# Service Action Code: 97DZ



Subject	Transmission Wiring Harness				
Release Date	June 12, 2020				
REVISION SUMMARY	Updated cla	iming quanti	ty for tape p	art number N 10592002.	
Affected Vehicles	Country	Beginning Model Year	Ending Model Year	Vehicle	Vehicle Count
	USA	2019	2019	A6	15,208
	USA	2019	2019	Α7	5,474
	CAN	2019	2019	A6	850
	CAN	2019	2019	A7	819
Corrective Action Code Visibility	become damaged. Inspect and modify transmission wiring harness and repair wiring if necessary. On or about June 09, 2020, the campaign code was applied to affected vehicles.				
Owner Notification	Owner notification will take place in June 2020. Owner letter examples are included in this bulletin for your reference.				
Campaign Expiration Date	This campaign expires on <b>December 31, 2022</b> . Repairs must be performed on or before this date to be eligible for payment. Keep this expiration date in mind when scheduling customers for this action. If a customer wishes to have this service performed after the expiration date, your dealerships normal parts and labor cost associated with this repair will apply.				
Additional Information	Please alert everyone in your dealership about this action, including Sales, Service, Parts and Accounting personnel. Contact Warranty if you have any questions.				
	Dealers must ensure that every affected inventory vehicle has this campaign completed <u>before</u> <u>delivery to consumers</u> .				

# **Parts Information**

Parts Control Type: Upper Order Limit	Parts will be managed with a weekly Upper Order Limit. Please see Parts On Command (POC) for your Upper Order Limit quantity.
Initial Allocation: YES	Dealers will be sent an initial allocation prior to customer notification. If no initial allocation was received, please reference the Repair Projection Tool (below) to view your potential VIN population.

Repair Projection Tool:
(right click to open)

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Criteria	Quantity	Part Number	P.O.C. Part Description	Ordering Method
	1	N -108-705-01	Protection (Protective Sleeve)	UOL
	1	3D0-971-838-L	Tie wrap	UOL
	2000 mm*	N -105-920-02	Таре	UOL
G1	2	N -106-598-01	Tie wrap	UOL
GI	260 mm**	N -107-327-01	Pipe (Corrugated hose)	UOL
	1	N -907-988-09	Nut	UOL
	2	N -910-661-01	Bolt	UOL
	2	N -912-651-01	Screw	UOL

#### **O** IMPORTANT PARTS INFORMATION

\*Tape part number N -105-920-02 is a 25,000 mm roll of tape. One roll will repair approximately 12 cars. \*\*Pipe part number N -107-327-01 is a 1000 mm section of pipe. One section will repair approximately 3 cars.

# **I**NOTE

The specified part numbers reflect the status at the start of this service action. Interim updates made in ETKA can cause a listed part number to become unavailable. In this case, the new part number specified in ETKA should be used.

# **Claim Entry Instructions**

The labor times listed here may differ from the labor operations and labor times listed in ELSA.

After campaign has been completed, enter claim as soon as possible to help prevent work from being duplicated elsewhere. Attach the Elsa screen print showing action <u>open on the day of repair</u> to the repair order. If customer refused campaign work:

- ✓ <u>U.S. dealers:</u> Submit the request through Audi Warranty Online under the <u>Campaigns/Update</u> option.
- ✓ <u>Canada dealers:</u> Upload the repair order [signed by customer] to Audi WIN/Operations/Campaign Closure.

