

# SCHOOL BUS PRE-TRIP INSPECTION VISUAL GUIDE

### General Appearance

- While on level ground,
  Bus is not leaning to the left or right.
- There is no hanging debris.



#### Leaks



 There are no leaks or puddles of fluid on the ground under the engine and transmission.

#### Antenna

- Antenna is attached and properly secured to the bus.
- Not damaged.



### Check Amber Clearance Lights

- Front clearance lights are amber in color and not cracked or broken.
- 3 on top center and 1 on each side.



#### School Bus Decal



- School bus decal is visible, good in color, and not excessively worn.
- Reflective.

### Warning Lights

- Amber and Red Warning lights are visible in color, clean, and not cracked or broken.
- Lights are functioning properly.



#### Windshield

- Windshield is clean, visible to see through, and not cracked or broken. There is no obstruction of view.
- Seal around the windshield is not missing, not cracked, or damaged.

NO ILLEGAL STICKERS.



#### Cross View Mirrors

- Cross-view mirror is tight, secure, and properly positioned-not cracked or broken. All brackets are mounted securely to the hood of the bus.
- Brackets are not missing any nuts or bolts.





### Headlights, turn signals, 4-way flashers

- Headlamps are clean, visible to see through, and not cracked or broken.
- This should include low beam, high beam, turn signals and 4-way flashers.









#### Hood and grille



 Hood is good in color, not cracked, broken, or torn. Hood is securely mounted to the front bumper and frame of the bus.



 Grille is good in color, not cracked or broken, and securely mounted to the hood of the bus.

#### Front Bumper and Cross Arm

• Front bumper is securely mounted to the frame of the bus and not bent or broken.



Cross Arm Device is securely mounted to the front bumper.

It is good in color and not bent or broken.

Check that it is in working condition.



### Engine Compartment from Driver's Side



#### Flat and Convex Mirrors

- Mirrors are properly mounted to the side of bus and are adjusted correctly.
- Mirrors are not cracked or broken.





### Windshield Wiper (Driver's Side)

- Wiper is securely attached and is in working condition.
- Blades are not excessively worn and not cut or frayed.



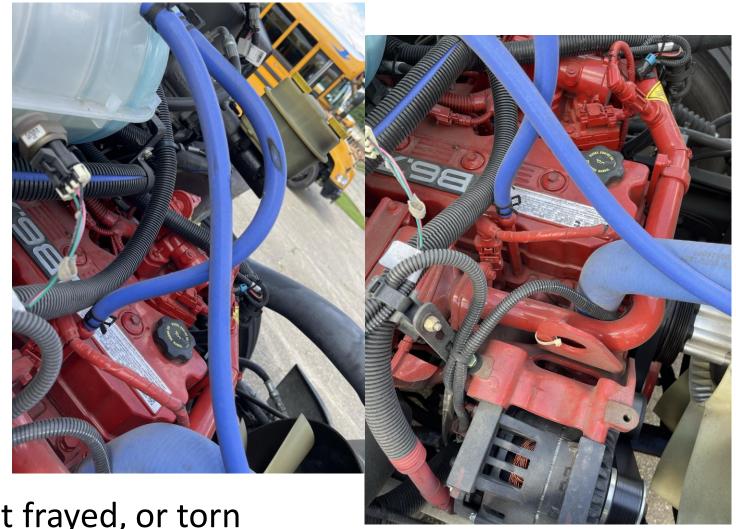


#### Brake Fluid

- Brake Fluid Reservoir is properly mounted and is not cracked or broken.
- There are no missing parts.
- Has adequate Brake Fluid.



# Lines and Wiring



- Lines and wires are not cut frayed, or torn
- I see or hear no leaks.

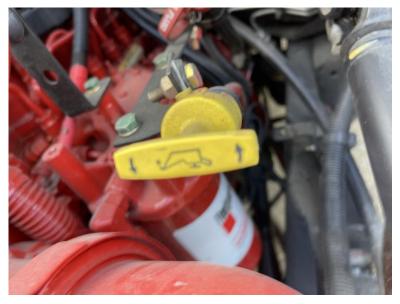
#### Hoses

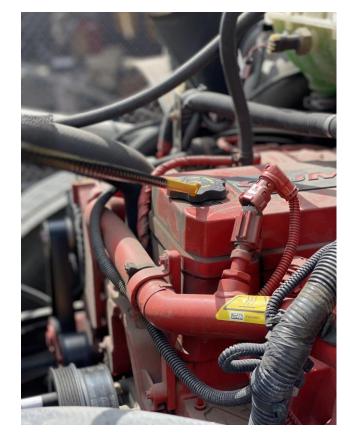
- Check hoses for any leaks, cuts, or tears.
- Chack that clamps are secure and not loose or missing.



