

ASSEMBLY

1. Install 3rd needle bearing to input shaft.
2. Install 3rd input gear, 3rd inner baulk ring, 3rd synchronizer cone, and 3rd outer baulk ring to input shaft.

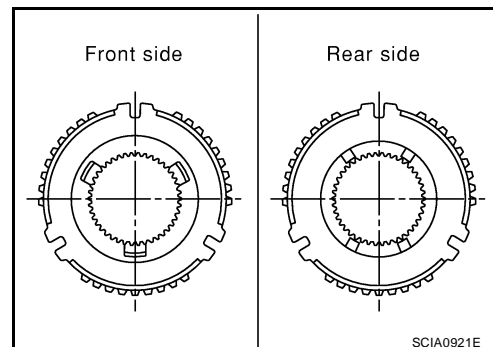
CAUTION:

Replace 3rd inner baulk ring, 3rd synchronizer cone, and 3rd outer baulk ring as a set.

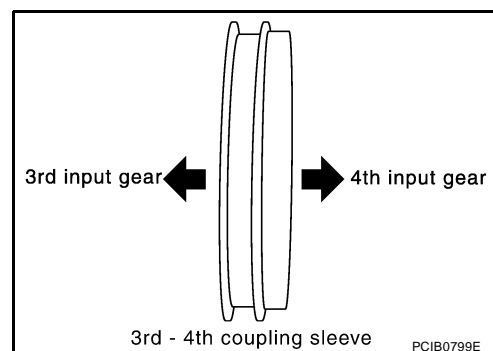
3. Install 3rd-4th spread springs, 3rd-4th shifting inserts, and 3rd-4th synchronizer hub onto 3rd-4th coupling sleeve.

CAUTION:

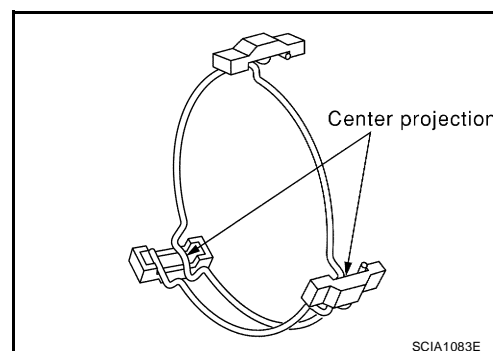
- Be careful with orientation of 3rd-4th synchronizer hub.
- Never reuse 3rd-4th synchronizer hub and 3rd-4th coupling sleeve.
- Replace 3rd-4th synchronizer hub and 3rd-4th coupling sleeve as a set.



- Be careful with orientation of 3rd-4th coupling sleeve.



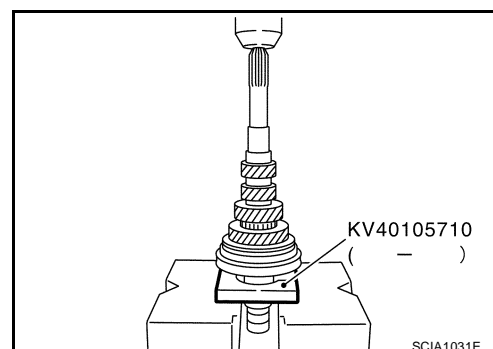
- Be sure not to hook center projection of 2 spread springs on same shifting insert.



4. Press in 3rd-4th synchronizer hub assembly using the press stand.

CAUTION:

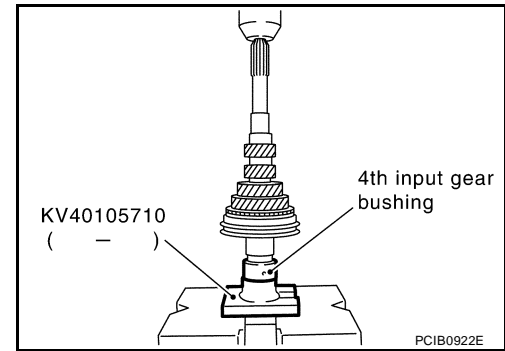
Align grooves of 3rd-4th shifting insert and 3rd outer baulk ring.



INPUT SHAFT AND GEARS

[RS6F52A]

5. Press in 4th input gear bushing using the press stand.
6. Install 4th baulk ring.
7. Install 4th needle bearing and 4th input gear to input shaft.



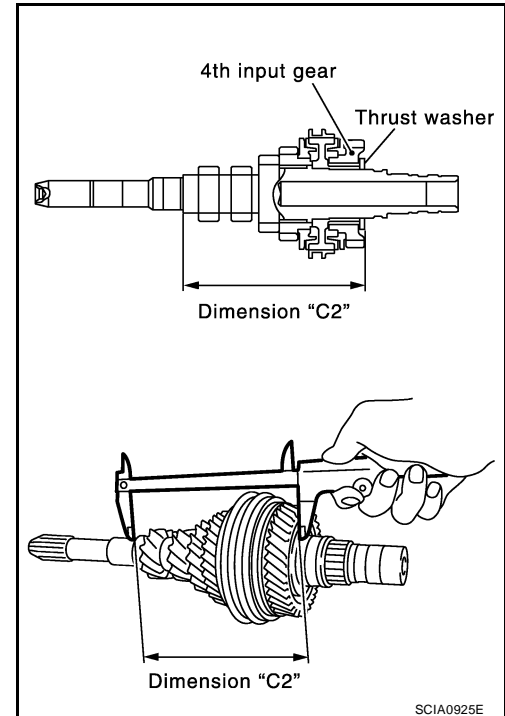
8. Select thrust washer so that dimension "C2" satisfies the standard value below. Then install thrust washer onto input shaft. Refer to [MT-125, "INPUT SHAFT THRUST WASHER"](#).

Standard value for dimension "C2"

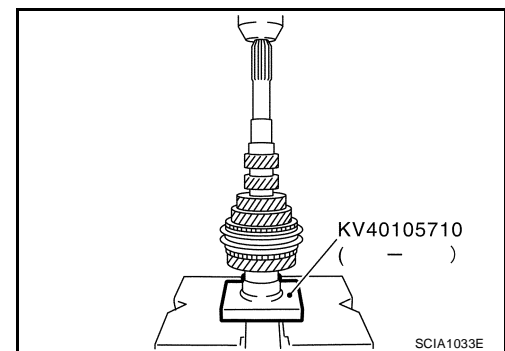
: Refer to [MT-125, "INPUT SHAFT THRUST WASHER"](#)

CAUTION:

Only one thrust washer can be selected.



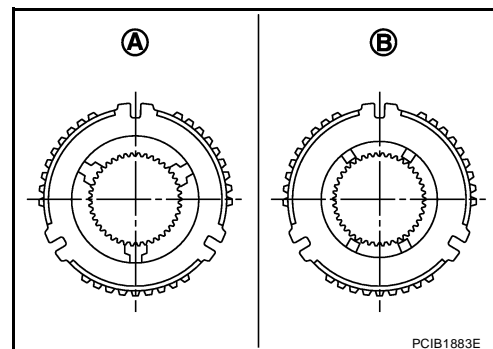
9. Press in 5th input gear bushing using the press stand.
CAUTION:
Never reuse 5th input gear bushing.
10. Install 5th needle bearing and 5th input gear to input shaft.
11. Install 5th baulk ring.



12. Install 5th-6th synchronizer hub, 5th-6th spread springs, and 5th-6th shifting inserts onto 5th-6th coupling sleeve.

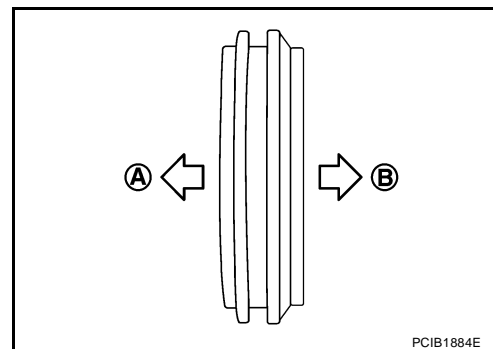
CAUTION:

- Be careful with orientation of 5th-6th synchronizer hub.
 - A : Front side
 - B : Rear side
- Never reuse 5th-6th synchronizer hub and 5th-6th coupling sleeve.
- Replace 5th-6th synchronizer hub and 5th-6th coupling sleeve as a set.

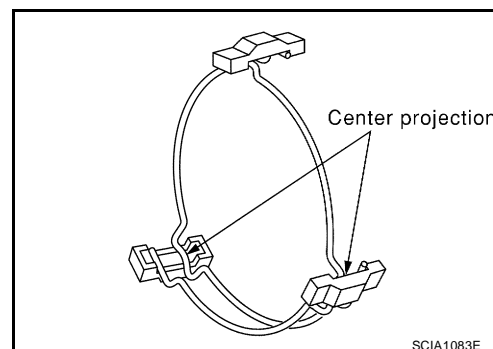


- Be careful with orientation of 5th-6th coupling sleeve.

- A : 5th input gear side
- B : 6th input gear side



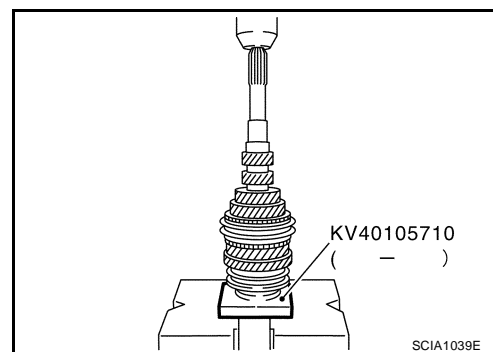
- Be sure not to hook center projection of 2 spread springs on same shifting insert.



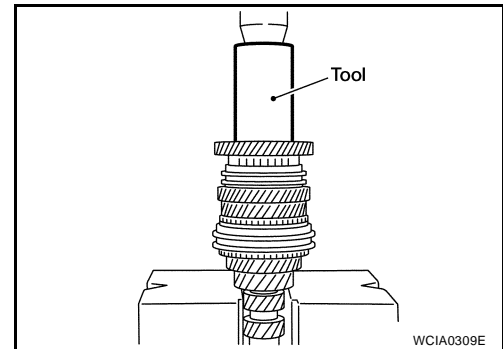
- Press in 5th-6th synchronizer hub assembly using the press stand.