Service Number	97DZ		
Damage Code	0099		
Parts Vendor Code	002		
Claim Type	Sold vehicle: 7	10	
	Unsold vehicle:	7 90	
Causal Indicator	Mark Protection	* as causal part	
Vehicle Wash/Loaner	Do not claim wash/loaner under this action		
Criteria I.D.	G1		
	LABOR		
	Labor Op	Time Units	Description
	9781 41 99	120	Rework transmission wiring harness
			PARTS
	Quantity	Part Number	Description
	1.00	N 10870501	Protection* (Protective Sleeve)
	1.00	3D0971838L	Tie wrap
	0.10	N 10592002	Таре
	2.00	N 10659801	Tie wrap
	0.30	N 10732701	Pipe (Corrugated hose)
	1.00	N 90798809	Nut
	2.00	N 91066101	Bolt
	2.00	N 91265101	Screw

#### Continued on next page

ADD <u>ONLY</u> if wiring damage was found			
LABOR			
Labor Op	Time Units	Description	
9709 41 99	Up to 190 TU**	Wiring harness repair (see below for amount to claim)	
3730 25 99	Time stated on diagnostic protocol (up to 20 TU)	Clear faults related to damaged wiring	
		PARTS	
Quantity	Part Number	Description	
As required	See ETKA	Butt connector	
As required	See ETKA	Repair wire	
# of pins (wires) replaced	T.U. to claim**		
1	30		
2	40	Every claim that includes wiring will be reviewed	
3	50	for claim accuracy to ensure the number of pins	
4-6	70	(wires) replaced equals the T.U. listed in this	
7-8	90	chart.	
9-11	110	4	
12-15	130	4	
16-18 19-20	160 190	4	

# **Customer Letter Example (USA)**

<MONTH YEAR>

<CUSTOMER NAME> <CUSTOMER ADDRESS> <CUSTOMER CITY STATE ZIPCODE>

This notice applies to your vehicle: <MODEL YEAR> <BRAND> <CARLINE>, <VIN>

#### Subject: Service Action 97DZ – Transmission Wiring Harness

Dear Audi Owner,

As part of Audi's ongoing commitment to customer satisfaction, we are informing you of our decision to conduct a service action on certain 2019 model year Audi vehicles. Our records show that you are the owner of a vehicle affected by this action.

What is the issue?	The transmission wiring harness may not be properly secured, causing it to rub and possibly become damaged.		
What will we do?	Your authorized Audi dealer will inspect and modify transmission wiring harness, repairing wiring if necessary. This work will take about two hours to complete and will be performed for you free of charge.		
What should you do?	In order to limit any possible inconvenience, please contact your authorized Audi dealer as soon as possible to schedule this service. Please keep in mind that your dealer may need additional time for the preparation of the repair, as well as to accommodate their daily workshop schedule. For your convenience, you can also visit <u>www.audiusa.com</u> and click on the "Find a Dealer" link to locate a dealer near you and schedule this service.		
	This service action will be available for you <u>free of charge <b>only until December 31</b>, <b>2022.</b> If you wish to have this service performed after that date, your dealer's normal parts and labor cost associated with this repair will apply.</u>		
Lease vehicles and address changes	If you are the lessor and registered owner of the vehicle identified in this action, please forward this letter immediately via first-class mail to the lessee within ten (10) days of receipt. If you have changed your address or sold the vehicle, please fill out the enclosed prepaid Owner Reply card and mail it to us so we can update our records.		
Can we assist you further?	If your authorized Audi dealer fails or is unable to complete this work free of charge within a reasonable time, please contact Audi Customer Experience at 1-800-253-2834 or via our "Contact Us" page at <u>www.audiusa.com</u> .		
Checking your vehicle for open Recalls and Service Campaigns	To check your vehicle's eligibility for repair under this or any other recall/service campaign, please visit the <b>Recall/Service Campaign Lookup</b> tool at <u>www.audiusa.com</u> and enter your Vehicle Identification Number (VIN).		

We apologize for any inconvenience this matter may cause; however we are taking this action to help ensure your vehicle continues to meet and exceed your expectations.

Sincerely,

Audi Customer Protection

# **Customer Letter Example (Canada)**

<MONTH YEAR>

#### <CUSTOMER NAME> <CUSTOMER ADDRESS> <CUSTOMER CITY STATE ZIPCODE>

This notice applies to your vehicle: <MODEL YEAR> <BRAND> <CARLINE>, <VIN>

#### Subject: Service Action 97DZ – Transmission Wiring Harness

Dear Audi Owner,

As part of Audi's ongoing commitment to customer satisfaction, we are informing you of our decision to conduct a service action on certain 2019 model year Audi vehicles. Our records show that you are the owner of a vehicle affected by this action.

