

## OREGON PRE-TRIP 2021

*Examiner starts outside the vehicle in front [Volvo]*

### Lights check

- As I approach the tractor I am looking at the lights.
- Turn signals, flashers and clearance lights are clean, not cracked or broken and are amber to the front.
- Headlights are clean, not cracked or broken and are clear.
- I am now going inside the cab to test the function of the lights. Will you stand in the front of the vehicle and assist me?
- *Get in the cab, put on seat belt, turn the key on*
- Headlights, clearance, high beam, left turn, right turn, flashers
- Will you now go to the rear?
- Taillights, clearance, left turn, right turn, flashers and brake lights
- *Release the hood and exit the cab*

### Engine compartment

- *Open the hood and move to left side of engine*

#### Fluid Levels

- I check the oil by removing the dipstick, wiping it, replacing it and pulling it out again. The oil level should be between the Add and Full marks.
- The coolant reservoir is securely mounted, not cracked, broken or leaking, there are no holes. I check the coolant level by looking through the reservoir to see it is between the Add and Full marks.
- The power steering reservoir is securely mounted, not cracked, broken or leaking and there are no holes. The fluid level is checked with a dipstick and should be between the Add and Full marks.

#### Hoses and Leaks

- The hoses do not have abrasions, bulges, cuts, holes or leaks. They have clamps and fittings securely fastened at both ends.
- There is no puddling of fluids on the ground such as oil, coolant or fuel.

#### Alternator and Belts

- The alternator is securely fastened, no loose or missing nuts or bolts, the casing is not cracked or broken. The wires are securely attached, and they are not cut, broken, frayed, or burnt. It is belt driven.
- The serpentine belt and the alternator belt are not cracked, broken or frayed and they do not deflect more than 1/2"-3/4".

#### Air Compressor

- The air compressor is securely fastened, no loose or missing nuts or bolts, the case is not cracked or broken, and there are no air leaks. It is gear driven.
- The hoses are securely attached, and there are no abrasions, bulges or cuts, or air leaks.

### Front of Tractor

#### Steering Box and Hoses

- The steering box is securely mounted, no loose or missing nuts and bolts, casing is not cracked or broken or leaking. The hoses are securely attached, there are no abrasions, bulges or cuts, holes, leaks or missing clamps.

### Steering Linkage

- The Pitman arm is securely fastened, no loose or missing nuts or bolts, it is not cracked, bent or broken.
- The bushing is intact and the castle nut and cotter pin are tight and in place.
- The drag link and tie rod are securely fastened, no loose or missing nuts or bolts, and they are not cracked, bent or broken.
- The joints and sockets are not worn or loose.

### Front Suspension

- The leaf springs are not cracked, bent or broken, and there are none missing or shifted out of alignment.
- The front and rear spring mounts are not cracked or broken, no loose or missing nuts or bolts, and the bushing is intact.
- The U-bolts are securely fastened, no loose or missing nuts, and they are not cracked, bent or broken.
- The shock absorber is securely mounted, no loose or missing nuts or bolts, the mounts are not cracked or broken, and there are no leaks.

### **Driver Door & Fuel**

- The driver door opens and closes freely, latches securely, the door seal is intact, and the hinges are securely mounted, no loose or missing nuts or bolts.
- The mirror is securely mounted, not cracked, bent or broken, no loose or missing nuts or bolts. It is clear and free of illegal stickers and adjusted to the driver.
- The fuel tank is securely mounted, not shifted as indicated by shiny areas near the mounting straps, no loose or missing nuts or bolts.
- The fuel cap is tight and there are no leaks from the cap, tank or fuel lines.

