VEHICLE RECALL

G-04501-R2
January 2005

SUBJECT: SAFETY RECALL (U.S., EXPORT)
Bosch DiamondLife™ Zero Offset Pin Slide Hydraulic Disc Brakes on Certain Truck Models Built 10/28/1997 through 6/3/2002

REVISION DESCRIPTION

THIS IS AN ISIS ONLY REVISION. THERE WILL BE NO PAPER MAILING FOR THIS REVISION.

SERVICE PROCEDURE

- Added note to step 33.
- REVISED ***NOTE** UNDER FIGURE 32.

DEFECT DESCRIPTION

The brake system may experience calipers sticking in the applied position. When undetected, this condition may result in premature brake component wear, excessive or abnormal heat generation at one or more of the wheel ends, or a wheel end fire, possibly resulting in **property damage, personal injury, or death.**

MODELS INVOLVED

This Safety Recall involves certain truck models built 10/28/1997 through 6/3/2002 with Bosch DiamondLife™ Zero Offset Pin Slide Hydraulic Disc Brakes.

Only the following identified truck vocations (applications) of medium duty trucks are involved in this recall:

- *Fire/Pumper (Emergency)*
- *Aerial Ladder*
- *Fuel Oil (Tank)*
- *Compressed Gas*
- *Ambulance*

- *Tank (Emergency)*
- *Rescue*

OWNER NOTIFICATION

International Truck and Engine Corporation will notify owners of these vehicles about this campaign. A copy of the owner letter is attached. During the recall process, a listing of owner names and addresses will be furnished to the involved dealers to enable dealers to follow up with owners and have the vehicles corrected. You must limit the use of this listing to this campaign because the list may contain information obtained from state motor vehicle registration records and the use of such motor vehicle registration data for purposes other than this campaign is a violation of law in several states.

Many vehicles involved in this recall are also involved in Safety Recall G-04508. The owners of vehicles who are involved in BOTH recalls were sent a special notification letter that informed them of both recalls. The Authorization for Recall Service cards were also printed with both recall numbers on them.

The owners involved in this recall that are NOT part of Safety Recall G-04508, received a standard owner notification. Copies of both owner notifications are attached at the end of this document.

PARTS INFORMATION

All dealers require the following Recall Service Basic Took Kit:

Part Number	Part Description	Quantity
8900133R91	Generic Tool Kit	1 per Service Location

If a Generic Kit was purchased during G-03502, then a new kit is NOT required

Please refer to the **SERVICE PROCEDURE** to determine which of the following Recall Service Part kits may be required:

Part Number	Part Description	Quantity
8900127R91	Caliper Boot Kit – *66mm*	As Req'd
8900128R91	Caliper Replacement Kit – *66mm*	As Req'd
8900129R91	Caliper Boot Kit – *73mm*	As Req'd
8900130R91	Caliper Replacement Kit – *73mm*	As Req'd

8900131R91	Slide Pin *BOOT* Kit	As Req'd
8900132R91	Slide Pin Replacement Kit	As Req'd

Some vehicles may require the anchor plates to be removed or replaced during the SERVICE PROCEDURE. Please use standard service anchor plates and wheel seals as per line-set ticket.

SERVICE PROCEDURE

CAUTION:

TO PREVENT SERIOUS EYE INJURY, ALWAYS WEAR SAFE EYE PROTECTION WHEN YOU PERFORM VEHICLE MAINTENANCE OR SERVICE.

The following page contains a simplified flow-chart that describes how the decision to replace or re-use brake components is to be made. Please use this for general information only, as more detailed instructions are contained in the body of the letter. Perform the following service on ALL vehicle wheel ends.