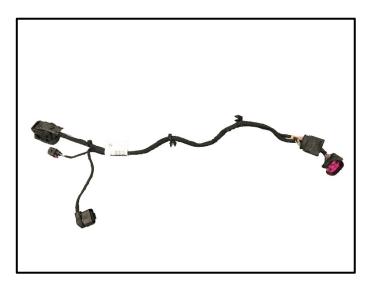
What is the issue?	The transmission wiring harness may not be properly secured, causing it to rub and possibly become damaged.	
What will we do?	Your authorized Audi dealer will inspect and modify transmission wiring harness, repairing wiring if necessary. This work will take about two hours to complete and will be performed for you free of charge.	
What should you do?	In order to limit any possible inconvenience, please contact your authorized Audi dealer as soon as possible to schedule this service. Please keep in mind that your dealer may need additional time for the preparation of the repair, as well as to accommodate their daily workshop schedule.	
	This service action will be available for you <u>free of charge <b>only until December 31</b></u> . <u><b>2022</b></u> . If you wish to have this service performed after that date, your dealer's normal parts and labor cost associated with this repair will apply.	
Lease vehicles and address changes	If you are the lessor and registered owner of the vehicle identified in this action, please forward this letter immediately via first-class mail to the lessee within ten (10) days of receipt. If you have changed your address or sold the vehicle, please fill out the enclosed prepaid Owner Reply card and mail it to us so we can update our records.	
Can we assist you further?	If your authorized Audi dealer fails or is unable to complete this work free of charge within a reasonable time, please contact Audi Customer Relations Monday through Friday from 8AM to 8PM EST at 1-800-822-2834 or via our "Contact Audi Canada" page at <u>www.audi.ca.</u>	

We apologize for any inconvenience this matter may cause; however we are taking this action to help ensure your vehicle continues to meet and exceed your expectations.

Sincerely,

Audi Customer Protection

### **Repair Overview**



- Modify transmission wiring harness.
- Repair wiring if necessary.

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- These repair instructions may differ from the labor operations and labor times listed in ELSA.
- Damages resulting from improper repair or failure to follow these work instructions are the dealer's
  responsibility and are not eligible for reimbursement under this action.
- This procedure must be read in its entirety prior to performing the repair.
- Due to variations in vehicle equipment and options, the steps/illustrations in this work procedure may not
  identically match all affected vehicles.
- Diagnosis and repair of pre-existing conditions in the vehicle are not covered under this action.
- When working during extreme temperatures, it is recommended that the vehicle be allowed to acclimate inside the shop to avoid temperature-related component damage/breakage.

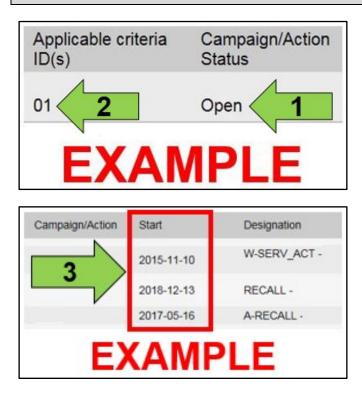
# **I**NOTE

If a vehicles arrives with one or more of the following faults, this repair should be performed prior to performing additional diagnosis. Please note that these faults can be caused by failures outside of the condition outlined in this repair. Diagnosis and repair of such failures will not be covered under this action.

Address Word/Control Module	DTC	
	P17F600 (Parking lock solenoid Electrical error)	
	P17F500 (Parking lock solenoid Open circuit)	
0002/Transmission Control Module – J217	P17F400 (Parking lock solenoid Short circuit to ground)	
	P18C400: parking lock solenoid, implausible signal	
	U008000 (Vehicle Communication Bus F)	
0001/Engine Control Module – J623	U010100 (Lost Communication with TCM)	
0010/Databus Disgnastic Interface 1522	U11B000 (FlexRay data bus branch 2 faulty) as sporadic or static.	
0019/Databus Diagnostic Interface – J533	U112100: Data bus missing message	

# **Repair Instruction**

# **Section A - Check for Previous Repair**



• Enter the VIN in Elsa and proceed to the "Campaign/Action" screen.

