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2020.0 DEFENDER (LE), 204-01

FRONT SUSPENSION

FRONT LOWER CONTROL ARM (G2416565)

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SPECIAL TOOL(S)



204-506/1

Remover/Installer, Halfshaft



204-506/3

Remover/Installer, Halfshaft Screw Thread



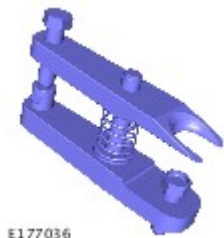
204-506/5

Retainers, Halfshaft tools



204-598

Hydraulic Cylinder 10t



JLR-204-793A

Ball Joint Splitter



E145966

JLR-204-803

Splitter, Upper Arm



E258695

JLR-204-838

Ball joint splitter



E269374

JLR-204-838-01

Ball Joint Splitter Adaptor

GENERAL EQUIPMENT

EQUIPMENT NAME
Transmission jack

PART(S)

STEP	PART NAME	QUANTITY
Installation Step 1	Front lower control arm nut and bolt	1
Installation Step 2	Front suspension upper arm ball joint to knuckle nut and bolt	1
Installation Step 3	Front lower control arm nut	1
Installation Step 6	knuckle extension bolt	1
Installation Step 10	Front halfshaft nut	1

REMOVAL

⚠ CAUTION:

The suspension arm to subframe/body nuts and bolts must be tightened with the suspension in arms in the normal ride position. Failure to follow this instruction may result in premature failure of the bush.

△ NOTES:

- This procedure contains illustrations for left side components, right side components are similar.
- This procedure contains some variation in the illustrations depending on the vehicle specification, but the essential information is always correct.
- This procedure contains illustrations showing certain components removed to provide extra clarity.
- Special tool 204-598 may be substituted with LR-121.

1. Raise and support the vehicle on a suitable 2-post lift.
Refer to: [Jacking and Lifting](#) (100-02 Jacking and Lifting, Description and Operation).

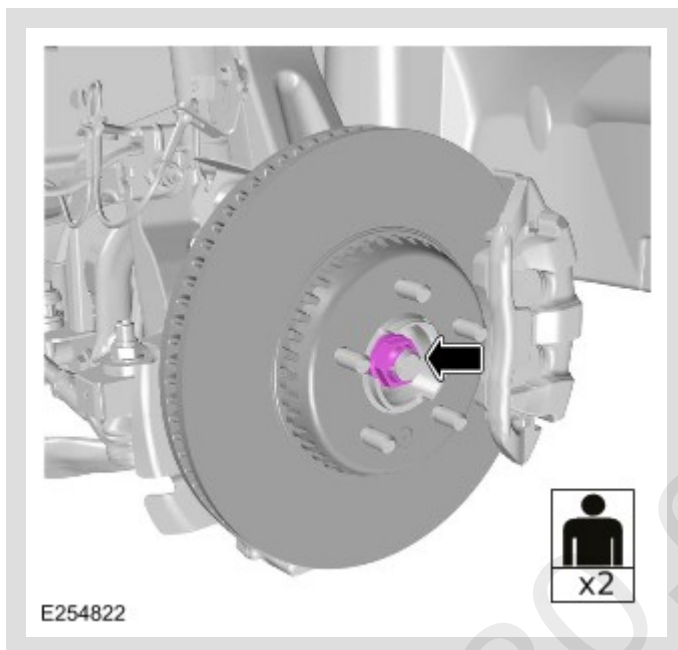
2. Remove the front left wheel and tire assembly.
Refer to: [Wheel and Tire](#) (204-04 Wheels and Tires, Removal and Installation).

⚠ CAUTION:

Do not use air tools to remove the half shaft nut.

⚠ NOTES:

- Apply the brake pedal during the removal of the half shaft nut.
- Retain the nut for use in the installation procedure.

