 mm (.150 in.)
Amount of offset of disc from rim	40 mm (1.57 in.)		27 mm (1.06 in.)	40 mm (1.57 in.)

## SERVICING STANDARD

Description	Standard inflation pressure	
	With U-engine	With W-engine
Tire size	6.00-14-6PR (Tubeless)	185SR14 (Tubeless)
Load range	C	B
Tire inflation pressure kPa (psi)		
No cargo		
Front	180 (26)	160 (22)
Rear	180 (26)	160 (22)
Full cargo		
Front	180 (26)	160 (22)
Rear	320 (46)	220 (32)

## TIGHTENING TORQUE

Description	Torque Nm (ft-lbs.)
Wheel nut tightening	69 to 78 (51 to 58)