CAUTION:

Align grooves of 5th-6th shifting insert and 5th baulk ring.



14. Install 6th needle bearing, 6th input gear, 6th baulk ring onto 6th input gear bushing and then press in 6th input gear bushing onto input shaft using the drift [SST: ST33200000 (J-26082)].



15. Install snap ring onto input shaft and make sure that end play (gap between snap ring and groove) of 6th input gear bushing satisfies the standard value.

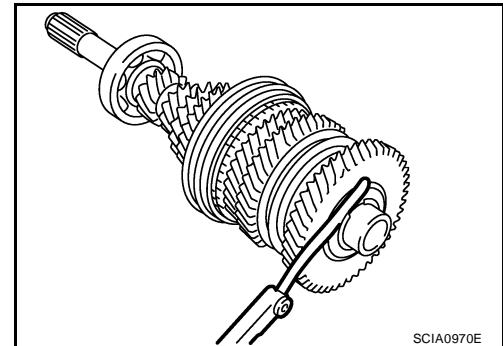
End play standard value

:Refer to [MT-125, "6TH INPUT GEAR BUSHING"](#) .

- If measurement is outside the standard range, select snap ring. Refer to [MT-125, "6TH INPUT GEAR BUSHING"](#) .

CAUTION:

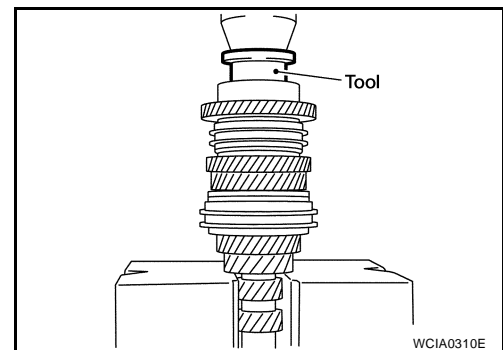
Never reuse snap ring.



16. Press in input shaft rear bearing using the drift [SST: ST30901000 (J-26010-01)].

CAUTION:

Install input shaft rear bearing with its brown surface facing the 6th input gear side.

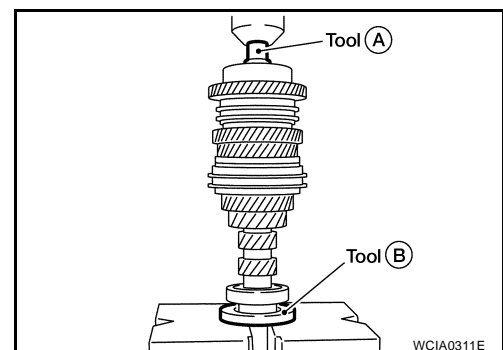


17. Press in input shaft front bearing using the drifts.

A: Drift [SST: ST33052000 (—)]

B: Drift [SST: ST30032000 (J-26010-01)]

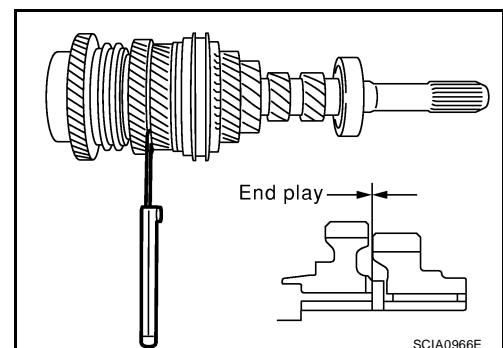
18. Install oil channel onto input shaft.



19. Check end play of 3rd, 4th, 5th, and 6th input gears.

End play standard value

: Refer to [MT-124, "Gear End Play"](#) .



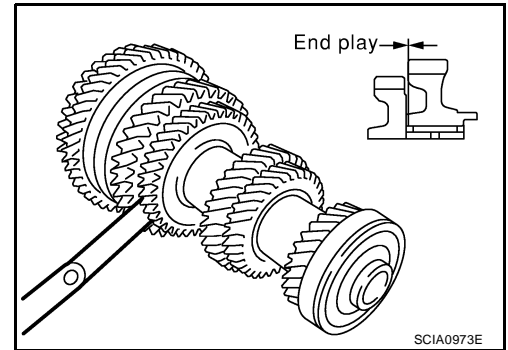
MAINSHAFT AND GEARS

Disassembly and Assembly

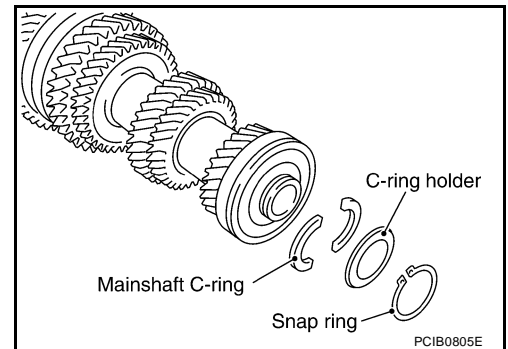
1. Before disassembling, measure the end play of 1st and 2nd main gears.

End play standard value

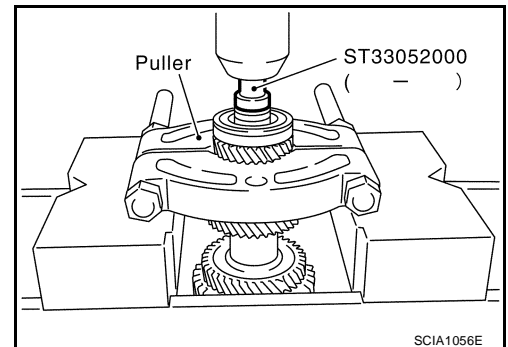
: Refer to [MT-124, "Gear End Play"](#) .



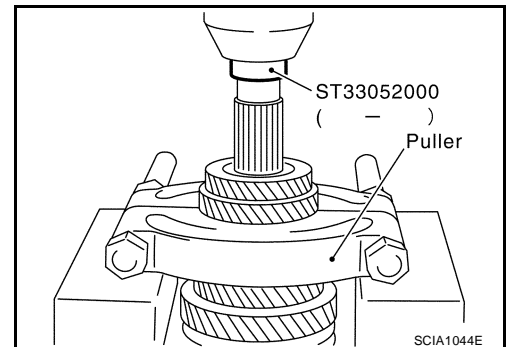
2. Remove snap ring.
3. Remove C-ring holder and then remove mainshaft C-rings.



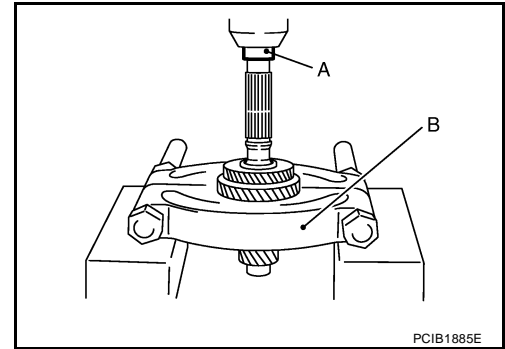
4. Press out mainshaft rear bearing, 6th main gear adjusting shim, and 6th main gear using the drift and a puller.
5. Remove 5th-6th mainshaft spacer.



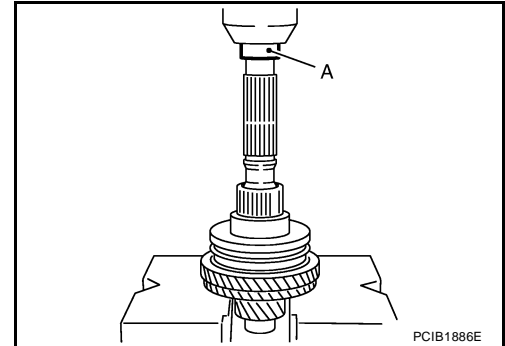
6. Press out 4th main gear and 5th main gear using the drift and a puller.
7. Remove 4th main gear adjusting shim.
8. Remove 3rd-4th mainshaft spacer.



9. Press out 3rd main gear and 2nd main gear using the drift (A) [SST: KV40105020 (—)] and a puller (B).
10. Remove 2nd needle bearing.



11. Press out 2nd main gear bushing, 1st-2nd synchronizer hub assembly, 1st main gear, 1st needle bearing, 1st main gear bushing, and reverse main gear using the drift (A) [SST: KV40105020 (—)].

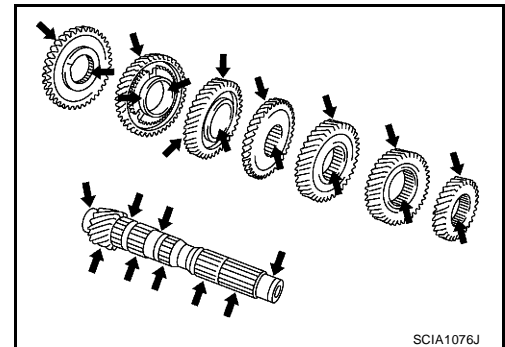


INSPECTION AFTER DISASSEMBLY

Mainshaft and Gears

Check items below. If necessary, replace them with new ones.

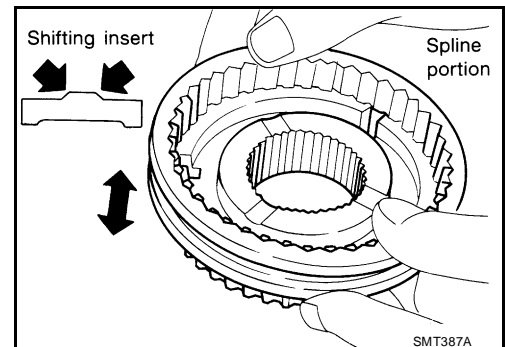
- Damage, peeling, dent, uneven wear, bending, and other non-standard conditions of the shaft.
- Excessive wear, damage, peeling, and other non-standard conditions of the gears.