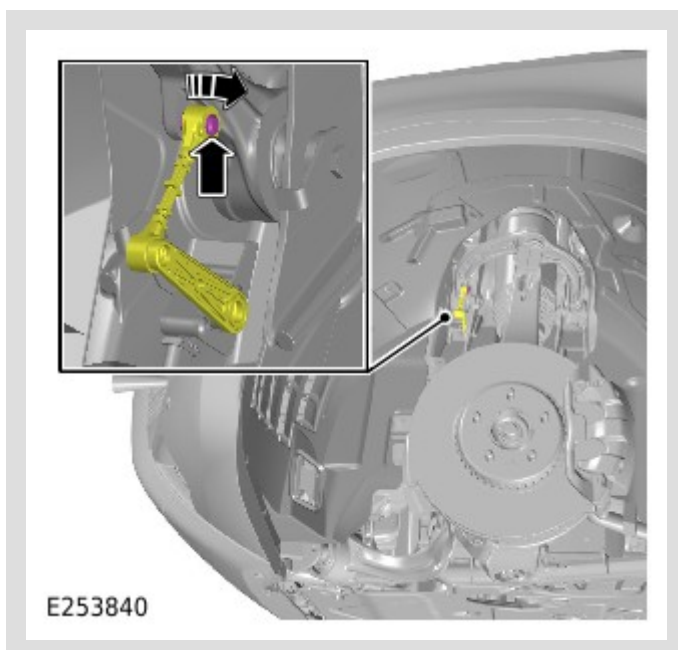


Remove the halfshaft nut.

4.

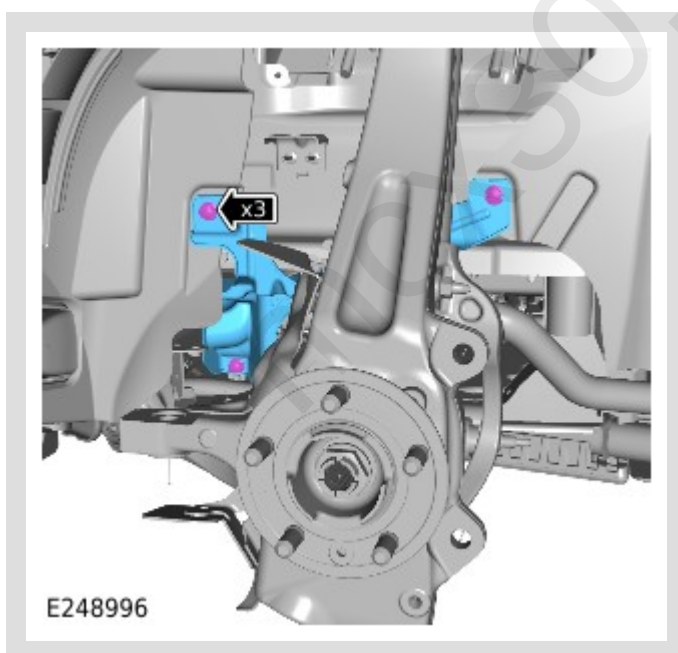
ⓘ CAUTION:

Do not use excessive force to release the height sensor.



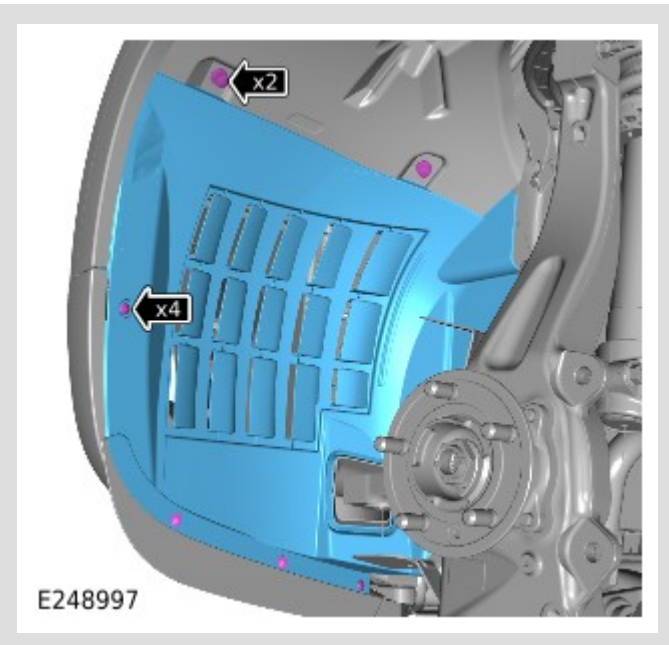
Release the height sensor from the upper control arm.

5.