### Checking Engine Oil/Engine Oil Fill

- Check oil level when engine is off.
- Locate engine oil dip stick.
- When checking dip stick, oil level should be between "Add" and "Full".

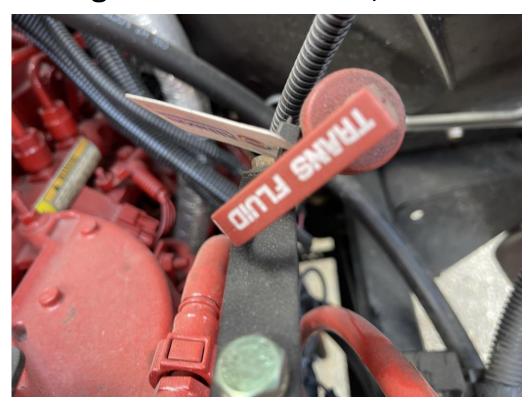




To add engine oil: Remove the oil filler cap located on top of the engine block as shown above. Then add appropriate oil to the engine.

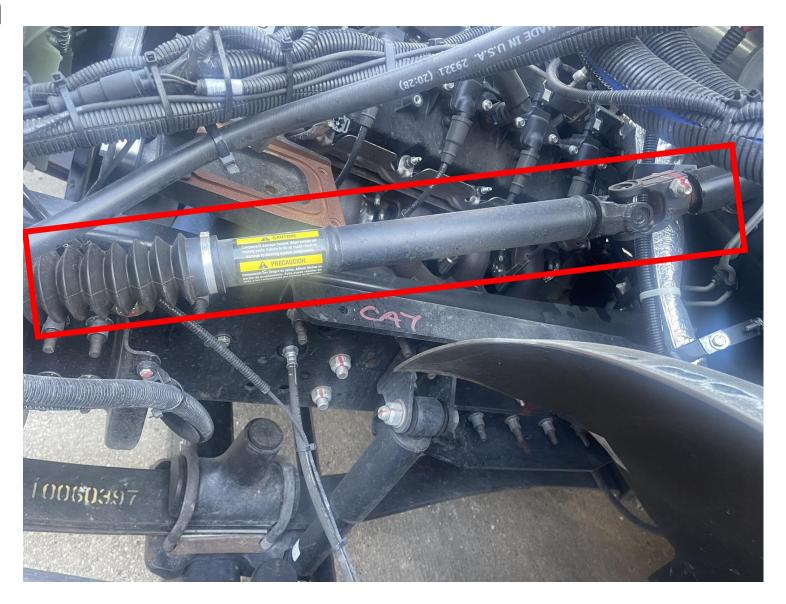
#### Transmission Fluid

- Transmission fluid is checked while the engine is running.
- The engine should be hot, and Transmission Fluid is at proper level.



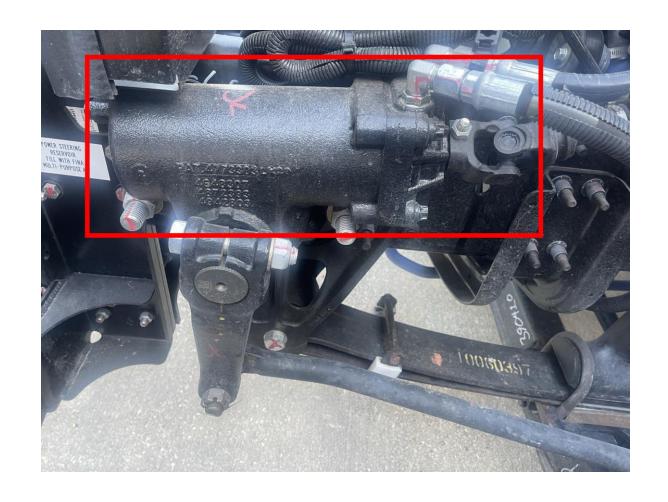
### Steering Column

- Steering Column is securely mounted and is not damaged or broken.
- It is attached to steering box.



#### Steering Box

- Steering box is securely mounted to the frame of the bus
- Not missing any nuts and bolts.
- There are no leaks.
- Power Steering Hoses are not cut, frayed, torn, and is not leaking.
- Power Steering Hoses are secured properly with nuts and bolts.



### Steering Linkage & Pitman Arm



- Steering column is straight, not bent or broken.
- They are not cracked or broken.
- Joints and sockets are not loose or worn.

- Pitman Arm is securely mounted with castle nut and clevis pin.
- Bushings are in good condition; not bent or broken.