INSPECTION/DECISION PROCESS FLOW

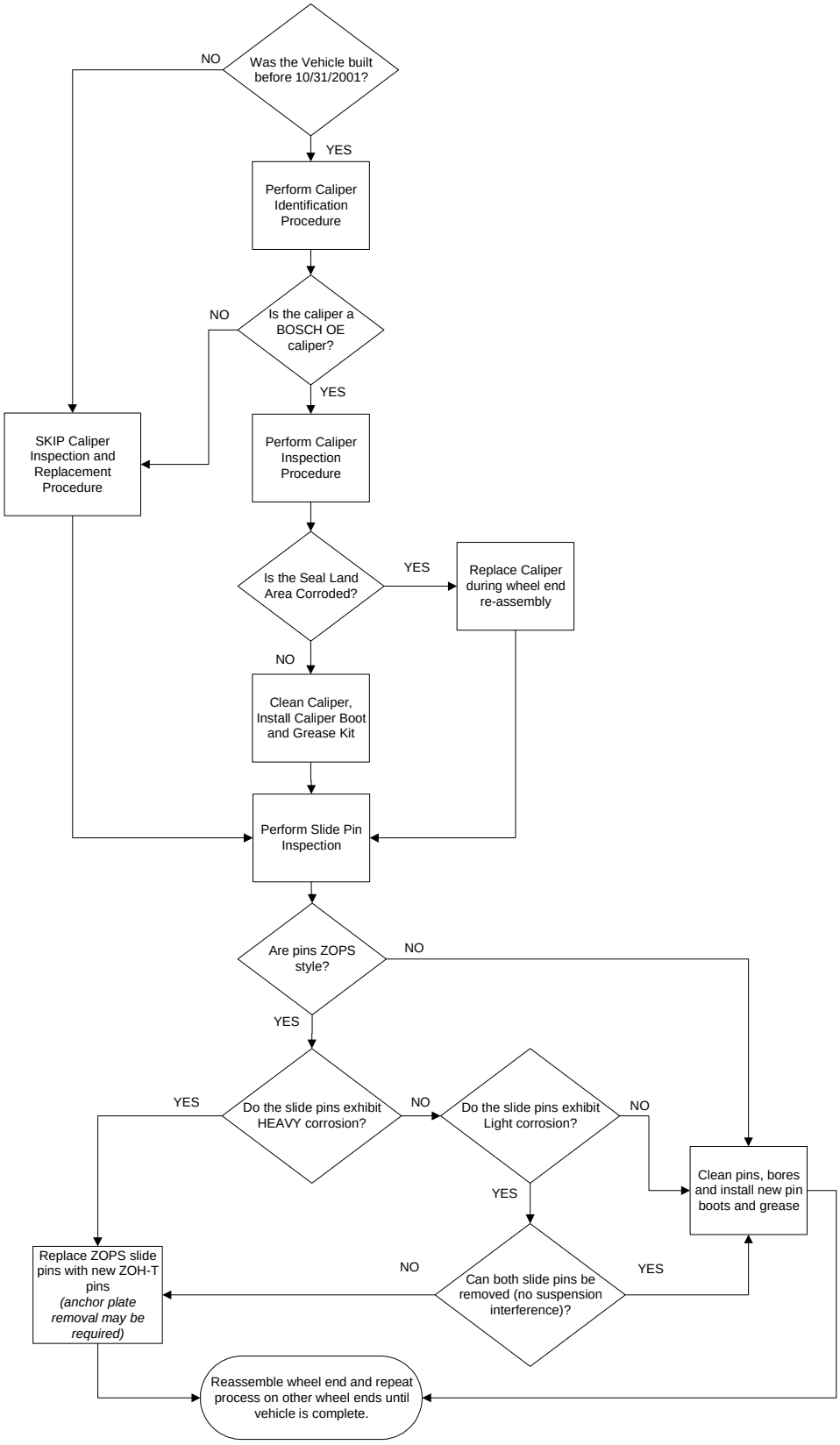


Chart 1 – Inspection/Decision Reference

VEHICLE BUILD DATE INSPECTION

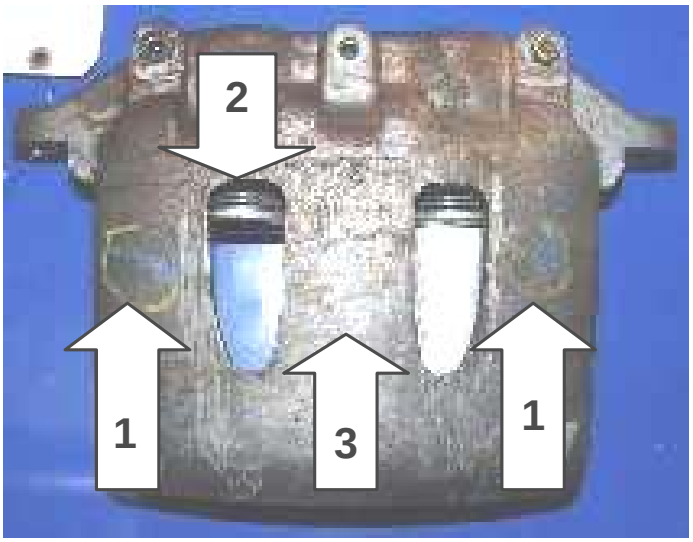
- Verify, via line-set ticket or VIN data plate, the date of manufacture of vehicle.
- If vehicle was manufactured **ON or BEFORE 10/31/2001**, proceed with step 1, *CALIPER IDENTIFICATION PROCEDURE*.
- If vehicle was manufactured **ON or AFTER 11/1/2001**, skip to step 29, *SLIDE PIN INSPECTION/REPLACEMENT PROCEDURE.*
    - Calipers will not be inspected or replaced on vehicles built on or after 11/1/2001.

CALIPER IDENTIFICATION PROCEDURE

1. Position vehicle on suitable floor stands and remove all wheels.

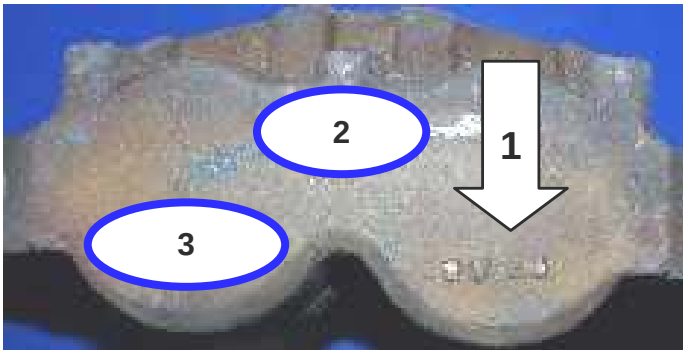
> ***WARNING:***
>
> ***DO NOT WORK UNDER A VEHICLE SUPPORTED ONLY BY JACKS. JACKS CAN SLIP OR FALL OVER, RESULTING IN SERIOUS PERSONAL INJURY OR DEATH.***

2. Inspect and verify that the calipers are Bosch Original Equipment and not a remanufacture or non-Bosch product. **Refer to Figures 1 & 2.**



1. Remanufactured calipers will be identified. Typical locations for the "Reman" stamps are shown in figure 1, area 1.
2. Remanufactured calipers have light gray piston boots (Bosch OE boot is dark gray).
3. Remanufactured calipers typically are not plated (Bosch OE calipers have black plating).

Figure 1 – Remanufactured Caliper Assembly



1. Bosch OE calipers have nothing or only ‘66’ or ‘73’ cast into the housing in area 1.

2. Bosch OE calipers have “4153269” for 2x66mm or “4153222” for 2x73mm sizes) cast into the housing in area 2.

3. Bosch OE calipers have a 4 digit code cast into the housing in area 3. Non-OE calipers DO NOT have this marking.

Figure 2 – Non-Bosch Product (clones or knock-off’s)

3. If the caliper ***IS*** a Bosch OEM caliper, proceed to step 5, ***CALIPER INSPECTION PROCEDURE***.

4. If the caliper ***IS NOT*** a Bosch OEM caliper (if it is remanufactured or a non-Bosch product such as a clone or knock-off), proceed to step 29, ***SLIDE PIN INSPECTION/REPLACEMENT PROCEDURE.***

***NOTE: OE Service parts (such as piston boots, etc) are not interchangeable between the Bosch OE caliper and remanufactured or Non-Bosch calipers*.**

CALIPER INSPECTION PROCEDURE

NOTE: Due to brake fluid reservoir capacity, perform only one (1) caliper inspection at a time.

5. Remove some brake fluid from the master cylinder reservoir with a clean syringe. This is to prevent overflow when caliper pistons are retracted.

6. Remove any brake hose retaining fasteners as applicable. This allows the caliper to be rotated for piston boot inspection.

NOTE: Do not remove brake hose at the caliper inlet.

Figure 3

7. To retract pistons, place a suitable pry bar into one of the ***rotor cooling fins*** and pry caliper housing outboard (see arrow direction) until pistons are pushed back into housing.