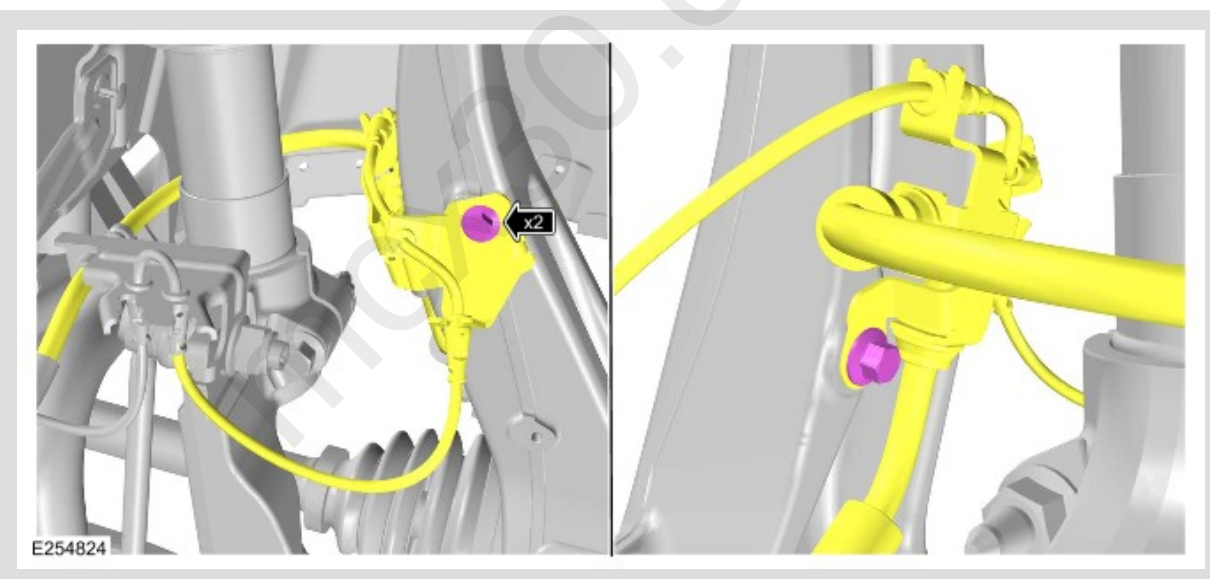
- Release the 3 clips.
- Remove the front wheel arch inner moulding.

6.



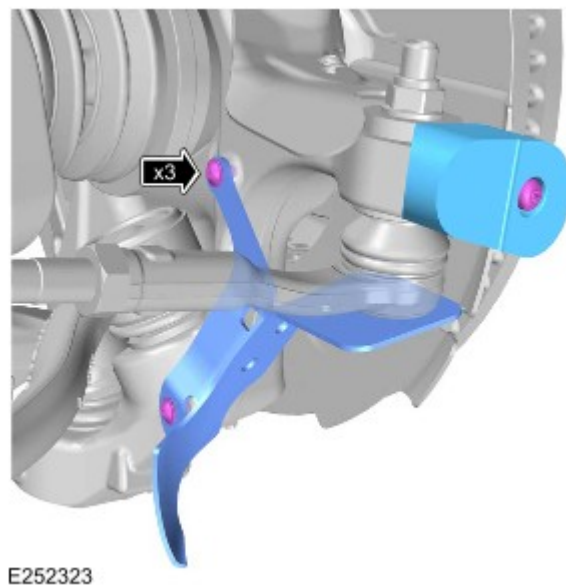
- Release the 2 clips.
- Remove the 4 screws.
- Remove the wheel arch liner front section.

7.



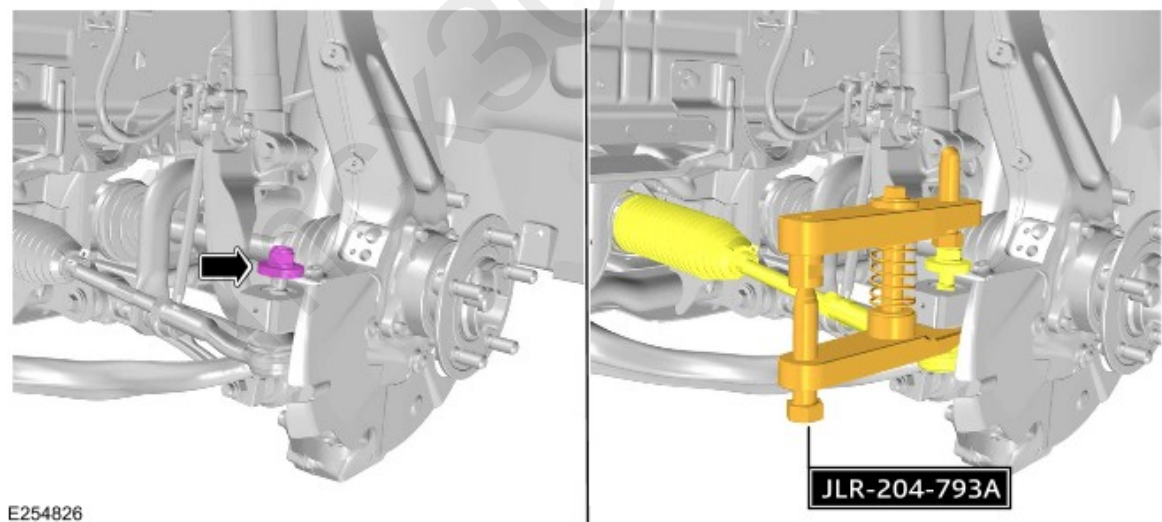
- Remove the 2 bolts.
- Release the brake hose and wiring harness bracket assembly.