#### Shock Absorber

 Shock Absorber is securely mounted to the frame of the bus and is not leaking.

- In good condition and not pissing any parts.
- Absorber is not leaking.



#### Brake Lines and ABS

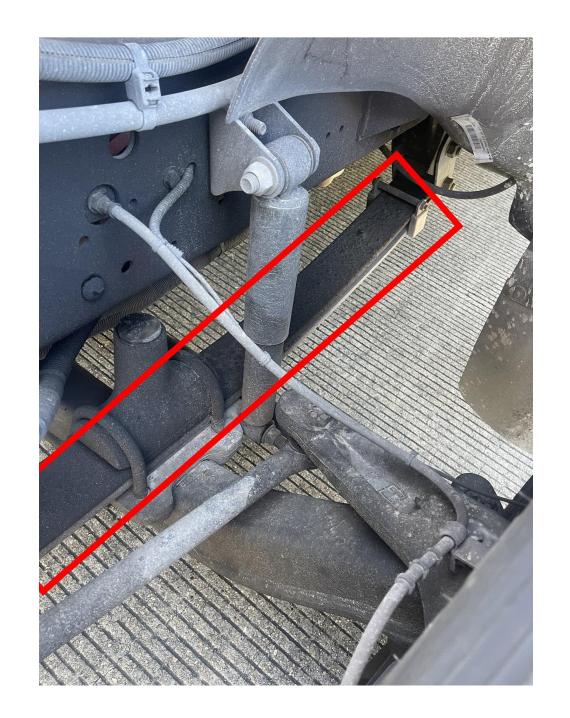
- Brake lines are secure and not cut, frayed, or torn.
- There are no leaks.
- All couplings and fittings are secure and not leaking.





# Leaf Spring

- Leaf Spring is mounted securely and is not missing any links.
- Leaf Springs are not missing or shifted and not cracked or broken.



#### **U-Bolts**

 U-Bolts are secured to the front axle of the bus.

 There are no missing, broken, or loose bolts.



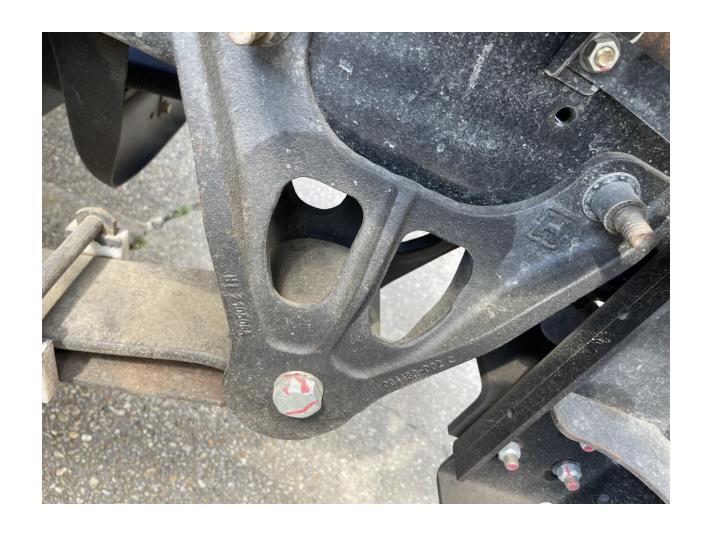
#### Front Axle

- Front Axle is straight and not bent or broken.
  - There are no missing parts.
  - Not hanging or dragging.



### Spring Leaf Mounts

- Spring Leaf Mounts are in place.
- They are not cracked or damaged.
- There are no missing bolts.
- Bushings are not damaged or missing.



#### Power Steering Reservoir

- Power Steering is gear driven is securely mounted to the frame of the bus.
- Power steering is not leaking and has adequate Power Steering Fluid.
- To check Power Steering Fluid, the engine should be off.
  - Check the dipstick to see where fluid levels are. Levels must be above the refill mark.