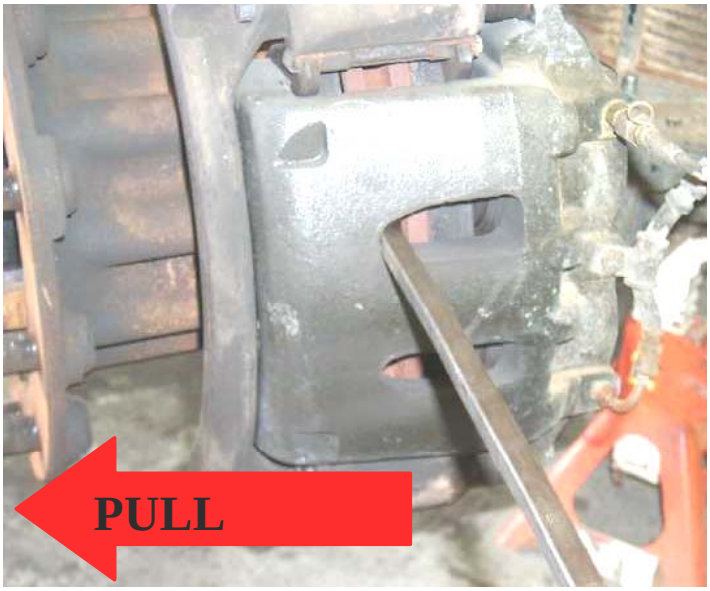


Figure 4

8. Remove upper (top) caliper mounting bolt securing the caliper to the anchor plate.

Figure 5

9. Rotate the caliper assembly away from rotor and support with suitable stand for inspection.

***NOTE: Do Not Allow Caliper To Hang By Hose*.**

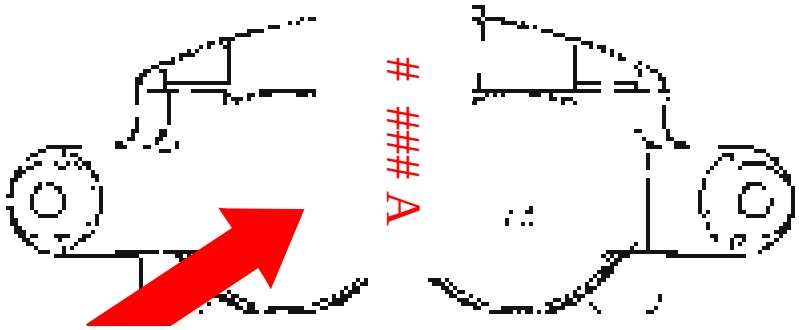
Pad removal is not required, however if they are removed, be sure to mark them in some manner (i.e. left front inner, left front outer, right front inner, etc.) so that later they are reinstalled in the same location.

NOTE: Do not mark on pad face. Keep pad face free of any grease or foreign materials.

Figure 6

10. Inspect the caliper to determine its build date. If the caliper date code is later than indicated in figure 7, then proceed to step 29, ***SLIDE PIN INSPECTION/REPLACEMENT PROCEDURE***. Otherwise, continue to step 11.

NOTE: The caliper housing may need to be brushed with a wire brush from the generic tool kit to expose the date code. If caliper date code is not legible, then proceed to next step. Otherwise, proceed to step 29, SLIDE PIN INSPECTION/REPLACEMENT PROCEDURE.



- Caliper date code is ***stamped*** on the back near the center of the caliper housing and has 4 numbers and a letter.
- The 1st number is the year, the next 3 are the day of the year, and the letter represents the shift of production
- (For Example: 9120A : "9" means year 1999
  - "120" means the 120th day of the year
  - "A" means first shift (The letters "B" or "C" may appear for second or third shifts)

- If caliper date code is *LATER* than ***1274A, 1274B, or 1274C***, then proceed to *SLIDE PIN INSPECTION/REPLACEMENT section*.
  - 1275A is later, 9120A is *NOT*.

Figure 7

11. With the wire brush provided in the generic tool kit, remove loose rust, dirt and road debris from caliper underside near and beneath both pistons, and on caliper housing around the pistons and boots. Carefully blow away any loose debris with low pressure shop air.

Figure 8

12. Place the spacer block provided in the generic tool kit into caliper housing between pistons and caliper legs. Depress brake pedal slowly and just enough to extend pistons to contact spacer.

WARNING:

TO PREVENT SERIOUS INJURY, KEEP HANDS AWAY FROM PISTONS WHEN BRAKE PEDAL IS DEPRESSED.

NOTE: Use only block thickness indicated. Otherwise, pistons will extend too far and a high pressure brake fluid leak could occur resulting in personal injury.

If pistons are extended too far, DO NOT attempt to re-install pistons. Remove brake hose at the caliper, cap brake line and remove caliper assembly. Skip to step 29, SLIDE PIN INSPECTION REPLACEMENT PROCEDURE and in step 47 install a NEW caliper.

Figure 9

13. Remove both piston boots with a flat bladed screwdriver and discard.

14. Using shop light or flashlight, inspect caliper housing bore near piston area for corrosion. Inspect entire circumference around piston. Also inspect piston for any indication of deterioration such as cracks or crumbling.

Figure 10

15. Inspect caliper housing for seal land corrosion.

NOTE: The pistons are made from a phenolic material and are is naturally brown in color. This should not be confused with any corrosion color.