8.



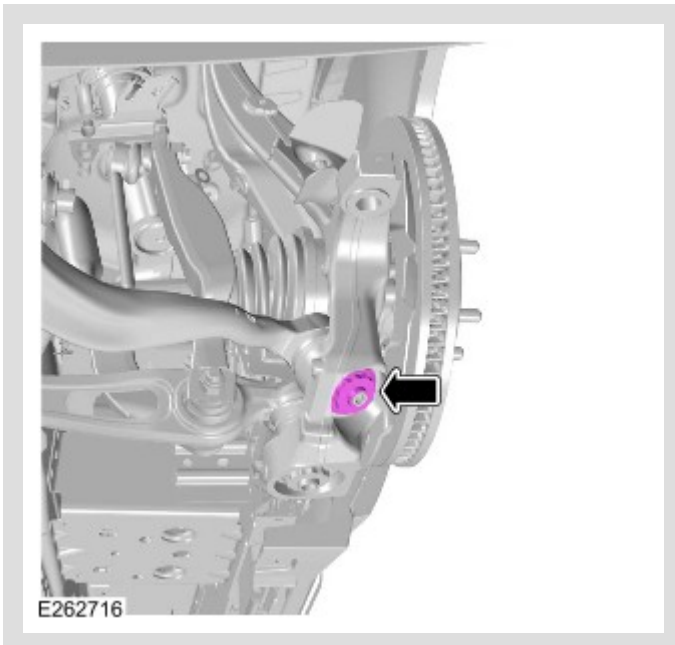
- Remove the 2 bolts.
- Remove the air deflector.
- Remove and discard the bolt.
- Remove the knuckle extension.

9.



- Loosen, but do not remove the nut.
- Use the special tool to release the tie-rod end from the wheel knuckle.
Special Tool(s): [JLR-204-793A](#)
- Remove the nut.
- Release the tie rod end from the wheel knuckle.

10.

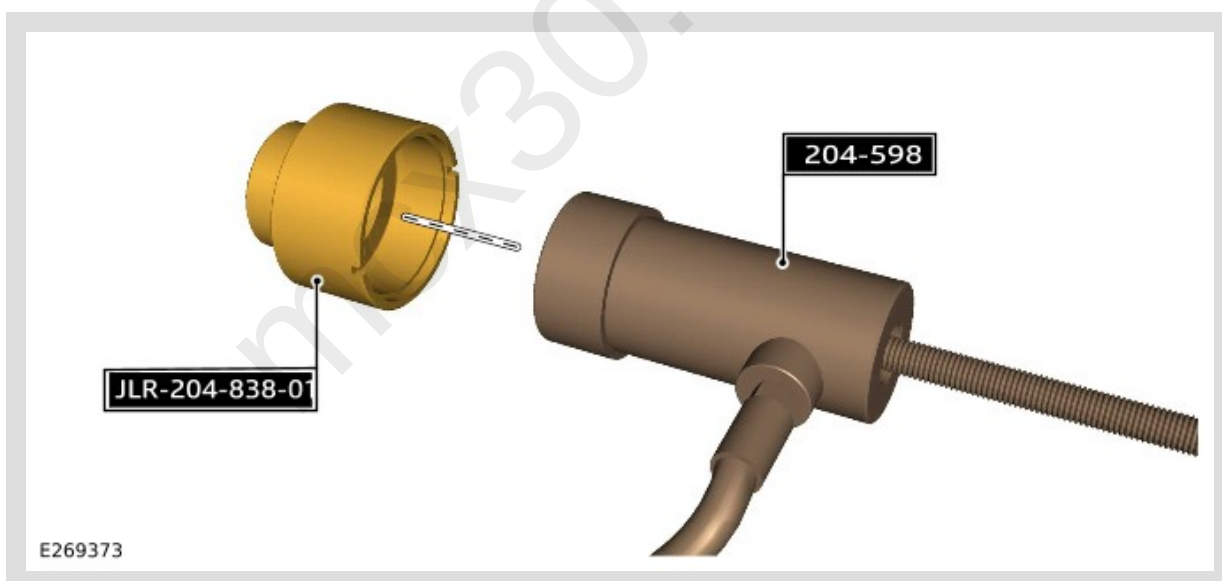


Loosen, but do not fully remove the nut.