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first.

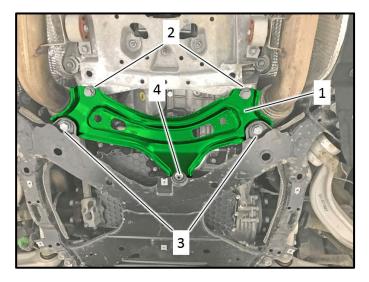
On the date of repair, print this screen and keep a copy with the repair order.

- Confirm the Campaign/Action is open <arrow 1>. If the status is closed, no further work is required.
- Note the Applicable Criteria ID <arrow 2> for use in determining the correct work to be done and corresponding parts associated.

CRITICAL REPAIR STEP STOP! ST

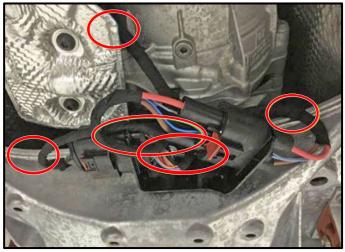
- All Safety Recalls must be completed prior to completing this campaign.
- Proceed to Section B.

# Section B – Transmission Wiring Harness Repair



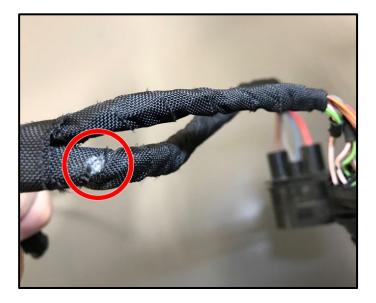
# Remove subframe end panel (if equipped):

- Remove noise insulation.
- Remove fasteners <2, 3 and 4> and remove end panel <1>.



#### Inspect transmission wiring harness for damage:

• Thoroughly inspect the transmission and body side wiring harness and routing near the areas shown.

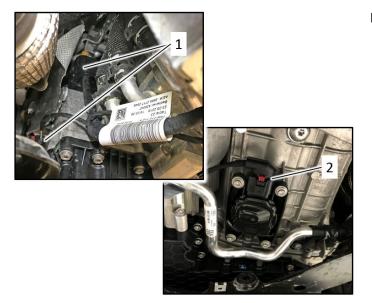


- Pay very close attention to all areas making • contact with any bracket or mount. Harness damage may be very subtle and even a light chaffing could lead to faults.
- Repair wiring as needed per the repair manual.
  - See ELSA Repair Manual: Repair manual > Electrical System > Electrical Equipment General Information > 97 Wiring > Wiring Harness and Connector Repairs
- Ensure the repairs are staggered as needed • to:
  - 1. Avoid large bunches of repairs in the harness.
  - 2. Avoid a repair at a critical flex point, e.g. over the transmission cross brace.

#### Remove transmission wiring harness:

- Disconnect transmission wiring harness • connectors <1> and <2>.
- Remove transmission side wiring from the bracket.





# TCM Connector Forward Branch **Original Clips Rearward Branch**

#### **Disconnect connectors:**

- Unlock and disconnect connectors <1> and • <2> from transmission.
- Remove transmission wiring harness from . vehicle.

#### **Rework transmission wiring harness:**

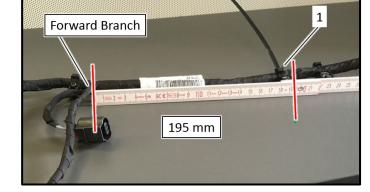
# **i** TIP

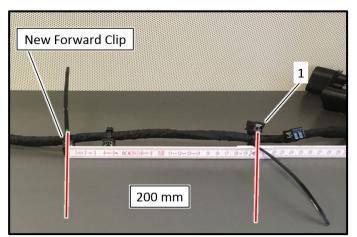
It is helpful to mark the harness with a yellow tire crayon at the locations for the new tie wrap clips. This way, the tie wrap clip can be left slightly loose and then tightened at the end of the procedure. This will aid in orientation of the harness.