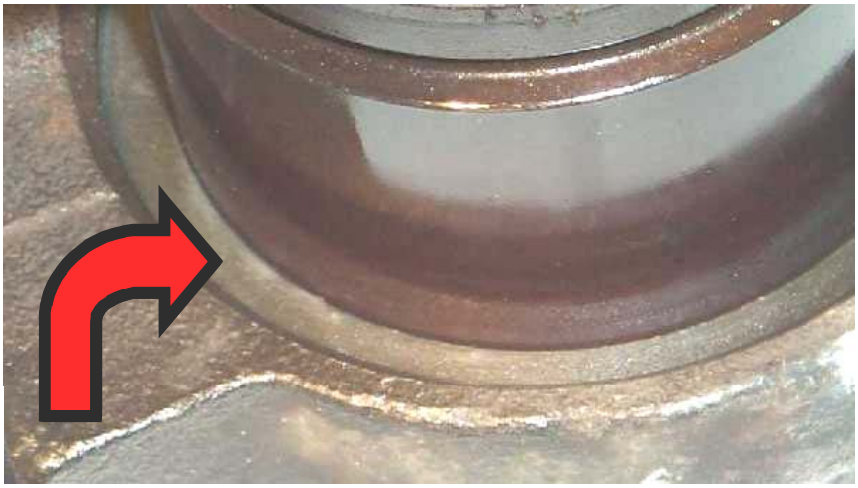


Figure 11 – No Corrosion

- If there is ***NO*** CORROSION PRESENT, please continue on to step 16 – ***PISTON BOOT INSTALLATION PROCEDURE.***

Figure 12 – Corrosion Present

- If there ***is*** CORROSION PRESENT, please skip to step 29, ***SLIDE PIN INSPECTION/REPLACE-MENT PROCEDURE.***
- ***Caliper requires replacement. Install NEW caliper during step 46.***

END OF CALIPER INSPECTION

PISTON BOOT INSTALLATION PROCEDURE

16. Using isopropyl or denatured alcohol, clean exposed pistons and visible caliper housing bore surfaces.

WARNING:

ISOPROPYL AND DENATURED ALCOHOL ARE FLAMMABLE AND CAN IGNITE OR EXPLODE. KEEP LIGHTED TOBACCO, FLAMES, SPARKS OR OTHER IGNITION SOURCES AWAY. FAILURE TO OBSERVE THE WARNING COULD RESULT IN PROPERTY DAMAGE, PERSONAL INJURY, OR DEATH.

WARNING:

NO COMMERCIALLY AVAILABLE BRAKE CLEANERS ARE TO BE USED; OTHERWISE, PART COULD BE DAMAGED AND RESULT IN THE LOSS OF BRAKING.

Figure 13

17. Use a clean, lint free shop cloth and wipe pistons and caliper housing bore area.

Figure 14

18. CAREFULLY air-dry pistons and caliper bore area with low pressure shop air.

Figure 15

19. Using an acid brush from the piston boot replacement kit *(8900127R91 for 66mm or 8900129R91 for 73mm)*, lubricate pistons and caliper housing bore area with Disc Brake Corrosion Control Grease.

Figure 16

20. Place a small amount of Disc Brake Corrosion Control Grease onto the piston.

NOTE: One (1) packet is to be used for BOTH pistons and bores of one caliper.

Figure 17

21. Start at the caliper housing opening as shown and work up the piston stopping at the piston boot groove. Spread grease uniformly. Use of a flashlight and/or dental mirror to ensure uniform distribution on underside (caliper top side) of each piston, may be required.

Figure 18

22. End at the piston boot groove, as shown.

NOTE: Use care while spreading grease to avoid getting any debris on newly greased surfaces.

Figure 19

23. Inspect new piston boots provided in the piston boot replacement kit for cuts, tears or damage. If damaged, discard and use a new Piston Boot Kit. Carefully install new piston boots.

Figure 20

NOTE: While the pistons are still extended, make sure that the boot bead is fully seated into piston boot bead groove.

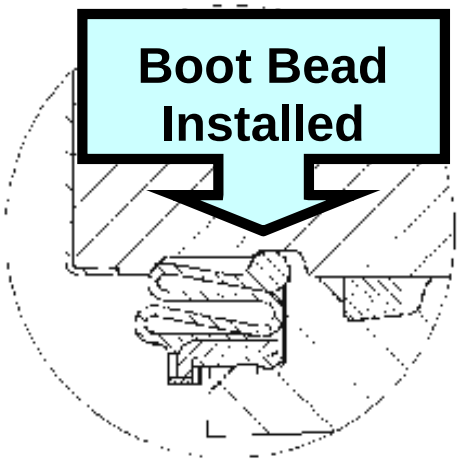


Figure 21

24. Carefully move the free end of the boot back to the bead end of the piston so that the boot folds up correctly. Rotate the piston boot to firmly seat in piston boot bead in groove.

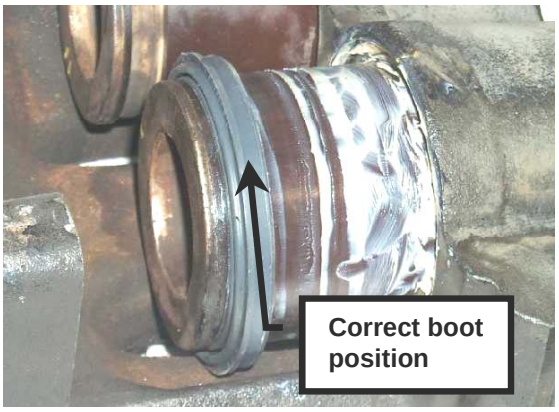


Figure 22

25. To reinstall the piston and seat piston boot into caliper, use the insertion tool from the generic tool kit.

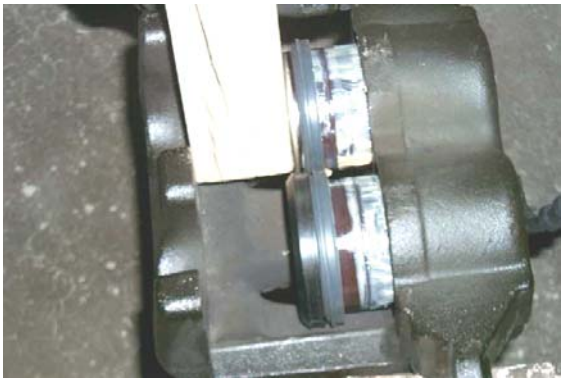
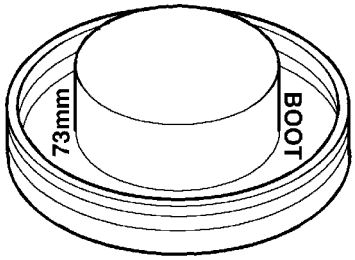
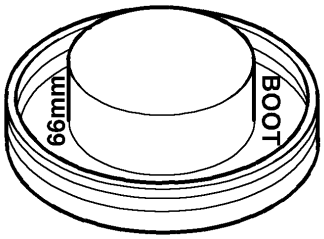


Figure 23

NOTE: Proper piston boot installation tool and tool orientation must be observed.