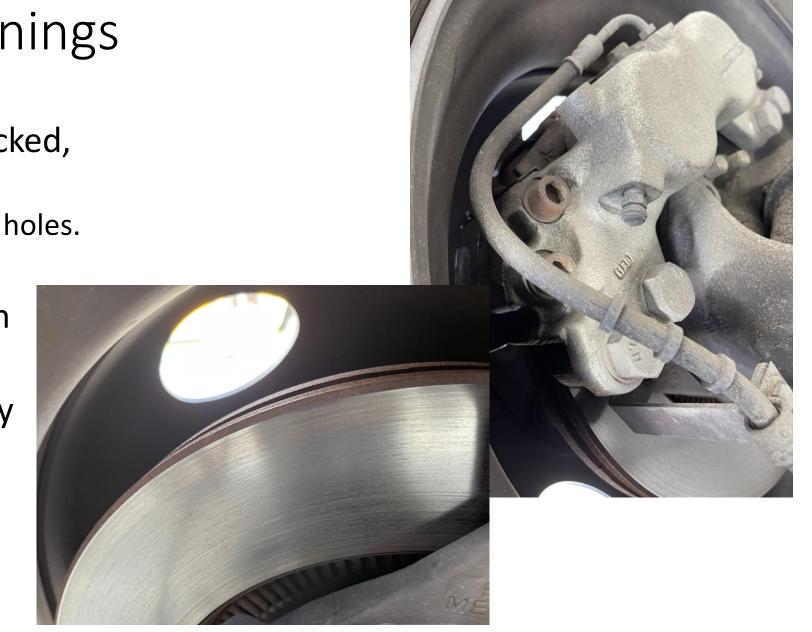
### Brake Discs & Linings

 Brake discs are not cracked, bent, or broken.

• There are no dents are holes.

 Brake pads are in good condition and not worn dangerously thin.

 Brake caliper is securely mounted and in good condition.



#### Front Rim

#### Inside:

- The inside of the rim is in good condition.
- There are no illegal welds
- Rims are not bent or cracked. *Outside:*
- The outside of the rim is in good condition.
- There are no illegal welds.
- Rim is not bent or cracked.
- There are no rust trails that may indicate the rim is loose on the wheel.





#### Front Tire (ICD)

• Inflation: The tire is properly inflated, and you would check for proper inflation with a commercial tire gauge.

#### Condition:

- Outside face of the Front tire is in good condition.
- There are no cut or tears.
- Inside face of the tire is in good condition and there are no cuts or tears.
- **Depth:** Tire tread is evenly worn across and there is a minimum of 4/32 of tread depth.



### Hub Seal and Lug Nuts

- Hub oil seal is securely mounted to the rim.
  - Seal is not leaking and has adequate fluid.

- Lug Nuts
  - All lug nuts are present.
  - Lugs are not loose.
  - There are no receding cracks around lug bolt holes.





#### Valve Stem

• Valve stem is straight and has cap.

• Stem is not leaking, bent or broken.





### Engine Compartment (Door Side)



### Flat and Convex Mirrors

- Mirrors are properly mounted to the side of bus and are adjusted correctly.
- Mirrors are not cracked or broken.





#### Coolant

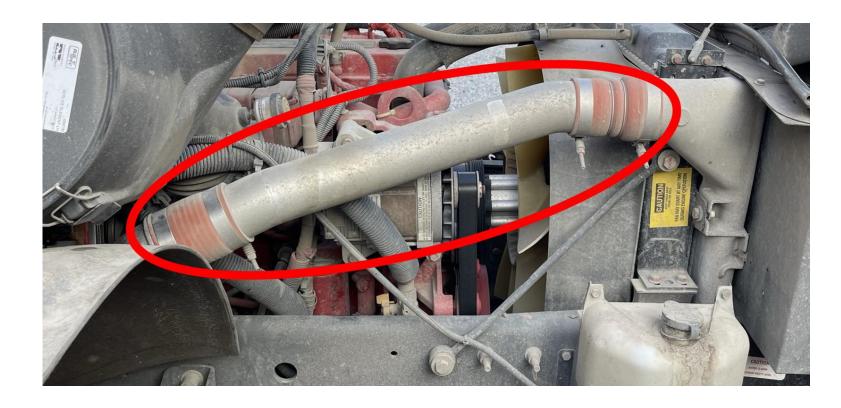
- Coolant Reservoir is securely mounted.
  - There are no cracks and is not torn.
  - Coolant has adequate fluid.
  - To add fluid, you would remove cap and fill.
  - NEVER REMOVE CAP WHEN HOT!
  - On our newer buses coolant reservoir will be plastic and translucent. On some of the older buses, coolant is metal with a sight glass.





### Exhaust

- Exhaust is securely attached to turbo.
  - There is no damage.
  - No signs of leaking.
  - Clamps are secure.