- Measure 195 mm from the forward branch on • the wiring harness.
- Install new tie wrap clip <1>.

Part Number	Part Description
N -106-598-01	Tie wrap clip

The opening of the new clip should face the • same direction as the original clip.

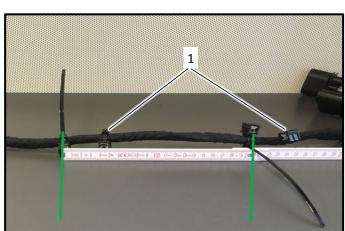


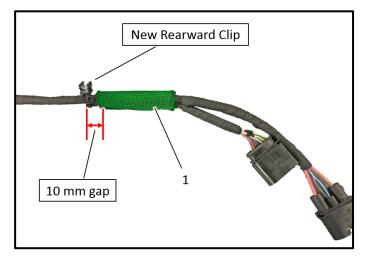


- Measure 200 mm from the new forward clip on • the wiring harness.
- Install new tie wrap clip <1>. •

Part Number	Part Description
N -106-598-01	Tie wrap clip

- The opening on the new clip should face the • same direction as the original clip.
- Remove the old clips <1>.

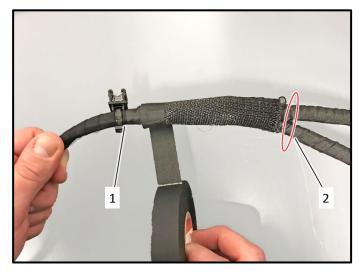




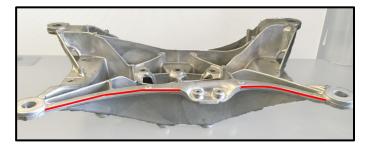
Install the new protective sleeve <1> around • the wiring harness.

Part Number	Part Description
N -108-705-01	Protective sleeve

Place the new protective sleeve <1> 10 mm • from the new rearward clip.







• Wrap the protective sleeve with fabric tape.

Part Number	Part Description
N -105-920-02	Fabric tape

• Wrap the tape from the new rear clip <1> up to the rear branch of the wiring harness <2>.

• The taped sleeve should appear as shown.

#### Deburr transmission cross brace:

• Using a half-round file, lightly chamfer and smooth the rear edge of the transmission cross brace.

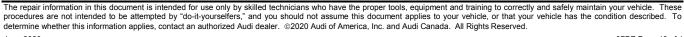
# 

Transmission cross brace shown removed for clarity. It is not necessary to remove the cross brace.

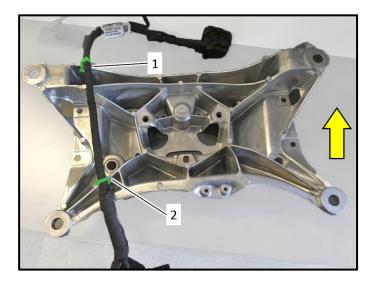
- Avoid removing excessive amounts of material or deforming the cross brace.
- Ensure edges that will make contact with the transmission wiring harness are free of any burrs before proceeding.

# **I**NOTE

Connector housing bracket shown removed for clarity. The connector housing bracket does not require removal from the transmission cross brace.









#### **Reinstall transmission wiring harness:**

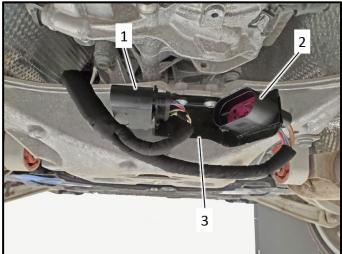
- Arrow denotes direction of vehicle travel.
- Route the transmission harness over the cross brace.
- Secure forward clip <1> and rearward clip <2> to the transmission cross brace.