### **Rear of Tractor**

- Drive shaft is not cracked, bent or broken, it is lubricated, and I would grab it and try to shake it to check for looseness.
- U-joints are lubricated, no loose or missing nuts or bolts, and are free of debris.
- Lights are clean, not cracked or broken and are red to the rear.
- Air bags are securely fastened at both ends, inflated, no abrasions, bulges, cuts, or audible leaks. No loose or missing nuts or bolts, airlines are secured, no abrasions, bulges or cuts, or air leaks. Air bag mounts are not cracked or broken, no loose or missing nuts or bolts.
- Exhaust system securely attached, no loose or missing nuts or bolts, no cracks, holes, or signs of leaks such as rust or carbon soot trails.
- Frame is not cracked, bent or broken, there are no illegal or broken welds, no loose or missing bolts or rivets.
- Cross members are not missing, cracked, bent or broken; no loose or missing nuts, bolts or rivets.
- The floor has no holes or damage.
- Glad hands and electrical connector are locked in place.
- Air and electrical lines are secured at both ends, no abrasions, bulges, cuts splices or air leaks.
- The air and electrical lines are not tangled, pinched or dragging.
- Catwalk is securely fastened, not cracked or broken, no loose or missing nuts, bolts or rivets, and free of debris.
- The trailer front has no missing bolts or rivets, and no holes.
- Lights are clean, not cracked or broken, and amber to the front.

### **Trailer/Tractor Coupling**

- Mounting bolts are not cracked, broken, loose or missing, no rust trails or shiny metal.
- Platform is securely mounted, not cracked, bent or broken, no loose or missing nuts or bolts or broken welds.
- 5th wheel skid plate is securely mounted to the platform, no loose or missing nuts, bolts or pins, and it is properly lubricated.
- The release arm is fully engaged, and it is not cracked, bent or broken.
- The apron is not cracked, bent or broken. There is no gap between it and the skid plate.
- The king pin is not cracked, bent or broken and the jaws are locked around it.

### **Side of Trailer**

- Landing gear is not cracked, bent or broken, no loose or missing nuts or bolts. It is in the uppermost position and the handle is secured.
- Landing pads are not cracked, bent or broken.
- Trailer frame is not cracked, bent or broken, no loose or missing nuts, bolts or rivets, no holes or illegal or broken welds.
- Crossmembers are not cracked, bent or broken, no loose or missing nuts, bolts or rivets, no illegal or broken welds. None are missing.
- The trailer floor has no holes or damage.
- There is at least 50% DOT reflective tape, properly adhered, clean, not damaged.
- The ABS light is clean, not cracked or broken and is amber.

### **Trailer Wheels & Tires**

- The wheel rims are not cracked or welded, the bead flange is not dented.
- Lug nuts are not missing, cracked or loose have shiny threads or rust trails.
- The bolt holes are not cracked or distorted.
- I would check the tractor wheels in the same manner.
- The valve stem and cap are not missing, cracked or broken. I would check the air pressure with a tire gauge
- The tire sidewalls do not have abrasions, bulges or cuts. The tread wear is even and there is at least 2/32" tread depth. I would check the tractor tire in the same manner with the exception that the steer tires must have at least 4/32" tread depth.
- The dual tires are not touching and the budd space is free of debris. I would check the tractor drive tires spacing in the same manner.
- Hub and axle seal is not leaking, plug is in place and no loose or missing bolts. This is a sealed hub so fluid level cannot be checked. I would check the tractor hubs in the same manner except using the sight glass for fluid level on the steer axle and checking at the differential for the drive axle.

### **Trailer Brakes**

- Slack adjuster and push rod are not cracked, bent or broken, no loose or missing nuts, bolts or pins. The angle between them is not less than 90 degrees.
- With the parking brake released there should be no more than 1" of travel in the push rod.
- The brake air chambers securely mounted, are not cracked or dented, no loose or missing nuts or bolts, holes or leaks.
- Brake chamber clamps are securely attached, and no loose or missing nuts or bolts.
- Brake air lines are securely attached, not worn, no abrasions, bulges or cuts, holes or leaks. They can provide air to my brakes.

- Brake drums are not worn thin, cracked or warped, and not contaminated with grease or oil.
- Brake linings are not missing, cracked or broken and are at least 1/4" thick, they are not contaminated by grease or oil.
- I would check my tractor steer and drive brakes in the same manner.