73mm Piston Boot Insertion Tool. **66mm Piston Boot Insertion Tool**.

Figure 24

26. Insert spacer block in front of one piston to keep it in place. Center piston boot insertion tool onto opposite piston and boot. Slowly tighten C-clamp to insert this piston completely into housing.

Figure 25

27. Move spacer block to the inserted piston position to keep the inserted piston from being pushed out when the second piston is being pushed into the bore.

28. Center piston boot insertion tool onto opposite piston and boot. Slowly tighten C-clamp to insert the 2nd piston completely into housing.

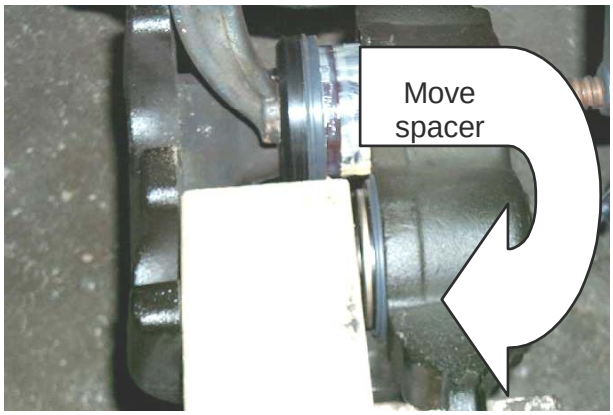


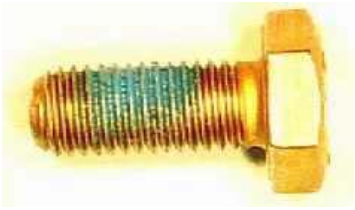
Figure 26

END OF PISTON BOOT INSTALLATION

SLIDE PIN INSPECTION/REPLACEMENT PROCEDURE

29. Inspect the *upper* caliper mounting bolt and slide pin.

30. If the bolt is coarse thread as shown, proceed to step 32.



ZOPS Bolt: heavy hex head, yellow In color, coarse thread, thread patch (M12x1.75x30)

Figure 27

31. If the bolt is fine thread as shown, proceed to step 40.

ZOH-T Bolt: flange head, dark in color, fine thread, may have thread patch as shown (M12x1.25x40).

Figure 28

32. Remove lower caliper mounting bolt and secure caliper.

    a. If, by following the ***CALIPER INSPECTION PROCEDURE***, it was determined a new caliper is required, disconnect hydraulic brake line, remove and discard caliper.

33. Remove upper and lower caliper slide pins and pin boots from anchor plate.

NOTE: ***If pins are frozen in the anchor plate bore, REPLACE ANCHOR PLATE and SLIDE PINS. See *NOTE under Figure 32.***

If pins are frozen on a wheel end, skip to step 42 and continue service procedure using new slide pins and new anchor plate.

34. On some rear axle applications, one of the caliper slide pins cannot be removed without removal of the anchor plate. ***DO NOT REMOVE ANCHOR PLATE AT THIS TIME.***

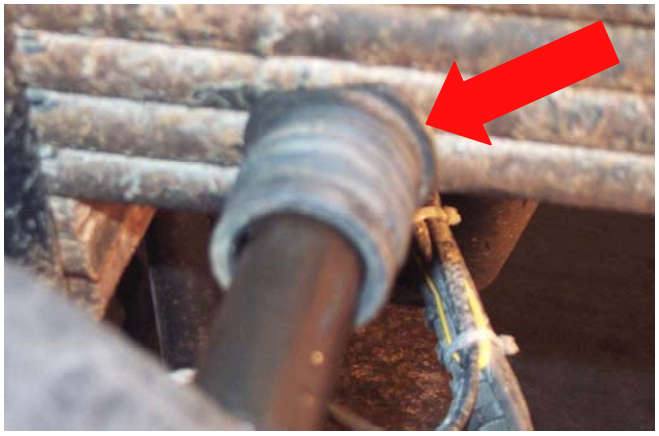


Figure 29

35. Inspection of REAR axle guide pin which ***cannot*** be readily removed from the anchor plate (NOTE: For REAR axle guide pins which can be removed, continue to step 46).

    a. Pull the caliper guide pin out as far as possible and cut off boot.

    b. Use clean cloth dampened with isopropyl or denatured alcohol to clean pin and air dry with low pressure shop air.

CAUTION: ***DO NOT use liquid alcohol directly on guide pin - it may collect in anchor plate bore and degrade guide pin lubricating grease.***

    c. Inspect caliper guide pin for corrosion using Figure 32.

36. For all caliper guide pins that can be removed, remove and discard guide pin boots.

Figure 30

37. Using isopropyl or denatured alcohol, clean and wipe pins dry with clean shop cloth. See warning in step 16.

Figure 31

38. Inspect for caliper guide pin corrosion.

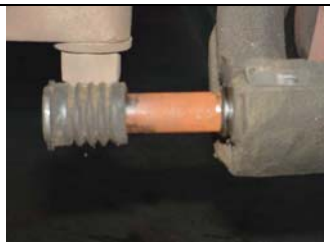
 **NO Corrosion**	 **LIGHT Corrosion**	 **HEAVY Corrosion**
If visual inspection reveals NO corrosion: Continue to next step. *Some pin polishing is expected during normal use and will appear as shiny areas as shown above. Pins with polishing may be reused.*	*IF visual inspection reveals light corrosion:* Use 220 grit sandpaper to clean pin surface for light to moderate corrosion and re-clean pin with isopropyl or denatured alcohol and air dry. *If pin cannot be removed due to suspension interference, and exhibits light corrosion, install new pins from guide pin replacement kit. See note below*.*	*IF visual inspection reveals heavy corrosion:* For all pins that can be removed, install new pins from guide pin replacement kit and continue to next step. For pins that can NOT be removed, refer to the note below*.

Figure 32

***NOTE: If pins are frozen in the anchor plate bore, REPLACE ANCHOR PLATE and SLIDE PINS.**

If slide pins cannot be fully removed for inspection due to suspension interference AND exhibit heavy corrosion on visible portion, REPLACE ANCHOR PLATE AND SLIDE PINS.

Refer to the Master Service Manual for anchor plate, and hub removal. Replace wheel seals as necessary.