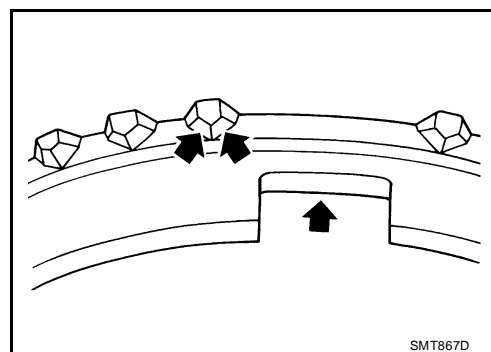
Synchroizer

Check items below. If necessary, replace them with new ones.

- Damage and unusual wear on contact surfaces of coupling sleeve, synchronizer hub and shifting insert.
- Coupling sleeve and synchronizer hub must move smoothly.



- If any crack, damage, or excessive wear is found on cam face of baulk ring or working face of insert, replace it.



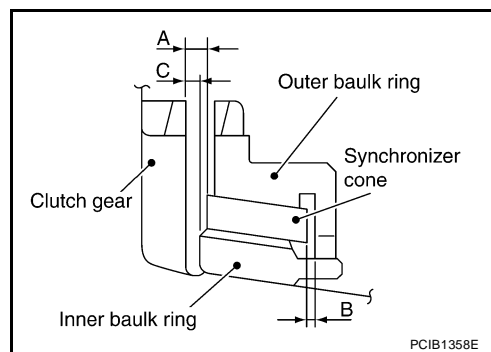
BAULK RING CLEARANCE

Triple-cone synchronizer (1st and 2nd)

- Check the clearance between outer baulk ring, synchronizer cone, and inner baulk ring as follows.

CAUTION:

The clearances "A", "B", and "C" are controlled with outer baulk ring, synchronizer cone, and inner baulk ring as a set. Replace them as a set if the clearances are outside the limit value.

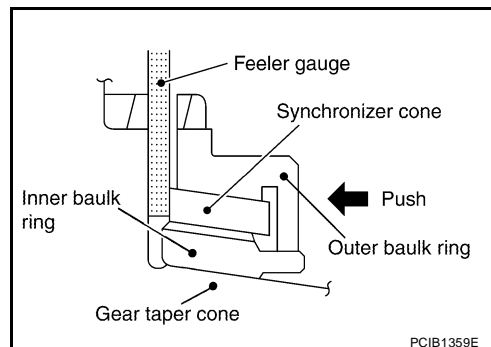


- Measure the clearance "A" at 2 points or more diagonally opposite using a feeler gauge when pressing baulk ring toward clutch gear taper cone. And then calculate mean value.

Clearance "A"

Standard value : Refer to [MT-124, "Baulk Ring Clearance"](#) .

Limit value : Refer to [MT-124, "Baulk Ring Clearance"](#) .

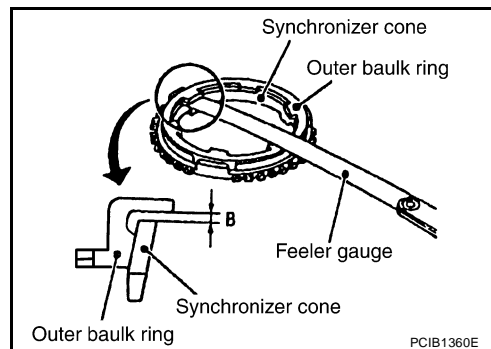


- Measure the clearance "B" at 2 points or more diagonally opposite using a feeler gauge. And then calculate mean value.

Clearance "B"

Standard value : Refer to [MT-124, "Baulk Ring Clearance"](#) .

Limit value : Refer to [MT-124, "Baulk Ring Clearance"](#) .

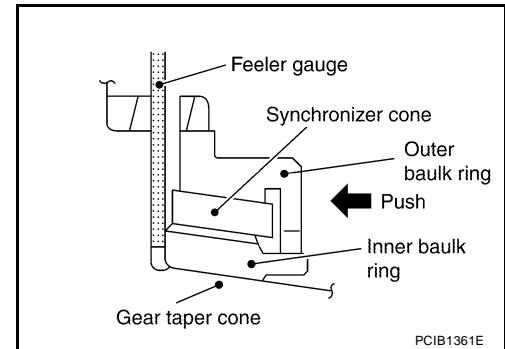


- Measure the clearance "C" at 2 points or more diagonally opposite using a feeler gauge when pressing baulk ring toward clutch gear taper cone. And then calculate mean value.

Clearance "C"

Standard value : Refer to [MT-124, "Baulk Ring Clearance"](#) .

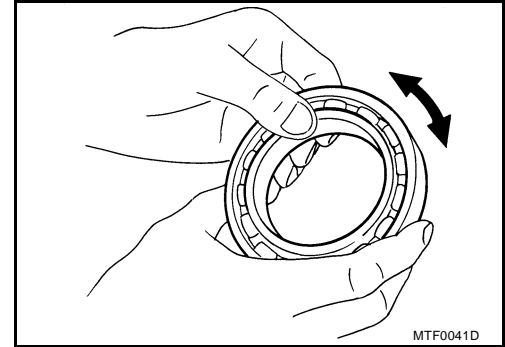
Limit value : Refer to [MT-124, "Baulk Ring Clearance"](#) .



Bearing

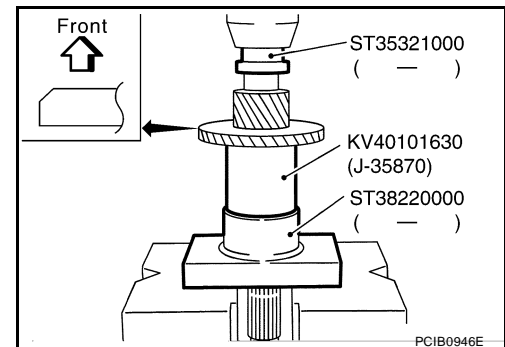
Check items below. If necessary, replace them with new ones.

- Damage and rough rotation of bearing



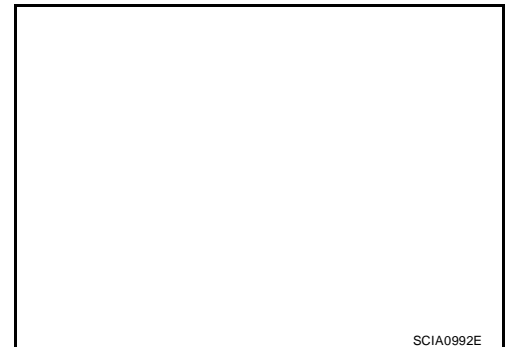
ASSEMBLY

- Press in reverse main gear using the drifts and the press stand.



CAUTION:

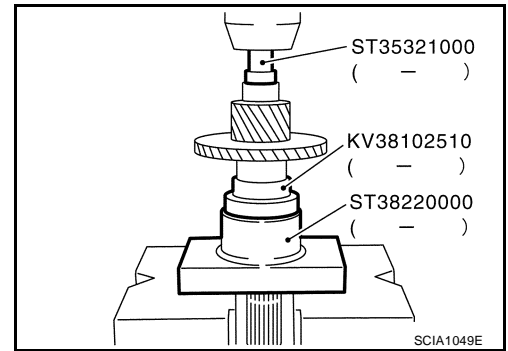
- Be careful with orientation of reverse main gear.
- Never reuse reverse main gear.



MAINSHAFT AND GEARS

[RS6F52A]

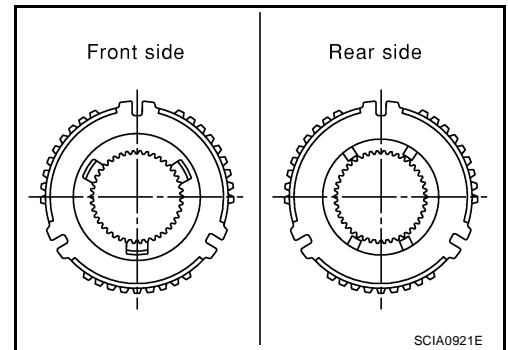
2. Press in 1st main gear bushing using the drifts and the press stand.
3. Install 1st needle bearing and then 1st main gear.



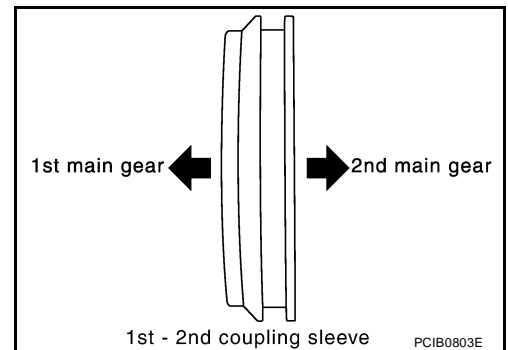
4. Install 1st-2nd spread springs, 1st-2nd shifting inserts, and 1st-2nd synchronizer hub onto 1st-2nd coupling sleeve.

CAUTION:

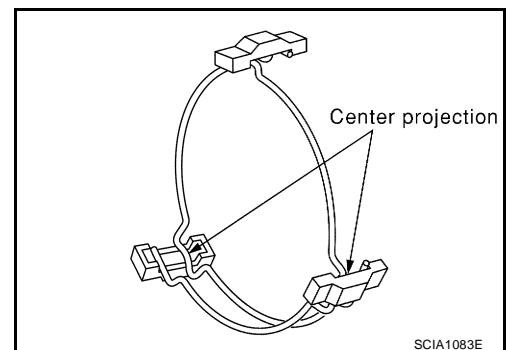
- Be careful with orientation of 1st-2nd synchronizer hub.
- Never reuse 1st-2nd synchronizer hub and 1st-2nd coupling sleeve.
- Replace 1st-2nd synchronizer hub and 1st-2nd coupling sleeve as a set.



- Be careful with orientation of 1st-2nd coupling sleeve.



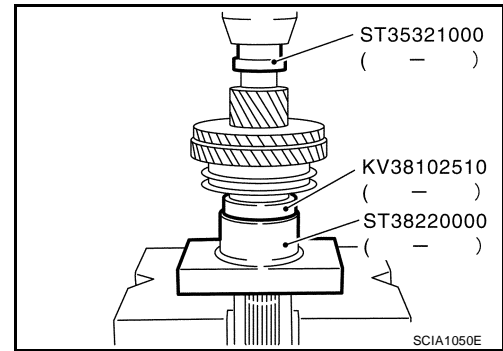
- Be sure not to hook center projection of 2 spread springs on same 1st-2nd shifting insert.