### **Trailer Suspension**

- The leaf springs are not cracked, bent or broken, and there are none missing or shifted out of alignment.
- The front and rear spring mounts are not cracked or broken, no loose or missing nuts or bolts, and the bushing is intact.
- The U-bolts are securely fastened, no loose or missing nuts or bolts, and they are not cracked, bent or broken.
- The square Torque Arm and round Radius Rod are securely attached, not cracked, bent or broken, and no loose or missing nuts or bolts. The bushings are intact.
- I would inspect my rear tractor suspension in the same manner, with the exception that it has a shock absorber and air bag as already described.

### **Rear of Trailer**

- Door is closed and latched, it has no holes or missing rivets.
- The door opens and closes.
- The hinges are securely attached, no missing nuts or bolts or rivets.
- The ties are securely attached, no missing nuts or bolts, and they are not frayed, or broken.
- Mudflaps are securely attached, no cuts or tears, and not more than 10" off the ground.
- I would check my tractor mudflaps in the same manner.
- DOT reflective tape covers 100% of the rear width, is properly adhered and is clean and not damaged.
- Clearance lights, markers, taillights, stop and turn lights, flashers, are not cracked or broken, are clean and red to the rear.

### **In Cab**

- Seat belt is secured, no loose or missing nuts or bolts, not frayed, latches properly and is adjusted to the driver.
- I am going to do a safe start with the clutch in and transmission in neutral to allow the air compressor to build pressure and observe the governor cutout at between 100-125psi. The air compressor governor cut out at \_\_\_\_psi.
- The dash ABS light briefly was lit at start up and then went out.
- The air gauge indicates pressure is building in the normal range while the engine is running.
- The oil pressure gauge is working and in the normal range.
- Voltmeter is indicating battery charging voltage in the normal range.
- The water temperature gauge is working and in the normal range.

#### Lighting Indicators

- Left and right turn signal indicators are working.
- Four-way flasher indicator is working.
- High beam indicator is working.

#### Windshield & Mirrors

- Mirrors are clean, not cracked or broken, no loose or missing nuts or bolts, and adjusted for the driver.
- Windshield and weatherstripping is intact, clean, not cracked or broken, and is free of illegal stickers and obstructions.

### Dash Controls

- Wiper arms are securely attached, not bent or broken, and operate smoothly. The windshield washers operate correctly.
- The horn(s) works correctly.
- The heater works, and the defroster works.

### Emergency Equipment

- The spare fuses are under this panel on top of the dashboard.
- There are three reflective triangles, red in color.
- The fire extinguisher is securely mounted, fully charged, and properly rated.

### **Air Brake Leak Test - Engine OFF (assumes full pressure in tanks)**

- I am starting the air brake leak test.
- If I was on an incline I would chock the tires, but on relatively flat ground I will place my transmission in low gear, engine off, ignition ON, and brakes released.
- May I use my phone to time the next step?
- I am going to hold the service brake pedal down for one minute after the initial drop stabilizes. The pressure should not drop more than 4psi.
- [time for one minute exactly] The pressure did not drop more than 4 psi in one minute.

### **Low Air Test**

- I will now test the low air warning.
- I will fan the pressure off with the foot pedal until the low air pressure warning activates. It must activate before the pressure drops below 60psi.
- The warning activated at \_\_\_\_psi.

### **Tractor Protection Valve Test**

- I will now test the tractor protection valve.
- I will continue to fan down the pressure until the protection valve pops out. It should pop out before the pressure reaches 20 psi.
- The tractor protection valve popped out at \_\_\_\_psi.

### **Parking Brakes Tests**

- I will now start the engine and build operating air pressure to test the parking brakes.
- First I will test the tractor parking brake by applying only it and try moving the tractor forward.
- The tractor parking brake held.
- Now I will test the trailer parking brake by applying only it and try moving the tractor forward.
- The trailer parking brake held.

### **Service Brake Test**

- Now I will test the service brakes.
- I am releasing the tractor and trailer parking brakes, pulling forward slowly and pressing the service brake pedal.
- The vehicle did not pull to either the left or right while braking.
- This concludes the air brake tests.