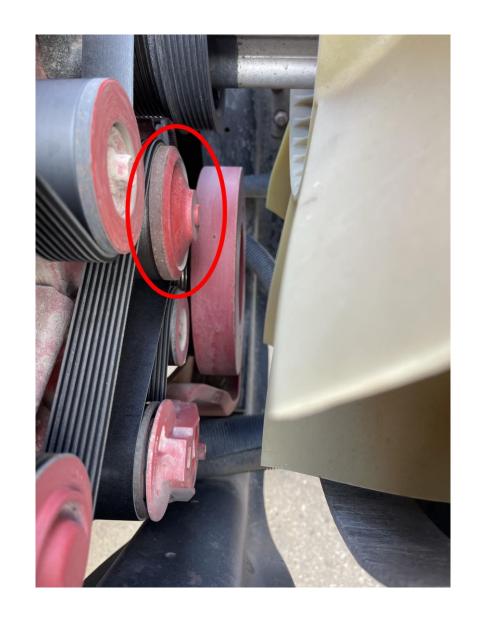
#### Alternator

- Alternator is belt driven and properly mounted to the engine block.
- All alternator wires are securely fastened, and not frayed or damaged.



# Water pump

- Water pump is mounted securely to the engine block
  - There are no leaks
  - The pump is belt driven.



#### Belts

- Belts are not frayed, or cracked and there is no sign of wear.
  - No loose fibers.
  - Belts have no more than ¾ inch play (defect).
- With the engine off, touch and tug on the belts to make sure there are no excessive defects.



# Windshield Wiper Reservoir

- Windshield Wiper Reservoir is securely mounted to the frame of the bus.
  - There are no leaks, and it has adequate washer fluid.



#### Shock Absorber

 Shock Absorber is securely mounted to the frame of the bus and is not leaking.

- In good condition and not pissing any parts.
- Absorber is not leaking.



### Brake Lines and ABS

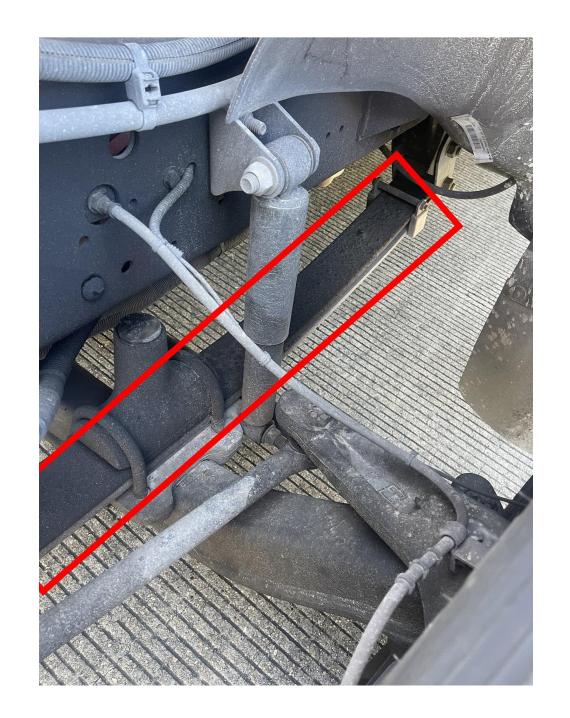
- Brake lines are secure and not cut, frayed, or torn.
- There are no leaks.
- All couplings and fittings are secure and not leaking.





# Leaf Spring

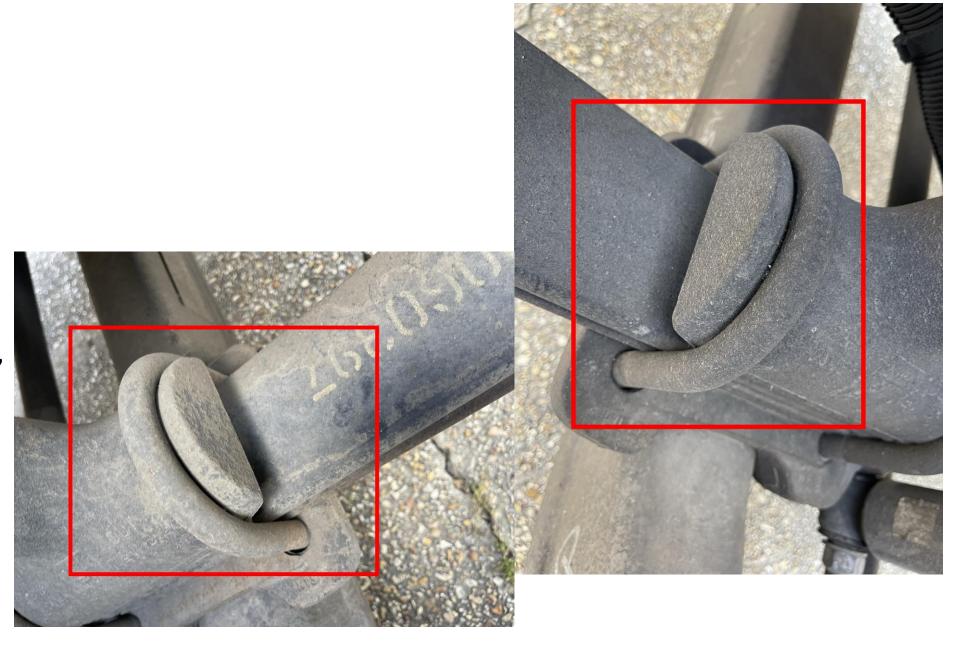
- Leaf Spring is mounted securely and is not missing any links.
- Leaf Springs are not missing or shifted and not cracked or broken.