- Install 1st inner baulk ring, 1st synchronizer cone, and 1st outer baulk ring onto mainshaft and then press in 1st-2nd synchronizer hub assembly onto mainshaft using the drifts and the press stand.

CAUTION:

- Outer baulk ring, synchronizer cone, and inner baulk ring on 2nd gear-side must have been removed.
- Be careful with orientation of coupling sleeve.
- Replace 1st inner baulk ring, 1st synchronizer cone, and 1st outer baulk ring as a set.

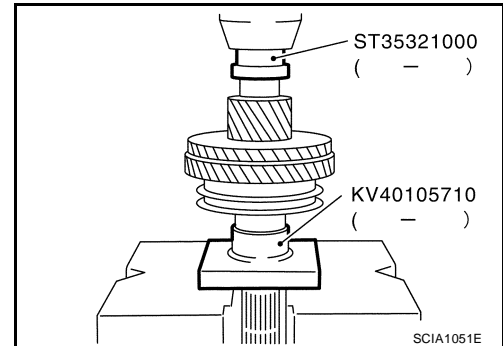


- Press in 2nd main gear bushing using the drift and the press stand.
- Install 2nd outer baulk ring, 2nd synchronizer cone, and 2nd inner baulk ring.

CAUTION:

Replace 2nd outer baulk ring, 2nd synchronizer cone, and 2nd inner baulk ring as a set.

- Install 2nd needle bearing and 2nd main gear.

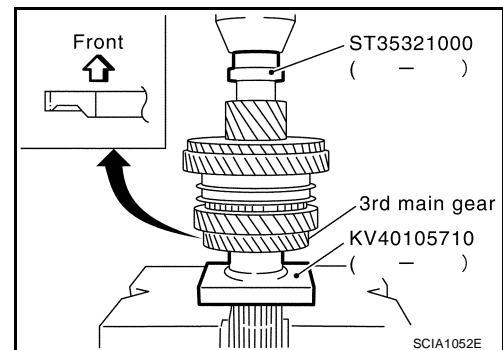


- Press in 3rd main gear using the drift and the press stand.

CAUTION:

- Be careful with orientation of 3rd main gear.
- Never reuse 3rd main gear.

- Install 3rd-4th mainshaft spacer.



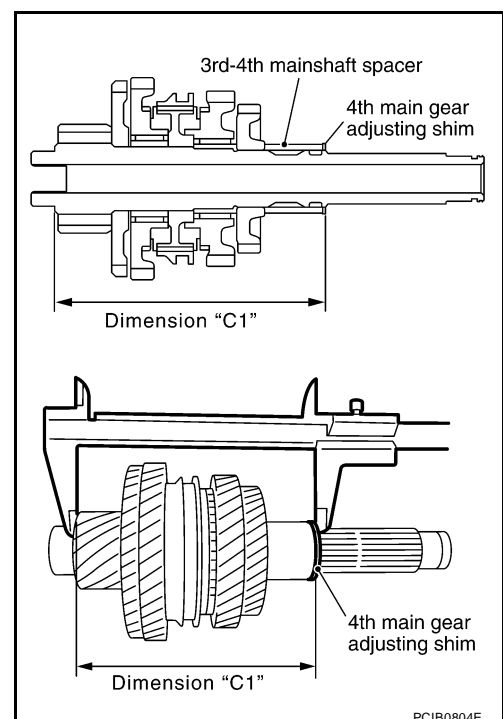
- Select 4th main gear adjusting shim so that dimension "C1" satisfies the standard value below and install 4th main gear adjusting shim onto mainshaft. Refer to [MT-126, "4TH MAIN GEAR ADJUSTING SHIM"](#).

Standard value for dimension "C1"

: Refer to [MT-126, "4TH MAIN GEAR ADJUSTING SHIM"](#).

CAUTION:

Only one adjusting shim can be selected.



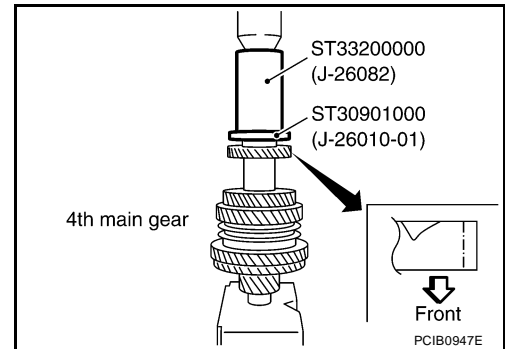
MAINSHAFT AND GEARS

[RS6F52A]

12. Press in 4th main gear using the drifts.

CAUTION:

- Be careful with orientation of 4th main gear.
- Never reuse 4th main gear.

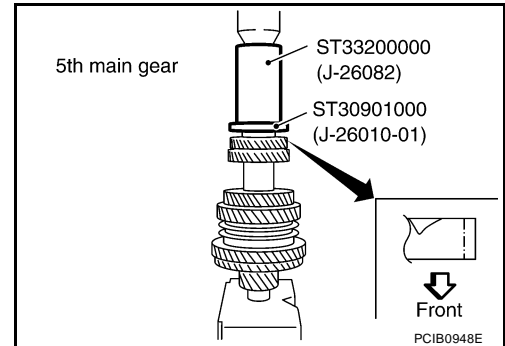


13. Press in 5th main gear using the drifts.

CAUTION:

- Be careful with orientation of 5th main gear.
- Never reuse 5th main gear.

14. Install 5th-6th mainshaft spacer.



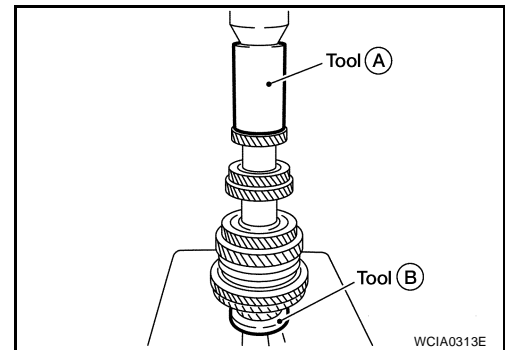
15. Press in 6th main gear using the drifts.

A: Drift [SST: ST33200000 (J-26082)]

B: Drift [SST: ST30901000 (J-26010-01)]

CAUTION:

Never reuse 6th main gear.



16. Select 6th main gear adjusting shim and then install it onto mainshaft.

- Calculate thickness "S" of 6th main gear adjusting shim following the procedure below so that end play dimension between 6th main gear and mainshaft rear bearing becomes the dimension shown below. Refer to [MT-127, "6TH MAIN GEAR ADJUSTING SHIM"](#) .

End play :Refer to [MT-127, "6TH MAIN GEAR ADJUSTING SHIM"](#) .

Dimension "S" = (S₁ - S₂) - End play

S : Thickness of adjusting shim

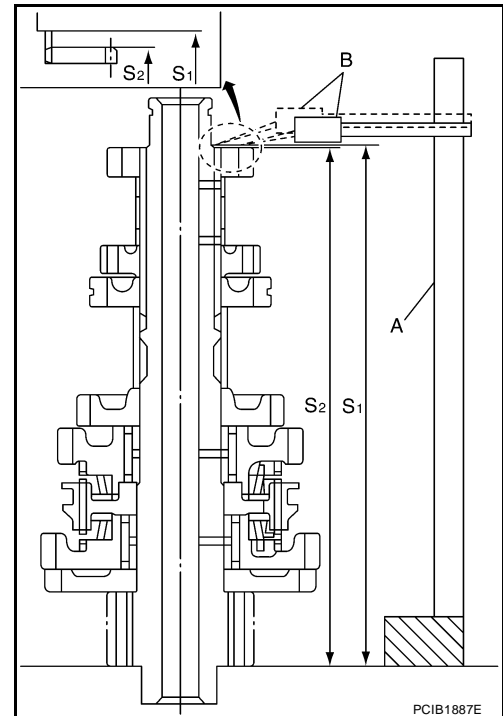
S₁ : Dimension from mainshaft standard face to mainshaft rear bearing press-fit end face

S₂ : Dimension from mainshaft standard face to 6th main gear end face

CAUTION:

Only one adjusting shim can be selected.

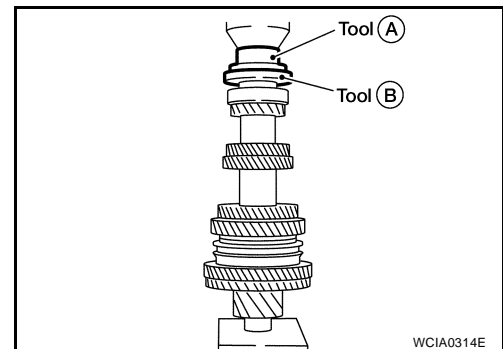
- Measure dimension "S₁" and "S₂" using a height gauge (A) and pick tester (B).
- Install selected 6th main gear adjusting shim to mainshaft.



- Press in mainshaft rear bearing using the drifts.

A: Drift [SST: ST30720000 (J-25405)]

B: Drift [SST: ST30901000 (J-26010-01)]

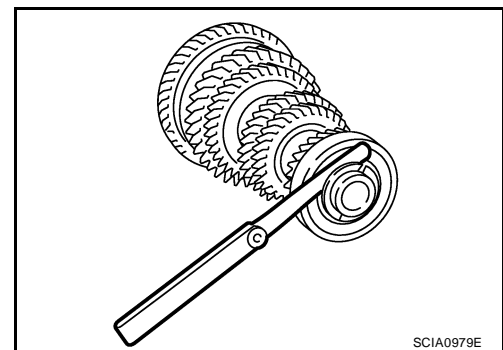


- Install mainshaft C-rings onto mainshaft and check that end play of mainshaft rear bearing satisfies the standard value.

End play standard value

: Refer to [MT-125, "MAINSHAFT C-RING"](#) .