11.

 NOTE:

This step is only required for special tool 204-598. If LR-121 is used, do not install JLR-204-838-01.



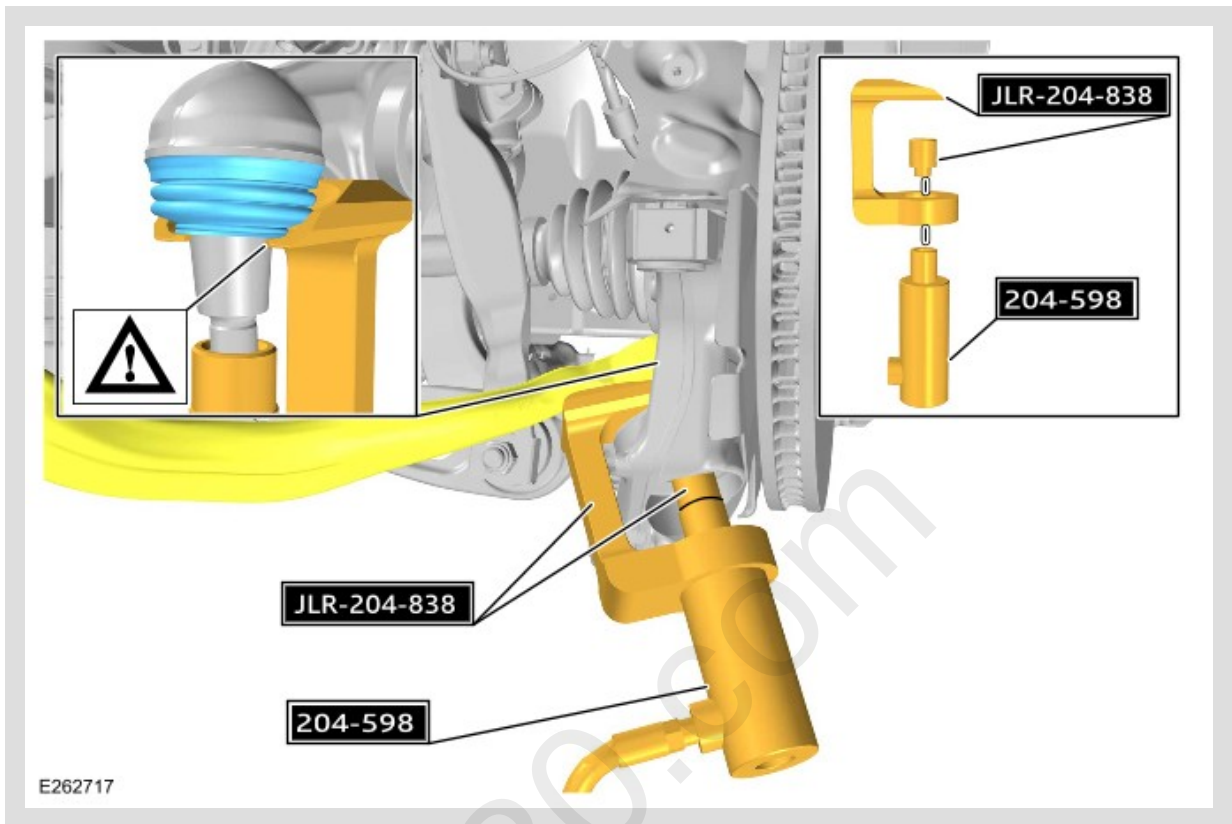
Assemble the special tools.

Special Tool(s): [JLR-204-838-01](#), [204-598](#)

12.

⚠ CAUTION:

Make sure the special tool is correctly located and the lower ball joint boot is not damaged while carrying out the operation. Failure to follow this instruction may result in damage to the component.



Use the special tools to release the front lower control arm ball joint from the wheel knuckle.