39. Disc Brake Guide Pin/Boot Grease for the anchor plate pin bore, caliper slide pin and pin boot, is contained in a two chamber packet. One chamber of the grease packet is used for each anchor plate bore/guide pin/pin boot combination.

Figure 33

40. For ***REAR AXLE*** guide pins which ***cannot*** be removed due to suspension interference AND ***do not*** exhibit corrosion:

    a. Lubricate guide pin in anchor plate bore.
    b. Carefully install new boot over pin flange and seat boot into groove.
    c. Push guide pin into anchor plate bore and seat boot onto anchor plate boot groove.

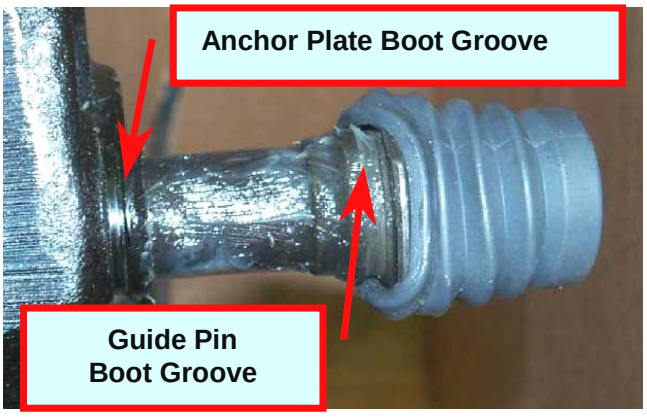


Figure 34

NOTE: Verify that boot was NOT torn during installation.

41. Cleaning and lubrication of anchor plate bores. Using round wire brush found in generic tool kit and isopropyl or denatured alcohol, wire brush both upper and lower anchor plate pin bores. Clean out any remaining loose residue with a clean shop cloth or swab. Carefully, air dry pin bores.

Figure 35

42. Only for pins removed from anchor plate bores, use the acid brush from the guide pin boot replacement kit, carefully grease anchor plate bore, caliper mounting pins, and pin boot beads with Disc Brake Guide Pin / Boot grease.

Figure 36a – Anchor Plate Bore

Figure 36b -- Pins

Figure 36c – Pin Boots

43. Assemble pin boots onto pins and re-install into anchor plate.

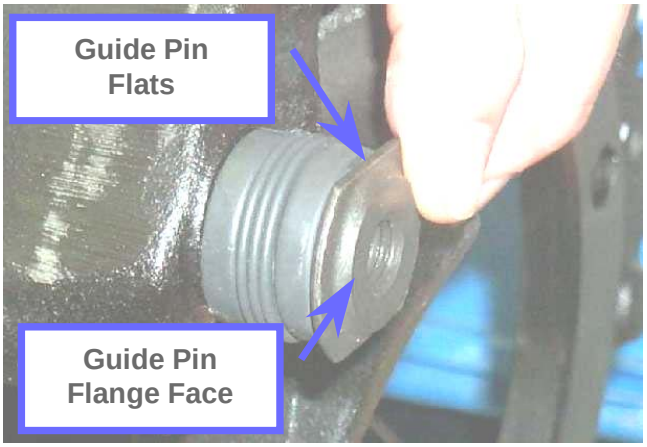


Figure 37

NOTE: ***It's very important that the pins are installed in the correct location and the proper bolt torque is used. See Figure 38 that follows.***

Align the leading and trailing pin flange flats so that they are parallel to facilitate caliper installation.

After re-inserting guide pins and boots, clean pin flange face and internal threads with clean cloth and denatured or isopropyl alcohol. Air dry.

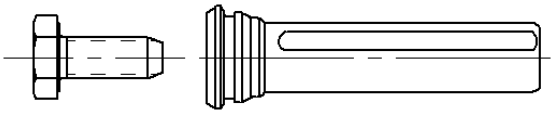
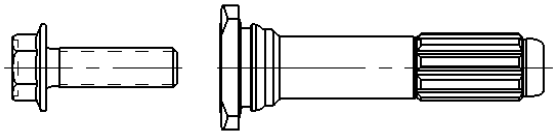
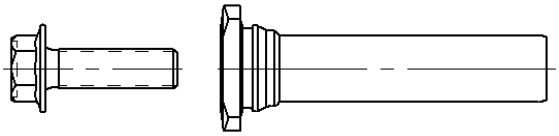
<table>
<tr>
<td><u>ZOPS</u> Caliper guide pin and mounting bolt used before June 3, 2002
 
<u>ZOPS Leading AND Trailing Guide Pin</u>
• The same guide pin is used for both leading and trailing anchor plate positions.</td>
<td><u>ZOH-T</u> Caliper guide pins and mounting bolt used after June 3, 2003
 
<u>ZOH-T Trailing Guide Pin</u>
 
<u>ZOH-T Leading Guide Pin</u>
• Unique guide pins for leading and trailing anchor plate positions.</td>
</tr>
<tr>
<td><u>Bolt: M12x1.75x30</u> – Heavy hex head, course thread, yellow in color (see below).
 
Bolt torque: 70-80 LbF-Ft (95–108 Nm)</td>
<td><u>Bolt: M12x1.25x40</u> – Flange head, fine thread, dark in color (see below).
 
Bolt torque: 93-107 LbF-Ft (126–145 Nm)</td>
</tr>
<tr>
<td colspan="2">NOTE: BOLT TORQUE IS DIFFERENT BETWEEN ZOPS AND ZOH-T</td>
</tr>
</table>

Figure 38 -- ZOPS and ZOH-T Caliper Guide Pins & Mounting Bolts

NOTE: It's important to know the anchor plate leading & trailing position because:

a. For both ZOPS and ZOH-T, the <u>leading bolt</u> is always tightened <u>first</u>.

b. For ZOH-T, the guide pins must be in the proper position. The rubber bushed guide pin is always installed in the trailing position.

c. ZOPS or ZOH-T pins will fit in any anchor-plate, and can be used as long as BOTH pins are of the same type

d. The 2 pins per anchor plate must both be ZOPS or both be ZOH-T. They must not be intermixed.

44. Definition of leading and trailing positions:

a. Rotor rotation is for a vehicle moving forward.
b. View rotor from outside of vehicle.