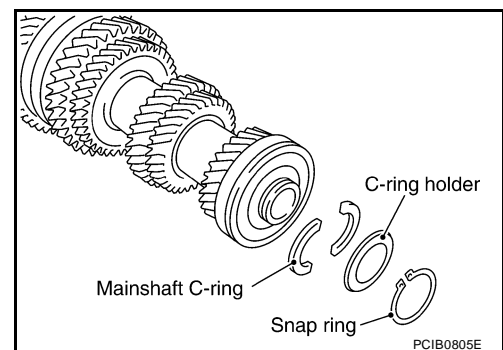
- If measurement is outside the standard range, reselect mainshaft C-rings. Refer to [MT-125, "MAINSHAFT C-RING"](#) .



- Install C-ring holder and then install snap ring.

CAUTION:

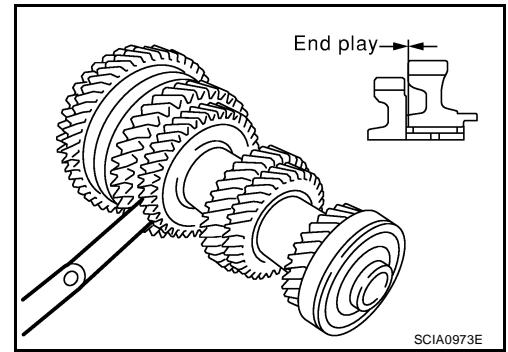
Never reuse snap ring.



20. Check end play of 1st and 2nd main gears.

End play standard value

: Refer to [MT-124, "Gear End Play"](#) .



A

B

MT

D

E

F

G

H

I

J

K

L

M

REVERSE IDLER SHAFT AND GEARS

Disassembly and Assembly DISASSEMBLY

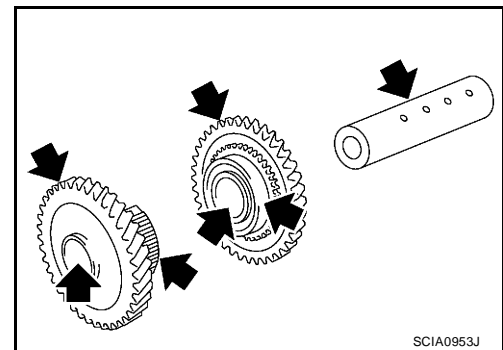
1. Remove reverse idler gear (rear), reverse coupling sleeve, and reverse insert springs simultaneously.
2. Remove reverse idler gear needle bearing.
3. Remove thrust needle bearing.
4. Remove reverse baulk ring.
5. Remove reverse idler gear (front).
6. Remove reverse idler gear needle bearing.
7. Remove thrust needle bearing.
8. Remove retaining pin from reverse idler shaft.

INSPECTION AFTER DISASSEMBLY

Reverse Idler Shaft and Gears

Check items below. If necessary, replace them with new ones.

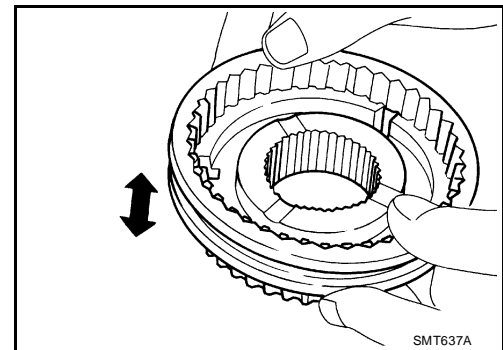
- Damage, peeling, dent, uneven wear, bending, and other non-standard conditions of the shaft.
- Excessive wear, damage, peeling, and other non-standard conditions of the gears.



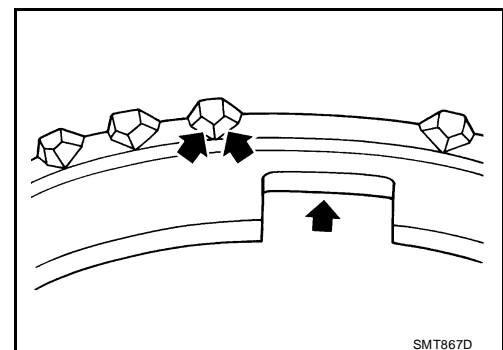
Synchronizer

Check items below. If necessary, replace them with new ones.

- Damage and unusual wear on contact surfaces of coupling sleeve, synchronizer hub of reverse idler gear (rear), and insert spring.
- Coupling sleeve and synchronizer hub of reverse idler gear (rear) must move smoothly.



- If any crack, damage, or excessive wear is found on cam face of baulk ring or working face of insert, replace it.



BAULK RING CLEARANCE

REVERSE IDLER SHAFT AND GEARS

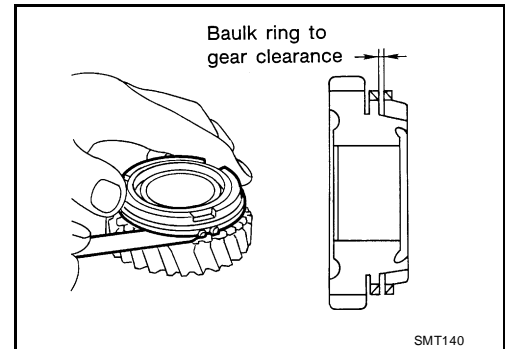
[RS6F52A]

- Push baulk ring on the cone and measure the clearance between baulk ring and cone. If the measurement is below limit, replace it with a new one.

Clearance

Standard value : Refer to [MT-124, "Baulk Ring Clearance"](#) .

Limit value : Refer to [MT-124, "Baulk Ring Clearance"](#) .



Bearing

Check items below. If necessary, replace them with new ones.

- Damage and rough rotation of bearing.

ASSEMBLY

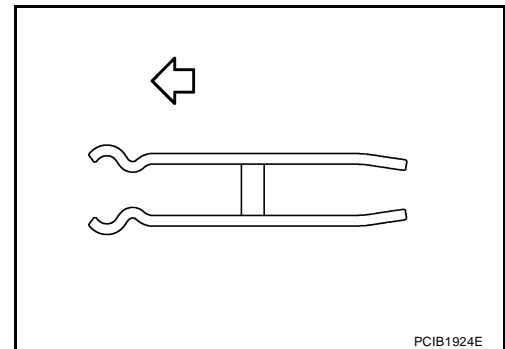
Note the following, and assemble in the reverse order of disassembly.

CAUTION:

- Be careful with orientation of reverse insert spring.

⇐ : Front

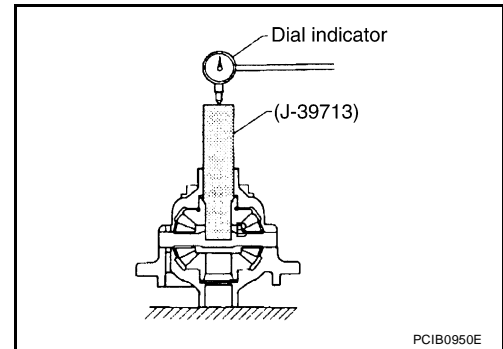
- Never reuse retaining pin.



FINAL DRIVE

Disassembly and Assembly PRE-INSPECTION

- Check the clearance between side gear and differential case as follows.
- 1. Clean final drive assembly sufficiently to prevent side gear thrust washer, differential case, side gear, and other parts from sticking by gear oil.



2. Put differential case vertically so that side gear to be measured faces upward.
3. Place the drift and a dial indicator onto side gear. Move side gear up and down, and measure the clearance.

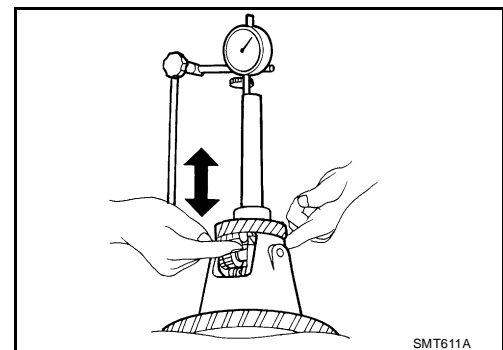
Allowable Clearance between side gear and differential case with thrust washer

: Refer to MT-125, "DIFFERENTIAL SIDE GEAR THRUST WASHER" .

CAUTION:

There should be no resistance and gears should rotate freely.

4. If not within specification, adjust the clearance by changing side gear thrust washer thickness.
5. Turn differential case upside down and measure the clearance between side gear and differential case on the other side in the same way.



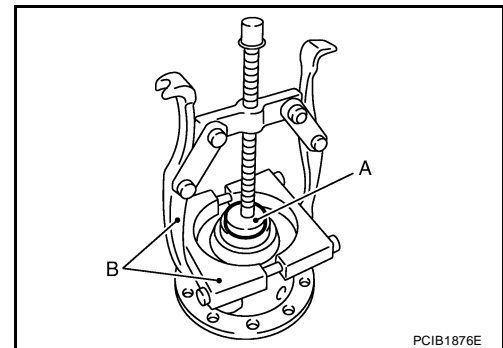
DISASSEMBLY

1. Remove final gear mounting bolts and then separate the final gear from differential case.
2. Remove differential side bearing (clutch housing side) using the drift (A) [SST: ST33061000 (J-8107-2)] and pullers (B).

CAUTION:

Hook a puller on the cage of differential side bearing.

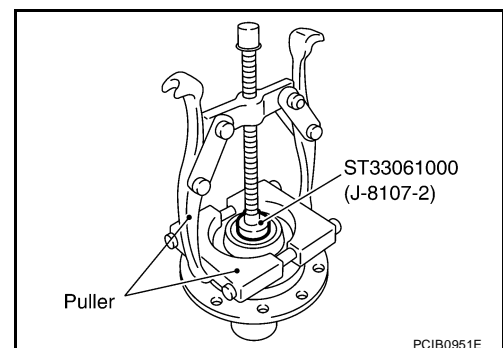
3. Remove speedometer drive gear.