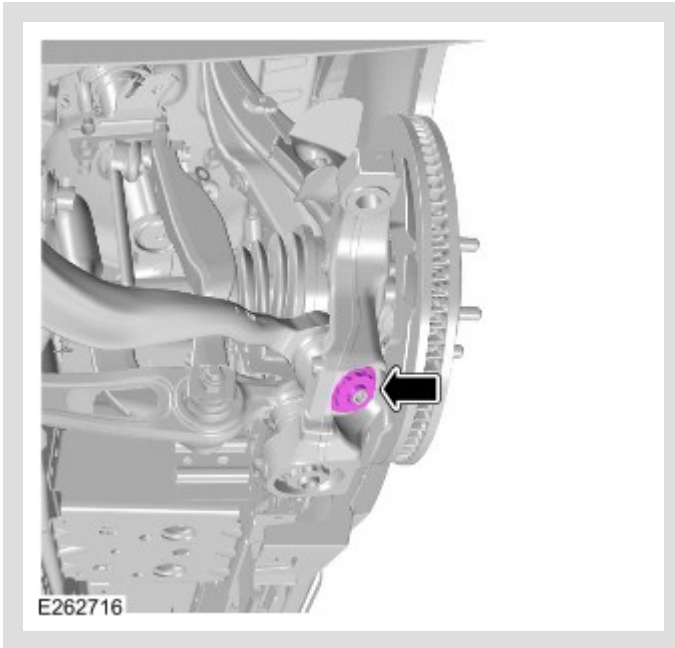
Special Tool(s): 204-598, JLR-204-838

13.

Remove the special tools.

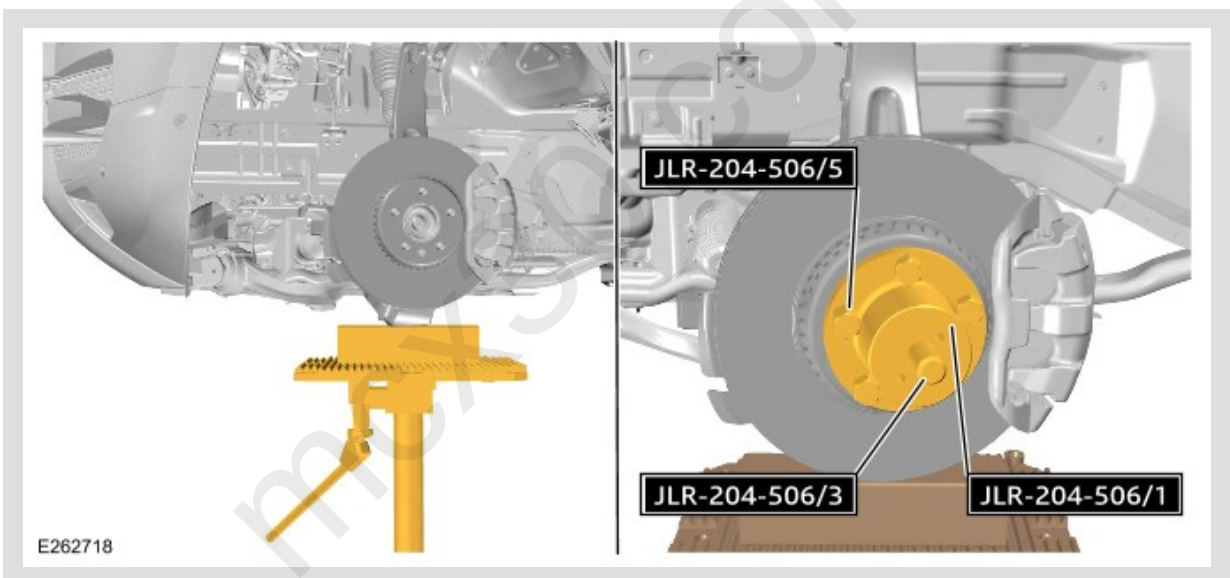
Special Tool(s): 204-598, JLR-204-838, JLR-204-838-01

14.