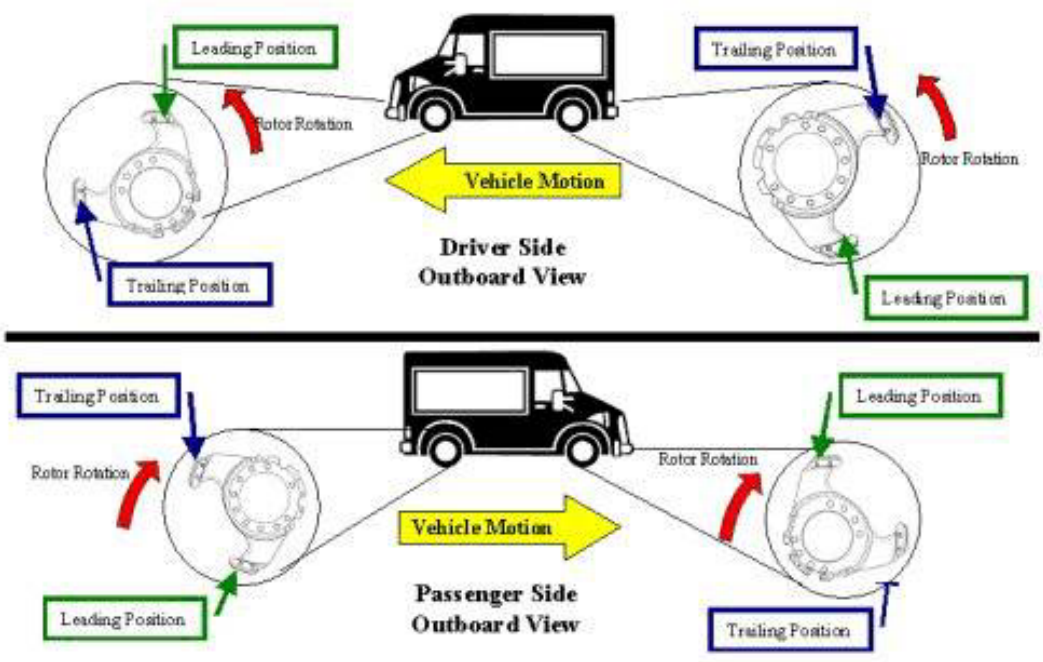


Figure 39

45. **<u>Re-using caliper mounting bolts</u>**. When re-using the caliper mounting bolts, wire brush the lower half of both caliper mounting bolts and clean with isopropoyl or denatured alcohol and air dry.

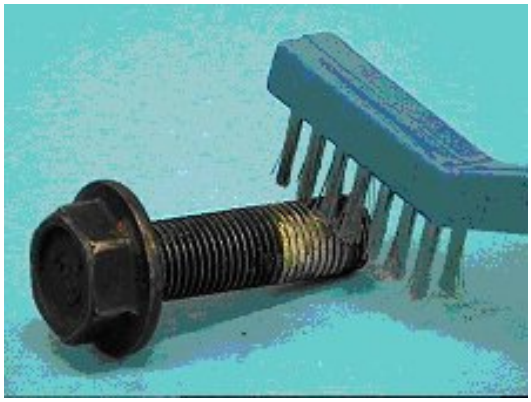


Figure 40

46. On the lower half of each bolt, apply liquid Loctite® 2440 around the circumference of the bolt.

NOTE: This procedure does not apply when using new bolts in guide pin replacement kit because a Loctite® thread patch is already applied.

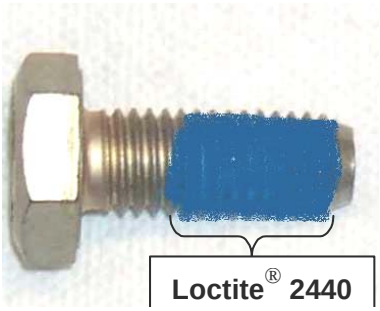


Figure 41

47. Position caliper assembly over leading and trailing pins.

    a. ***If in step 12 or 15 it was determined that a NEW caliper is to be installed, install NEW caliper and connect brake hose at this time.***

48. Install both LEADING and TRAILING caliper mounting bolts **FINGER TIGHT**.

49. Torque the LEADING bolt completely to torque value indicated in Figure 38.
    a. For ZOPS (early design) bolt & pin, use a medium to large flat blade screwdriver under the pin flange to keep it parallel to the caliper abutment during bolt tightening.

    b. For ZOH-T (later design) bolt & pin, screwdriver is not required.

Figure 42

CAUTION: Do Not Allow Screwdriver To Puncture Boot.

50. Torque TRAILING bolt completely using same procedure as above.

51. Re-assemble brake hose retaining P-Clip.

    a. If installing new caliper, install brake line to caliper inlet.

52. **For ZOH-T Style Pins:** Because the ZOH-T caliper suspension has a rubber bushed trailing pin, the following step is not necessary and the inspection and repair procedure for this wheel-end is complete.

53. **For ZOPS Style Pins:** Check that the caliper slides on guide pins. Place hands on the caliper as shown, push / pull caliper and check that the caliper assembly slides on the guide pins.

    a. If the ZOPS caliper assembly **slides** on guide pins – **STOP**. **Inspection and repair procedure for this wheel end is complete.**

Figure 43

54. If the ZOPS caliper assembly **DOES NOT slide** on guide pins:

    a. Remove upper caliper mounting bolt.

    NOTE: This may be leading or trailing bolt depending on caliper mounting orientation on vehicle.

    b. Rotate caliper assembly out slightly.

    c. Rotate upper caliper guide pin 180 degrees (½ turn).

    d. Clean bolt and re-apply Loctite® 2440 to bolt. See steps 45 and 46.

    e. Reinstall upper caliper mounting pin bolt using the flat bladed screwdriver (same as step 49) and torque to the correct torque.

    f. Repeat check that the caliper assembly slides on guide pins.

    g. If caliper still does not slide, install new caliper guide pins.

55. If it was necessary to replace any caliper, the hydraulic system requires bled. Please refer to the Master Service Manual for proper brake bleed procedures.

a. If no calipers were replaced, the brake pedal must be depressed several times, and master cylinder fluid level replenished before the pistons can properly engage the brake pads.

56. This recall involves only the brake calipers, slide pins, and components related to their removal.

a. Brake pads and rotors are maintenance items and are NOT to be included in this recall.