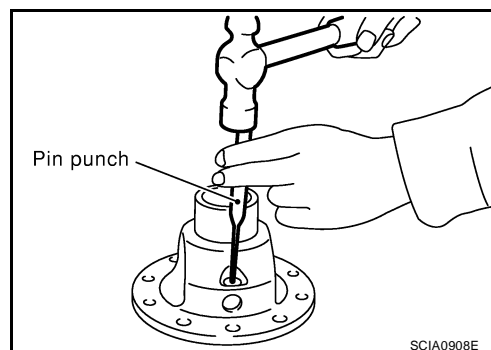
4. Remove differential side bearing (transaxle case side) using the drift and pullers.

CAUTION:

Hook a puller on the inner race of differential side bearing.



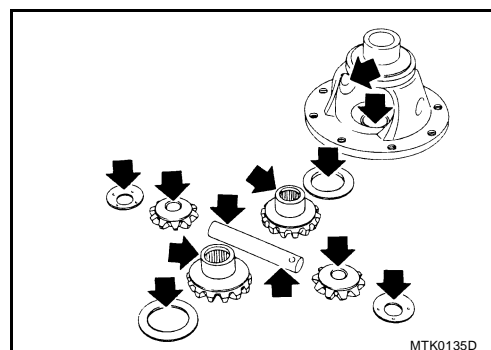
5. Remove retaining pin from differential case using a pin punch and then remove pinion mate shaft.
6. Rotate pinion mate gears and remove pinion mate gears, pinion mate thrust washers, side gears, and side gear thrust washers from differential case.



INSPECTION AFTER DISASSEMBLY

Gear, Washer, Shaft and Case

- Check side gears, side gear thrust washers, pinion mate shaft, pinion mate gears, pinion mate thrust washers and differential case. If necessary, replace with a new one.

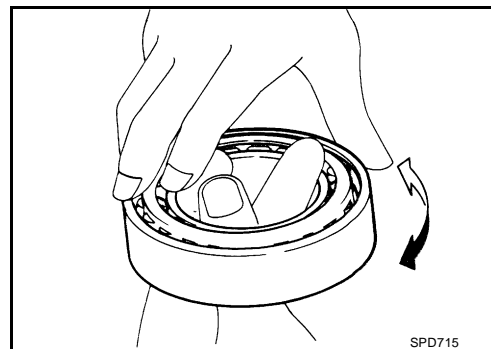


Bearing

- Check for bearings damage and rough rotation. If necessary, replace with a new one.

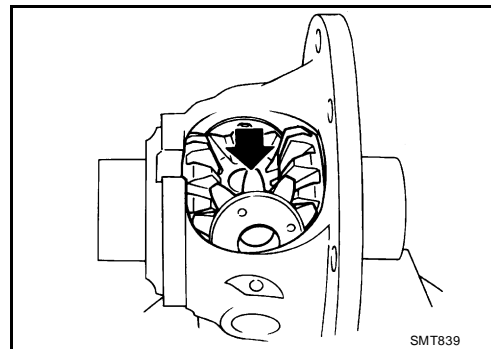
CAUTION:

When replacing tapered roller bearing, replace outer and inner races as a set.



ASSEMBLY

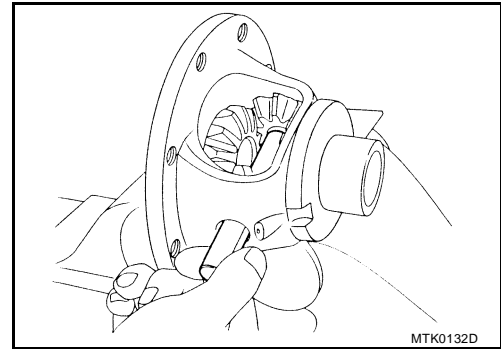
1. Apply gear oil to sliding area of differential case, each gear, and thrust washer.
2. Install side gear thrust washers and side gears into differential case.
3. While rotating pinion mate thrust washers and pinion mate gears, aligning them diagonally, install them into differential case.



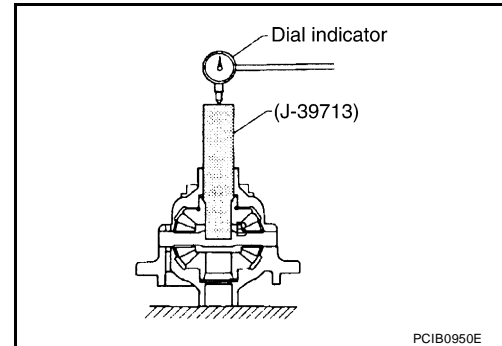
4. Insert pinion mate shaft into differential case.

CAUTION:

Be sure not to damage pinion mate thrust washers.



5. Measure end play of side gears following the procedure below. Then select side gear thrust washer.
 - a. Put differential case vertically so that its side gear to be measured faces upward.
 - b. Place the preload adapter and a dial indicator onto side gears.



- c. Move side gears up and down to measure the clearance and select thrust washer so that it satisfies the standard value. Refer to [MT-125, "DIFFERENTIAL SIDE GEAR THRUST WASHER"](#).

Allowable Clearance between side gear and differential case with thrust washer

: Refer to [MT-125, "DIFFERENTIAL SIDE GEAR THRUST WASHER"](#).

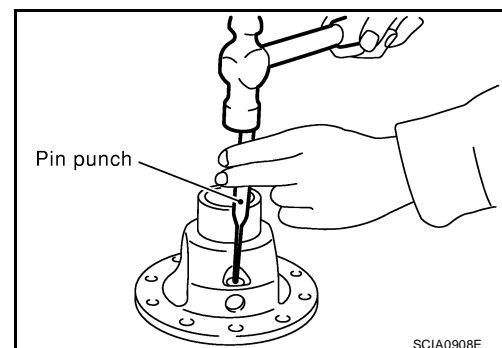
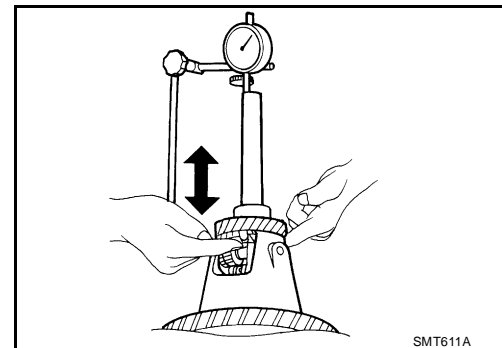
CAUTION:

- There should be no resistance and gears should rotate freely.
- Place differential case upside down. Measure the end play for opposite side-gears likewise securely.
- Only one thrust washer can be selected.

6. Install retaining pin into pinion mate shaft using a pin punch.

CAUTION:

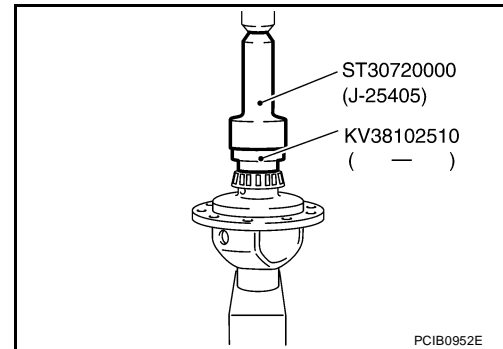
Never reuse retaining pin.



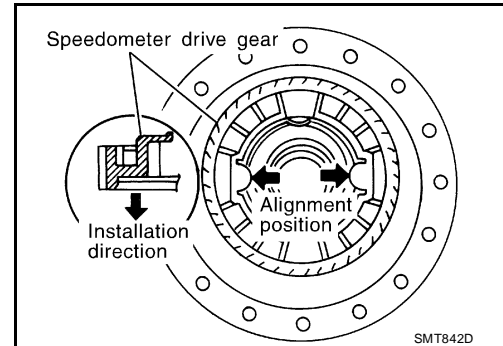
7. Press in differential side bearing (transaxle case side) to differential case using the drifts.

CAUTION:

Replace differential side bearing and differential side bearing outer race as a set.



8. Align and install speedometer drive gear onto differential case.



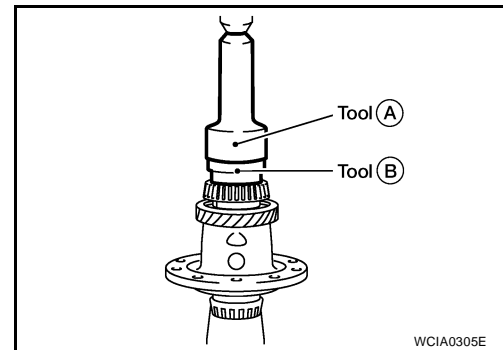
9. Press in differential side bearing (clutch housing side) to differential case using the drifts.

A: Drift [SST: ST30720000 (J-25405)]

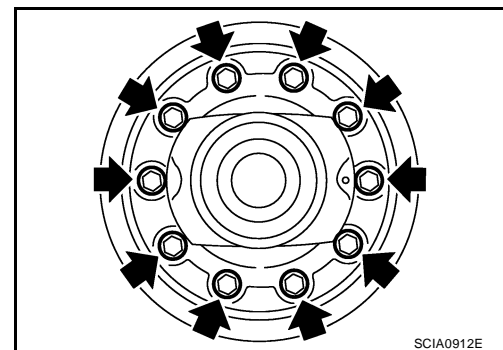
B: Drift [SST: KV38102510 (—)]

CAUTION:

- Never reuse differential side bearing and differential side bearing outer race.
- Replace differential side bearing and differential side bearing outer race as a set.



10. Install final gear into differential case and tighten final gear mounting bolts to the specified torque. Refer to [MT-72, "Final Drive Components"](#).