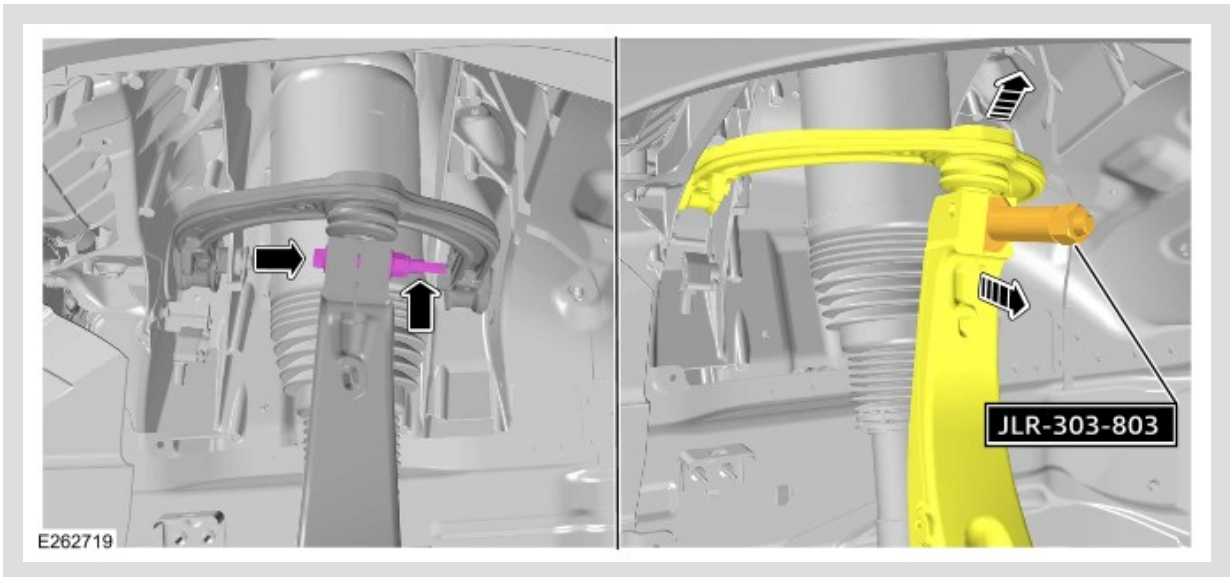
Remove and discard the nut.

15.



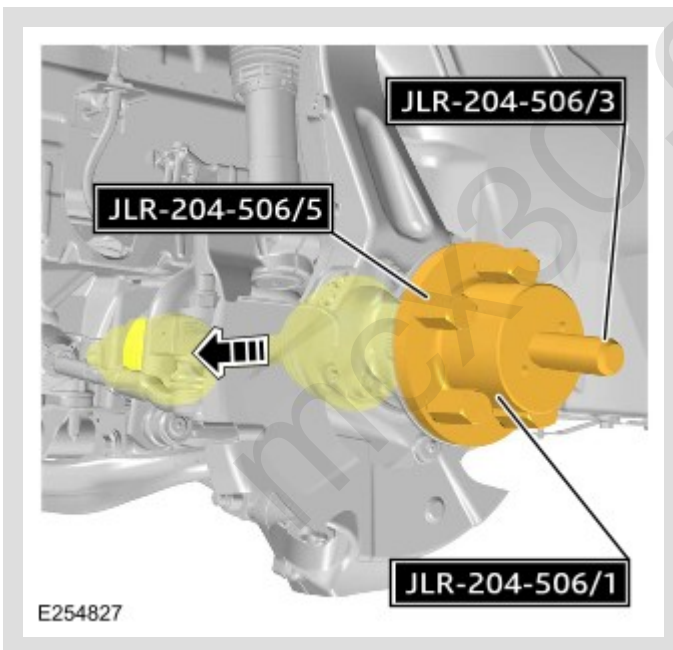
- Use transmission jack to support the wheel knuckle.
General Equipment: [Transmission jack](#)
- Install the special tools.
Special Tool(s): [204-506/1](#), [204-506/3](#), [204-506/5](#)

16.