END OF SERVICE PROCEDURE

LABOR INFORMATION

Operation No.	Description	Time
A40-04501-1	***Base Time –Trucks built BEFORE 10/31/2001 require this labor operation – 1 per VEHICLE Only***	1.8 hr
A40-04501-2	***Base Time – Trucks built AFTER 10/31/2001 require this labor operation – 1 per VEHICLE Only***	1.1 hr

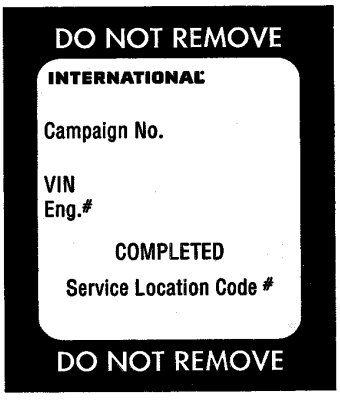
Please add the following labor operations to the warranty claim as per individual vehicle and wheel-end requirements:

Operation No.	Description	Time
A40-04501-3	***Add On for Pin Inspection AND Replacement NO Anchor Plate Removal – 1 Wheel End Only***	0.3 hr
A40-04501-4	***Add On for Pin Inspection AND Replacement WITH Anchor Plate Removal – 1 Wheel End Only***	1.0 hr
A40-04501-5	***Add On for Pin Inspection ONLY – 1 Wheel End Only***	0.3 hr
A40-04501-6	***Add On for Caliper Inspection AND Replacement – 1 Wheel End Only***	0.2 hr
A40-04501-7	***Add On for Piston Boot Installation – 1 Wheel End Only***	0.3 hr

Example: If you replaced 3 calipers, you would apply A40-04501-6 three (3) times and A40-04501-7 one (1) time to the vehicle's warranty claim.

CAMPAIGN IDENTIFICATION LABEL

*Each vehicle corrected in accordance with this campaign **must be** marked with a CTS-1075 Campaign Identification Label.*



Complete the label and attach on a clean surface next to the vehicle identification number (VIN) plate.

ADMINISTRATIVE/DEALER RESPONSIBILITIES (U.S. & POSSESSIONS)

Proceed immediately to make necessary correction to units in inventory. **All inventory vehicles subject to this recall campaign must be corrected prior to sale, transfer or delivery.** If vehicles have been sold or transferred and you are in receipt of Customer Notification Letters and Authorization for Recall Service cards for those vehicles, the transfer location or customer must be notified **IMMEDIATELY** from your dealer location.

Dealers must correct all vehicles subject to this campaign at no charge to the owner, regardless of mileage, age of vehicle, or ownership, from this time forward.

The National Traffic and Motor Vehicle Safety Act, as amended, provides that each vehicle that is subject to a vehicle recall campaign must be adequately **repaired** within a reasonable time after the owner has tendered it for repair. A failure to adequately repair within **60 days** after a tender of a vehicle is prima facie evidence of failure to repair within a reasonable time. If the condition is not adequately repaired within 60 days, the owner may be entitled to **replacement** with an identical or reasonable equivalent vehicle at no charge, or to a **refund** of the purchase price less a reasonable allowance for depreciation.

However, consistent with the customer notification, dealers are expected to complete the repairs on the mutually agreed upon service date.

To avoid having to replace an owner vehicle or refund the purchase price, every effort must be made to promptly schedule an appointment with each owner to repair his or her vehicle as soon as possible.

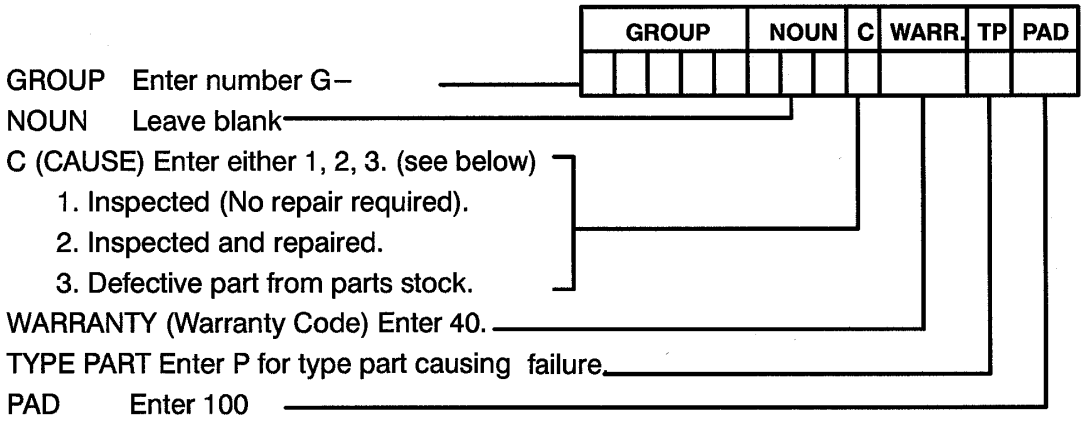
POSSIBLE CUSTOMER REIMBURSEMENT

There may be an occasion when a customer was charged for repairs related to this recall prior to the recall being released. The customer letter contains a statement for the customer to contact the Dealer if they believe they are entitled to reimbursement costs. The Dealer should follow the Customer Reimbursement guidelines in Warranty Policy Letter 03-001G. The Warranty Procedures and Administrative Policies manual (CTS1100) is in the process of being updated to include the information in Policy Letter 03-001G.

WARRANTY CLAIMS

Refer to Dealer Warranty Manual for procedures to conduct Recall Campaigns.

It is important that the Recall Coding be completed properly to assist in processing the warranty claim. Complete instructions will be found in the Warranty Manual, Section 7-1. Special attention should be given to Items 39 through 44:



ADMINISTRATIVE/DISTRIBUTOR RESPONSIBILITY (EXPORT)

Proceed immediately to make necessary correction to units in inventory. All inventory vehicles subject to this recall campaign must be corrected prior to sale, transfer or delivery. If vehicles have been sold or transferred and you are in receipt of Customer Notification Letters and Authorization for Recall Service cards for those vehicles, the transfer location or customer must be notified from your distributor location.

Export locations are to submit warranty claims in the usual manner making reference to this recall number.

We ask for your full cooperation and follow-up to this important subject matter. If you have any questions or need further assistance, please contact the Regional Service Manager at your regional office.

INTERNATIONAL TRUCK AND ENGINE CORPORATION