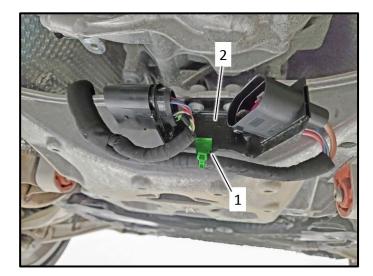
# **I**NOTE

Transmission cross brace shown removed for clarity. It is not necessary to remove the cross brace.

• Forward clip attachment point shown.







Rearward clip attachment point shown.

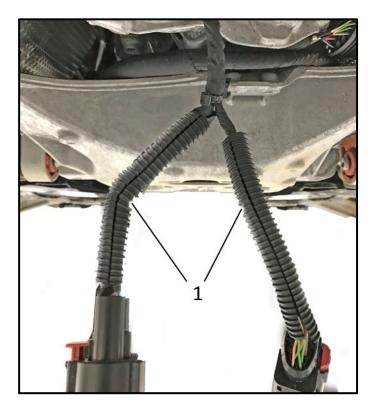
- Reinstall transmission harness connectors <1> and <2> into bracket <3>.
- Ensure the harness is routed as shown.

 Install new wiring harness clip <1> onto harness as shown and secure to connector bracket.

Part Number	Part Description
3D0-971-838-L	Tie wrap clip

# **i** TIP

Install the clip at the central point of the connector bracket first, position the harness and then tighten the cable tie. This will aid in orientation of the harness.



Install 130 mm of corrugated tube <1> onto each body side wiring harness section as shown.



Wrap corrugated tube with fabric tape.

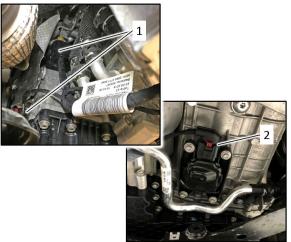
Part Number	Part Description
N -105-920-02	Fabric tape

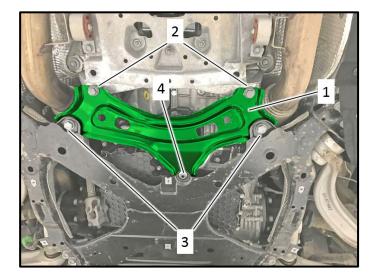
- Ensure there is gap between the tape windings • <arrows>.
- Ensure the corrugated tube is secured to the wiring harness with the fabric tape to prevent the harness from sliding inside the corrugated tube.

# **I**NOTE

The gaps in the tape are necessary to allow water to flow out of the wiring harness.







- Reconnect, secure and lock all connectors and wiring harness clips.
- Ensure the new tie wrap clips are all secure. •

#### Reinstall subframe end panel (if equipped) and noise insulation:

- Installation is the reverse order of removal. •
- All fasteners will be replaced and torqued as • follows:

Part Number	Location	Torque
N -907-988-09	Nut <4>	30 Nm
N -910-661-01	Bolt <2>	50 Nm + 90°
N -912-651-01	Bolt <3>	70 Nm + 90°

• Install noise insulation in the reverse order of removal.

#### Proceed to Section C.

I certify that this campaign has been performed in strict accordance with the applicable Audi repair procedure.		
SAGA Code:.		
Technician: .		
Date: .		
em#: AUD4927ENG		

-OR-

campa exécuté	certifie que cette agne de rappel a été ée suivant les strictes tives de réparation d'Audi
Code de SAG	SA:
Technicien:	
Date:	
tem # AUD4927FRE	

- Once the campaign has been completed, the technician should stamp the repair order.
- Stamps are available for ordering through the Compliance Label Ordering Portal.
- Proceed to Section D.

# Section D - Parts Return/Disposal

Properly store (retain), destroy or dispose of removed parts in accordance with all state/province and local requirements, unless otherwise indicated and/or requested through the Warranty Parts Portal (WPP) for U.S. and the Part Destruction and Core Disposition Report for Canada.