### **U-Bolts**

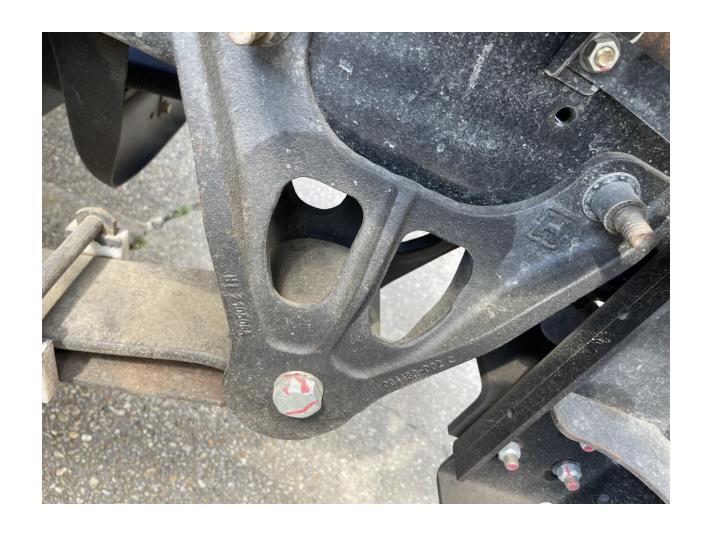
 U-Bolts are secured to the front axle of the bus.

 There are no missing, broken, or loose bolts.



# Spring Leaf Mounts

- Spring Leaf Mounts are in place.
- They are not cracked or damaged.
- There are no missing bolts.
- Bushings are not damaged or missing.



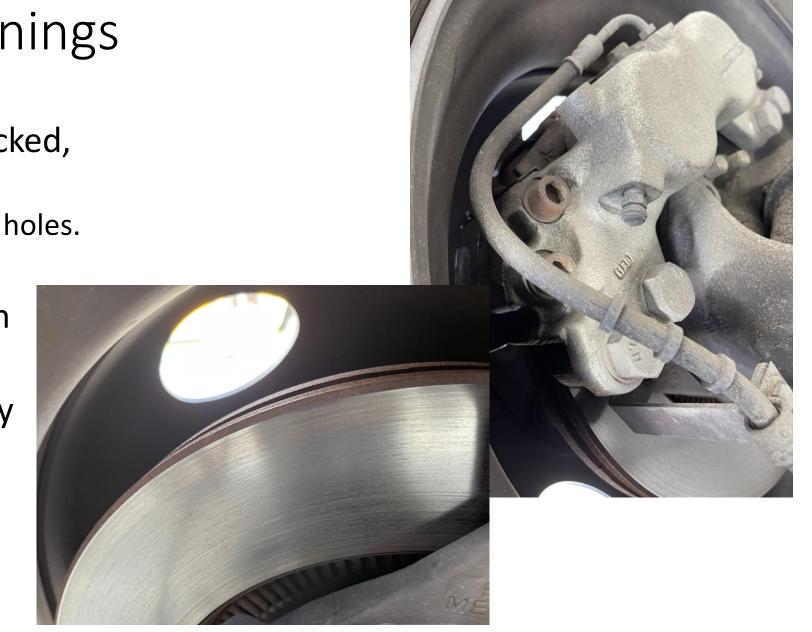
# Brake Discs & Linings

 Brake discs are not cracked, bent, or broken.

• There are no dents are holes.

 Brake pads are in good condition and not worn dangerously thin.

 Brake caliper is securely mounted and in good condition.



#### Front Rim

#### Inside:

- The inside of the rim is in good condition.
- There are no illegal welds
- Rims are not bent or cracked. *Outside:*
- The outside of the rim is in good condition.
- There are no illegal welds.
- Rim is not bent or cracked.
- There are no rust trails that may indicate the rim is loose on the wheel.





### Front Tire (ICD)

- Inflation: The tire is properly inflated, and you would check for proper inflation with a commercial tire gauge.
- **Tread:** Tire tread is evenly worn across and there is a minimum of 4/32 tread depth.