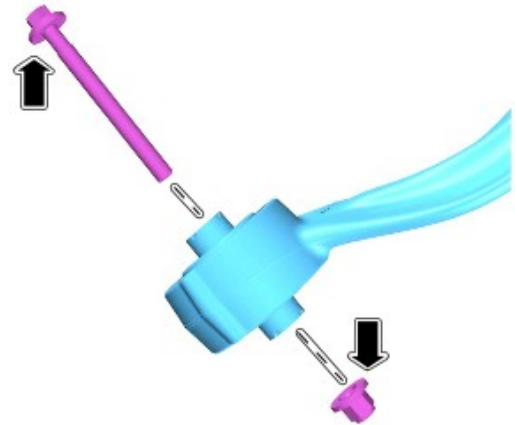
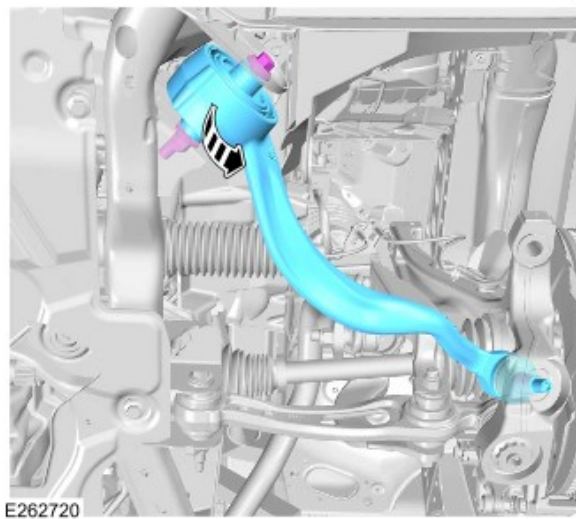


- Remove and discard the nut and bolt.
- Use the special tool to release the upper control arm from the wheel knuckle.
Special Tool(s): [JLR-204-803](#)

17.



Use the special tools to release the halfshaft from the wheel knuckle.
Special Tool(s): [204-506/1](#), [204-506/3](#), [204-506/5](#)



- Remove and discard the nut and bolt.
- Remove the front lower control arm.

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INSTALLATION

1.

- Install the front lower control arm.
- Install and tighten the front lower control arm to subframe nut and bolt.

Renew Part: [Front lower control arm nut and bolt](#) *Quantity:* 1.

Torque

Stage1: **100Nm**

Stage2: **180°**

- Position the halfshaft to the wheel knuckle.

2.

- Install the upper control arm to the wheel knuckle.
- Install and tighten the upper control arm to wheel knuckle nut and the bolt.

Renew Part: [Front suspension upper arm ball joint to knuckle nut and bolt](#) *Quantity:* 1.

Torque: **70Nm**

- Secure the height sensor link to the upper control arm.

3.

- Use the special tools to install the front halfshaft
Special Tool(s): [204-506/1](#), [204-506/3](#), [204-506/5](#)

- Remove the special tools.

- Remove the transmission jack.

General Equipment: [Transmission jack](#)

- Install and tighten the front lower control arm to wheel knuckle nut.

Renew Part: [Front lower control arm nut](#) *Quantity:* 1.

Torque: **290Nm**

4.

- Connect the tie rod end to the wheel knuckle.
- Install and tighten the tie rod end to wheel knuckle nut.

Torque: **140Nm**

5.

- Secure the brake hose and wiring harness bracket assembly to the wheel knuckle.
- Install and tighten the 2 bolts.

Torque: **10Nm**

6.

- Install the knuckle extension.
- Install and tighten the knuckle extension to the wheel knuckle bolt.
Renew Part: [knuckle extension bolt](#) Quantity: 1.
- Install the air deflector to the wheel knuckle.
- Install and tighten the air deflector to the wheel knuckle upper bolt.
Torque: 10Nm
- Install and tighten the air deflector to the wheel knuckle lower bolt.
Torque: 10Nm

7.

- Install the wheel arch liner front section.
- Install the 4 screws.
Torque: 5Nm
- Install the 2 clips.
- Install the front wheel arch inner moulding.
- Install the 3 clips.

8.

 CAUTION:

Do not use air tools to install the half shaft nut.

 NOTE:

Apply the brake pedal during the installation of the halfshaft nut.

Install and tighten the old halfshaft nut.

Torque: 175Nm

9.

 CAUTION:

Do not use air tools to remove the half shaft nut.

 NOTE:

Apply the brake pedal during the removal of the halfshaft nut.

Remove and discard the old halfshaft nut.

10.

 CAUTION:

Do not use air tools to install the half shaft nut.

 NOTE:

Apply the brake pedal during the installation of the halfshaft nut.

Install and tighten the halfshaft nut.

Renew Part: [Front halfshaft nut](#) Quantity: **1**.

Torque

Stage1: **120Nm**

Stage2: **60°**

11.

Install the wheel and tire assembly.

Refer to: [Wheel and Tire](#) (204-04 Wheels and Tires, Removal and Installation).

12.

Use the Jaguar Land Rover (JLR) approved wheel alignment equipment, check and if necessary adjust the front wheel alignment.

Refer to: [Wheel Alignment](#) (204-00 Suspension System - General Information, General Procedures).