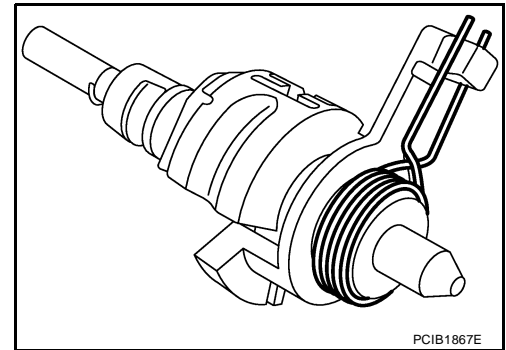


SHIFT CONTROL

Disassembly and Assembly

DISASSEMBLY

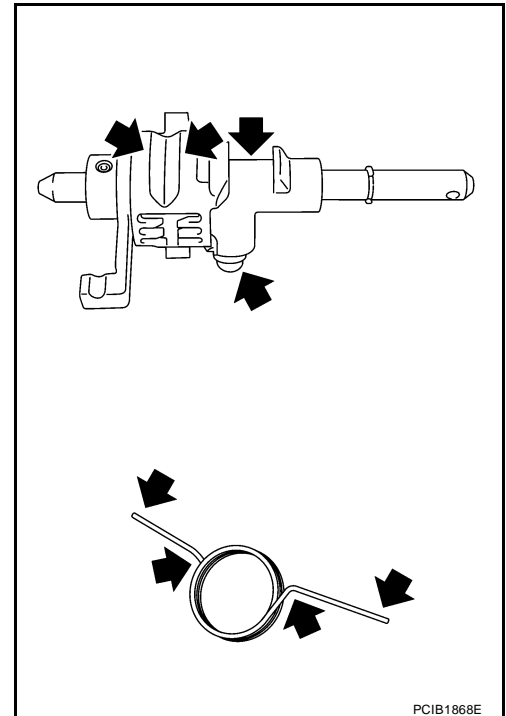
1. Remove return spring to striking rod assembly.



INSPECTION AFTER DISASSEMBLY

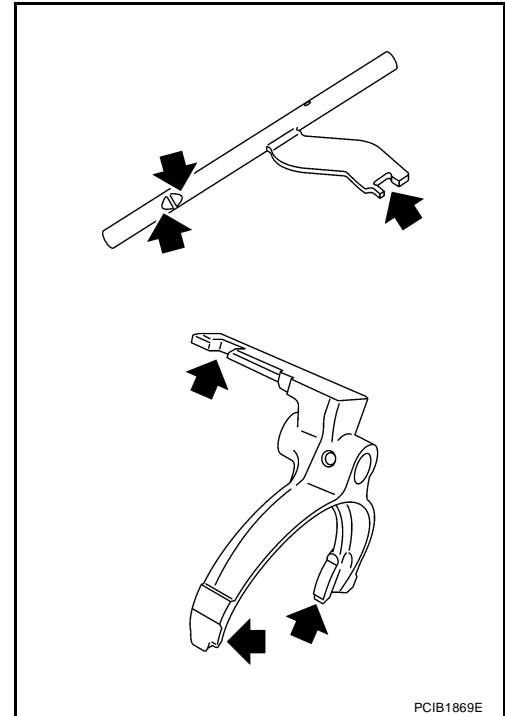
Striking Rod Assembly and Return Spring

- Check contact surfaces and sliding area for wear, damage, bending, etc. If necessary, replace parts.



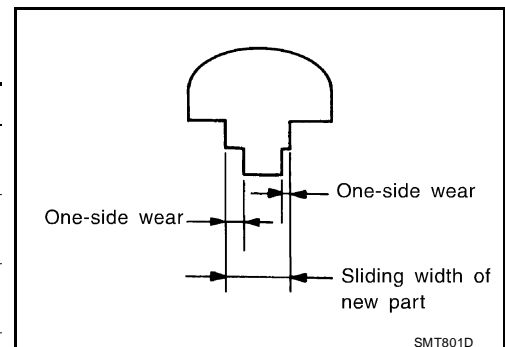
Fork Rod and Shift Fork

- Check contact surfaces and sliding area for wear, damage, bending, etc. If necessary, replace parts.



- Check if the width of shift fork hook (sliding area with coupling sleeve) is within allowable specification below.

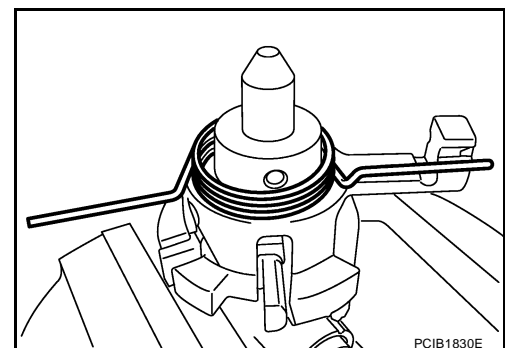
Item	One-side wear specification	Sliding width of new part
1st-2nd	0.2 mm (0.008 in)	7.80 - 7.93 mm (0.3071 - 0.3122 in)
3rd-4th	0.2 mm (0.008 in)	7.80 - 7.93 mm (0.3071 - 0.3122 in)
5th-6th	0.2 mm (0.008 in)	6.10 - 6.23 mm (0.2402 - 0.2453 in)
Reverse	0.2 mm (0.008 in)	12.80 - 12.93 mm (0.5039 - 0.5091 in)



ASSEMBLY

- Temporarily install return spring to striking rod assembly.

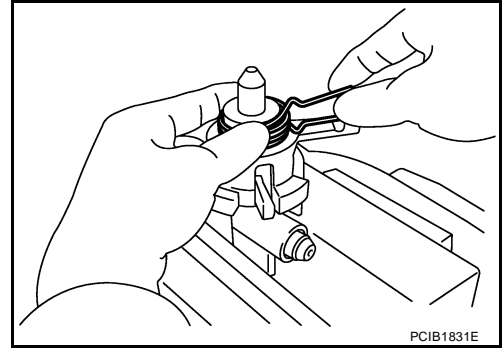
CAUTION:
Be careful with the orientation of return spring.



SHIFT CONTROL

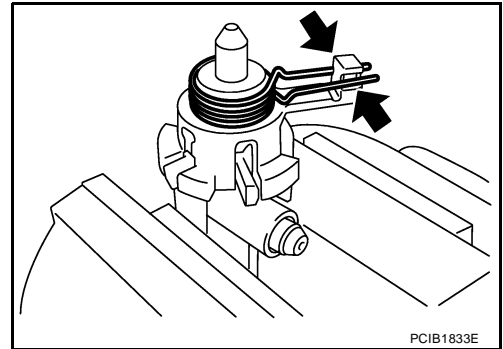
[RS6F52A]

2. Attach one end of the return spring to striking interlock of striking rod assembly while holding return spring.



CAUTION:

- When installing, check that return spring is securely seated in the groove of striking interlock of striking rod assembly.



SERVICE DATA AND SPECIFICATIONS (SDS)

[RS6F52A]

SERVICE DATA AND SPECIFICATIONS (SDS)

PFP:00030

General Specifications TRANSAXLE

UCS007AS

Engine type			QR25DE
Transaxle model			RS6F52A
Model code number			ET80D
Number of speed			6
Synchromesh type			Warner
Shift pattern			<div><div><div>R</div><div>1</div><div>3</div><div>5</div><div>2</div><div>4</div><div>6</div><div>N</div></div><div>PCIB1769E</div></div>
Gear ratio	1st		3.153
	2nd		1.950
	3rd		1.392
	4th		1.055
	5th		0.809
	6th		0.630
	Reverse		3.002
Number of teeth	Input gear	1st	13
		2nd	20
		3rd	28
		4th	36
		5th	42
		6th	46
		Reverse	13
	Main gear	1st	41
		2nd	39
		3rd	39
		4th	38
		5th	34
		6th	29
		Reverse	38
	Reverse idler gear	Front	37
		Rear	38
Oil level			mm (in) 61.0 - 67.0 (2.402 - 2.638)
Oil capacity (Reference)			ℓ (US pt, Imp pt) 1.7 (3-5/8, 3)
Remarks	Reverse synchronizer		Installed
	Double-cone synchronizer		3rd
	Triple-cone synchronizer		1st and 2nd

FINAL GEAR

Engine type	QR25DE	
Transaxle model	RS6F52A	
Model code number	ET80D	
Final gear ratio	4.428	
Number of teeth	Final gear/Pinion	62/14
	Side gear/Pinion mate gear	14/10

Gear End Play

UCS007AT

Unit: mm (in)

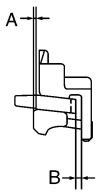
Gear	Standard value
1st main gear	0.20 - 0.30 (0.0079 - 0.0118)
2nd main gear	0.06 - 0.16 (0.0024 - 0.0063)
3rd input gear	0.18 - 0.31 (0.0071 - 0.0122)
4th input gear	0.20 - 0.30 (0.0079 - 0.0118)
5th input gear	0.06 - 0.16 (0.0024 - 0.0063)
6th input gear	0.06 - 0.16 (0.0024 - 0.0063)

Baulk Ring Clearance

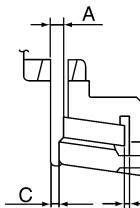
UCS007AU

Unit: mm (in)

Measurement point		Standard value	Limit value
3rd (Double-cone synchronizer)	Clearance between synchronizer cone and inner baulk ring end face "A"	0.6 - 0.8 (0.024 - 0.031)	0.2 (0.008)
	Clearance between outer baulk ring pawl and synchronizer cone "B"	0.6 - 1.1 (0.024 - 0.043)	0.2 (0.008)
1st and 2nd (Triple-cone synchronizer)	Clearance between synchronizer cone and clutch gear end face "A"	0.6 - 1.2 (0.024 - 0.047)	0.3 (0.012)
	Clearance between outer baulk ring pawl and synchronizer cone "B"	0.6 - 1.1 (0.024 - 0.043)	0.2 (0.008)
	Clearance between inner baulk ring and clutch gear end face "C"	0.7 - 1.1 (0.028 - 0.043)	0.3 (0.012)
4th		0.9 - 1.45 (0.035 - 0.057)	0.7 (0.028)
5th		0.95 - 1.4 (0.037 - 0.055)	0.7 (0.028)
6th		0.95 - 1.4 (0.037 - 0.055)	0.7 (0.028)
Reverse		0.95 - 1.4 (0.037 - 0.055)	0.7 (0.028)



PCIB0249E



PCIB0835J

SERVICE DATA AND SPECIFICATIONS (SDS)

[RS6F52A]

Available Snap Rings 6TH INPUT GEAR BUSHING

UCS007AV

End play standard value		0 - 0.1 mm (0 - 0.004 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
1.76 (0.0693)	32204 8H511	2.01 (0.0791)	32204 8H516
1.81 (0.0713)	32204 8H512	2.06 (0.0811)	32204 8H517
1.86 (0.0732)	32204 8H513	2.11 (0.0831)	32204 8H518
1.91 (0.0752)	32204 8H514	2.16 (0.0850)	32204 8H519
1.96 (0.0772)	32204 8H515	2.21 (0.0870)	32204 8H520

*: Always check with the Parts Department for the latest parts information.