#### Condition:

- Outside face of the Front tire is in good condition.
- There are no cut or tears.
- Inside face of the tire is in good condition and there are no cuts or tears.





# Hub Seal and Lug Nuts

- Hub oil seal is securely mounted to the rim.
  - Seal is not leaking and has adequate fluid.

- Lug Nuts
  - All lug nuts are present.
  - Lugs are not loose.
  - There are no receding cracks around lug bolt holes.





### Valve Stem

• Valve stem is straight and has cap.

• Stem is not leaking, bent or broken.





### CLOSE THE HOOD

### Front Entrance



#### Service Door

- Door is not damaged and opens & closes properly.
- Door window is not cracked or broken and glass is clean.
- Hinges are secure.
- Rubber gaskets and seals are intact.



### Front Door Entry

• Handrails are secure.

• Entry steps are clear of any obstructions.

• Treads on steps are not loose or worn

excessively.







# Stairwell Light

- Stairwell light lens is not cracked or broken.
  - Light is functioning.
  - Good in color and there are no missing parts.



### Emergency Equipment

- Triangle kit is available and has 3 reflective triangles.
  - Properly mounted
  - Not cracked, broken, or missing any parts.

**Fire Extinguisher** is properly mounted.

properly charged and rated.

### First Aid and Body Fluid Cleanup Kits

Securely mounted and has adequate supplies



### Seat Belt

- Seat belt is mounted securely.
  - Adjusted properly
  - Not ripped or frayed.







#### Mirrors

- Student mirror, cross-view, and side external mirrors are all adjusted properly.
  - Mirrors are clean and good to see through.
  - Mirrors are not damaged and mounted securely.
  - No loose fittings or missing parts.









### Safe Start

- Gear shift is in neutral, and the parking brake is applied.
  - Turn the ignition switch and allow the gauges to stabilize.
  - Wait for the 'Wait to Start' lamp to illuminate.
    - Once cleared you can start the engine.





### Steering

- Steering wheel doesn't have any more than 2 inches of play in a 20-inch steering wheel.
- Electric Horn works properly.



# ABS System (Anti-lock Brake System)

 When doing safe start, the ABS indicator will illuminate and then turns off.

If the ABS lamp remains illuminated, ABS is not functioning correctly and

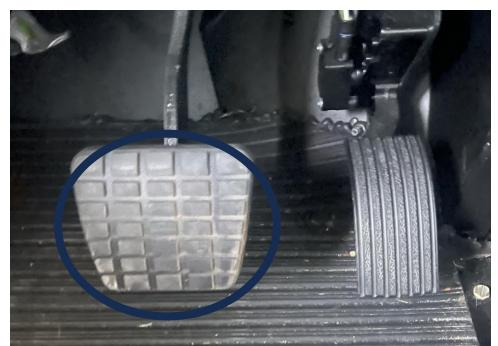
needs servicing.





# Hydraulic Brake Check (Service Brake)

- With the key off, pump the brake pedal 3 times and then hold it down for 5 seconds. The brake pedal should not move or depress during the five seconds.
- Most of our buses are equipped with a hydraulic brake reserve system.
- With Hydraulic Brake Reserve System:
  - With the key off, depress (hold down) the brake pedal and listen for the sound of the electric motor.



# **Emergency Exits**

# WITH KEY ON SO THAT BUZZERS WORK.

- There are different Emergency Exit devices:
  - 2 roof hatches.
  - At least 1 Emergency pushout window on each side of the bus.
  - <u>1</u>rear Emergency door.
  - Each Emergency Exit device is working properly and free of obstruction.
    - Latches properly and is not damaged.







### Seating

• There are no broken seat frames.

Seats are properly secured to the floor.

- Cushions are attached to seat frames.
- Seats are not cut or torn.



# Dome Lights

- Dome lights work properly.
  - Lens is not cracked or broken.
  - There are no missing parts.
  - All lights work.





# Heater/Defroster/Fans

- **Heater** switch works properly when turned on.
  - You should hear heaters in the rear once turned on.
- **Defroster** is in working condition.
  - You can feel air flow once turned on.
- **Fans** are in working condition on each level.
  - There are no missing parts, and it is operable.





### Oil Pressure Gauge

- With the key on and the engine running, Oil pressure builds to normal level.
- Guage will show increasing (normal) oil pressure.
  - Guage should read in the 50 psi range.



### Temperature Gauge

• Temperature Guage is operating.

• With the engine running, the temperature will increase to normal

temperature.



### DEF Guage (Diesel Exhaust Fluid)

- DEF reading are in working condition and has adequate levels of fluid.
  - Bus will become inoperable when DEF falls below safe operating levels.
  - DEF should be kept at 50% or higher.