Available C-Rings MAINSHAFT C-RING

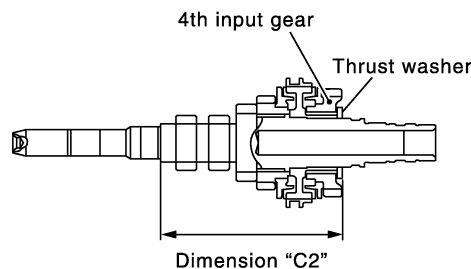
UCS007AW

End play standard value		0 - 0.06 mm (0 - 0.0024 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
2.535 (0.0998)	32348 8H800	2.835 (0.1116)	32348 8H810
2.565 (0.1010)	32348 8H801	2.865 (0.1128)	32348 8H811
2.595 (0.1022)	32348 8H802	2.895 (0.1140)	32348 8H812
2.625 (0.1033)	32348 8H803	2.925 (0.1152)	32348 8H813
2.655 (0.1045)	32348 8H804	2.955 (0.1163)	32348 8H814
2.685 (0.1057)	32348 8H805	2.985 (0.1175)	32348 8H815
2.715 (0.1069)	32348 8H806	3.015 (0.1187)	32348 8H816
2.745 (0.1081)	32348 8H807	3.045 (0.1199)	32348 8H817
2.775 (0.1093)	32348 8H808	3.075 (0.1211)	32348 8H818
2.805 (0.1104)	32348 8H809		

*: Always check with the Parts Department for the latest parts information.

Available Thrust Washer INPUT SHAFT THRUST WASHER

UCS007AX



SCIA1008E

Standard value for dimension "C2"		154.7 - 154.8 mm (6.091 - 6.094 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
3.84 (0.1512)	32347 8H500	4.02 (0.1583)	32347 8H503
3.90 (0.1535)	32347 8H501	4.08 (0.1606)	32347 8H504
3.96 (0.1559)	32347 8H502	4.14 (0.1630)	32347 8H505

*: Always check with the Parts Department for the latest parts information.

DIFFERENTIAL SIDE GEAR THRUST WASHER

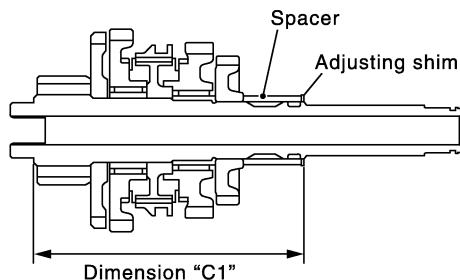
Allowable Clearance between side gear and differential case with thrust washer		0.1 - 0.2 mm (0.004 - 0.008 in)	
Thickness mm (in)	Part number*		
0.75 (0.0295)	38424 81X00		
0.80 (0.0315)	38424 81X01		
0.85 (0.0335)	38424 81X02		
0.90 (0.0354)	38424 81X03		
0.95 (0.0374)	38424 81X04		

*: Always check with the Parts Department for the latest parts information.

Available Adjusting Shims

4TH MAIN GEAR ADJUSTING SHIM

UCS007AY



SCIA1009E

Standard value for dimension "C1"		173.85 - 173.95 mm (6.844 - 6.848 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
0.52 (0.0205)	32238 8H500	0.84 (0.0331)	32238 8H504
0.60 (0.0236)	32238 8H501	0.92 (0.0362)	32238 8H505
0.68 (0.0268)	32238 8H502	1.00 (0.0394)	32238 8H506
0.76 (0.0299)	32238 8H503	1.08 (0.0425)	32238 8H507

*: Always check with the Parts Department for the latest parts information.

INPUT SHAFT REAR BEARING ADJUSTING SHIM

End play standard value			0 - 0.06 mm (0 - 0.0024 in)		
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
0.40 (0.0157)	32225 8H500	0.88 (0.0346)	32225 8H512	1.36 (0.0535)	32225 8H524
0.44 (0.0173)	32225 8H501	0.92 (0.0362)	32225 8H513	1.40 (0.0551)	32225 8H560
0.48 (0.0189)	32225 8H502	0.96 (0.0378)	32225 8H514	1.44 (0.0567)	32225 8H561
0.52 (0.0205)	32225 8H503	1.00 (0.0394)	32225 8H515	1.48 (0.0583)	32225 8H562
0.56 (0.0220)	32225 8H504	1.04 (0.0409)	32225 8H516	1.52 (0.0598)	32225 8H563
0.60 (0.0236)	32225 8H505	1.08 (0.0425)	32225 8H517	1.56 (0.0614)	32225 8H564
0.64 (0.0252)	32225 8H506	1.12 (0.0441)	32225 8H518	1.60 (0.0630)	32225 8H565
0.68 (0.0268)	32225 8H507	1.16 (0.0457)	32225 8H519	1.64 (0.0646)	32225 8H566
0.72 (0.0283)	32225 8H508	1.20 (0.0472)	32225 8H520		
0.76 (0.0299)	32225 8H509	1.24 (0.0488)	32225 8H521		
0.80 (0.0315)	32225 8H510	1.28 (0.0504)	32225 8H522		
0.84 (0.0331)	32225 8H511	1.32 (0.0520)	32225 8H523		

*: Always check with the Parts Department for the latest parts information.

MAINSHAFT REAR BEARING ADJUSTING SHIM

End play standard value		0 - 0.06 mm (0 - 0.0024 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
0.44 (0.0173)	32238 8H510	0.80 (0.0315)	32238 8H519
0.48 (0.0189)	32238 8H511	0.84 (0.0331)	32238 8H520
0.52 (0.0205)	32238 8H512	0.88 (0.0346)	32238 8H521
0.56 (0.0220)	32238 8H513	0.92 (0.0362)	32238 8H522
0.60 (0.0236)	32238 8H514	0.96 (0.0378)	32238 8H523
0.64 (0.0252)	32238 8H515	1.00 (0.0394)	32238 8H524
0.68 (0.0268)	32238 8H516	1.04 (0.0409)	32238 8H560
0.72 (0.0283)	32238 8H517	1.08 (0.0425)	32238 8H561
0.76 (0.0299)	32238 8H518		

*: Always check with the Parts Department for the latest parts information.

REVERSE IDLER GEAR ADJUSTING SHIM

End play standard value		0.04 - 0.10 mm (0.0016 - 0.0039 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
1.76 (0.0693)	32237 8H800	2.24 (0.0882)	32237 8H812
1.80 (0.0709)	32237 8H801	2.28 (0.0898)	32237 8H813
1.84 (0.0724)	32237 8H802	2.32 (0.0913)	32237 8H814
1.88 (0.0740)	32237 8H803	2.36 (0.0929)	32237 8H815
1.92 (0.0756)	32237 8H804	2.40 (0.0945)	32237 8H816
1.96 (0.0772)	32237 8H805	2.44 (0.0961)	32237 8H817
2.00 (0.0787)	32237 8H806	2.48 (0.0976)	32237 8H818
2.04 (0.0803)	32237 8H807	2.52 (0.0992)	32237 8H819
2.08 (0.0819)	32237 8H808	2.56 (0.1008)	32237 8H820
2.12 (0.0835)	32237 8H809	2.60 (0.1024)	32237 8H821
2.16 (0.0850)	32237 8H810	2.64 (0.1039)	32237 8H822
2.20 (0.0866)	32237 8H811		

*: Always check with the Parts Department for the latest parts information.

6TH MAIN GEAR ADJUSTING SHIM

End play standard value		0 - 0.1 mm (0 - 0.004 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
0.88 (0.0346)	32237 8H560	1.20 (0.0472)	32237 8H564
0.96 (0.0378)	32237 8H561	1.28 (0.0504)	32237 8H565
1.04 (0.0409)	32237 8H562	1.36 (0.0535)	32237 8H566
1.12 (0.0441)	32237 8H563		

*: Always check with the Parts Department for the latest parts information.

STRIKING ROD ADJUSTING SHIM

End play standard value		0.05 - 0.152 mm (0.0020 - 0.0060 in)	
Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
1.12 (0.0441)	33761 JA60A	1.52 (0.0598)	33761 JA65A
1.20 (0.0472)	33761 JA61A	1.60 (0.0630)	33761 JA66A
1.28 (0.0504)	33761 JA62A	1.68 (0.0661)	33761 JA67A
1.36 (0.0535)	33761 JA63A	1.76 (0.0693)	33761 JA68A
1.44 (0.0567)	33761 JA64A	1.84 (0.0724)	33761 JA69A

*: Always check with the Parts Department for the latest parts information.

Available Shims

UCS007AZ

— Differential Side Bearing Preload and Adjusting Shim**BEARING PRELOAD**

Differential side bearing preload: L*	0.15 - 0.21 mm (0.0059 - 0.0083 in)
---------------------------------------	-------------------------------------

*: Install shims which are "deflection of differential case" + "L" in thickness.

DIFFERENTIAL SIDE BEARING ADJUSTING SHIM(S)

Thickness mm (in)	Part number*	Thickness mm (in)	Part number*
0.48 (0.0189)	31438 80X00	0.72 (0.0283)	31438 80X06
0.52 (0.0205)	31438 80X01	0.76 (0.0299)	31438 80X07
0.56 (0.0220)	31438 80X02	0.80 (0.0315)	31438 80X08
0.60 (0.0236)	31438 80X03	0.84 (0.0331)	31438 80X09
0.64 (0.0252)	31438 80X04	0.88 (0.0346)	31438 80X10
0.68 (0.0268)	31438 80X05	0.92 (0.0362)	31438 80X11

*: Always check with the Parts Department for the latest parts information.