## Lighting Indicators

 Dash indicators illuminate correctly when corresponding lights are turned on.



## Wipers

- Wipers and washers are in working condition.
  - Wipers operate properly at each level when turned on.



#### Fuse Box

- Spare door is securely mounted to the bus.
  - There are no damages or missing parts inside of fuse box.
    - All latches are in working order.



#### Battery Box

- Batteries and wires are secure.
  - Wires are not cut, frayed, or torn.
- There is no excessive corrosion.
- Battery box is properly mounted and not missing any parts.
  - Latches are in working order.
  - Pull-out tray is in working order and free from obstruction.

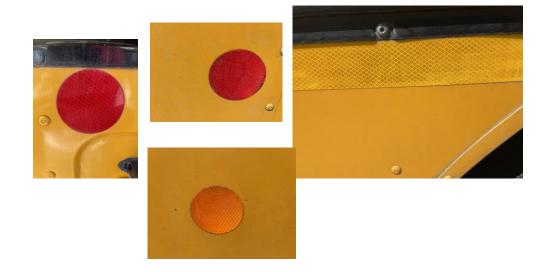


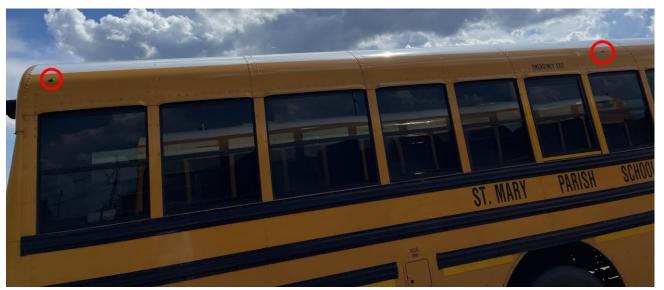
## Lights and Turn Signals/ Reflectors

• All lights are clean and not broken. (remember: red on rear and amber elsewhere.)



 Reflectors and reflector tape are clean, none or missing or broken, and they are the proper color.





#### Side Windows

- Side windows are clear and free of obstruction.
- Glass is in good condition, not cracked or broken.
- No illegal stickers.



#### Side Lettering & Student Decals

- Lettering is visible and not cracked or worn.
- Good in color and clean.









#### Stop Signs

- Both stop signs are mounted securely.
- There are no loose fittings or damaged wires on either stop sign.
- Lenses are proper in color, clean, and not cracked or broken.







## DEF Cap and DEF Tank

- DEF tank is secure to the frame of the bus.
  - There are no cracks or leaks.
  - DEF cap is tight and not leaking
  - DEF door is not missing any hinges and is operational.









## Fuel Door/Tank

- Fuel tank is secured to the frame of the bus.
  - Not cracked or leaking.
- Fuel cap is tight and not leaking
- Fuel door has no missing hinges and is operational.









#### Frame

- There are no cracks or bends in the longitude frame.
- Cross members are not loose, cracked, bent, or broken.
- No breaks or holes in the floor.
- Frame is straight and extends to rear of bus.







#### Exhaust

- Exhaust system is connected tightly, mounted securely, and there are no loose clamps.
- There is no damage or signs of leaking.
  - There is no excessive carbon soot.
  - There is no rust.
- No cracks, holes, or severe dents.
- Exhaust extends to the rear of the bus.

Some buses are equipped with tailpipes that extend to the middle of the bus while others extend to the rear.



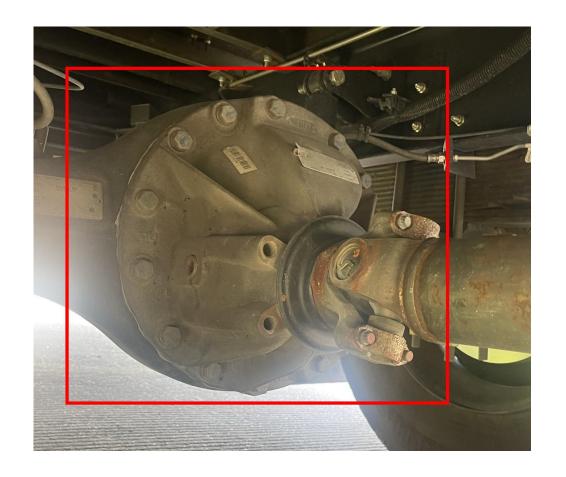
#### Drive Shaft

- Drive shaft is not bent, twisted, or cracked.
- U-joints are secure and free of foreign objects.
  - Shaft is not resting on any hangers.
  - Hangers are properly mounted and missing any parts.



#### Axle Seal

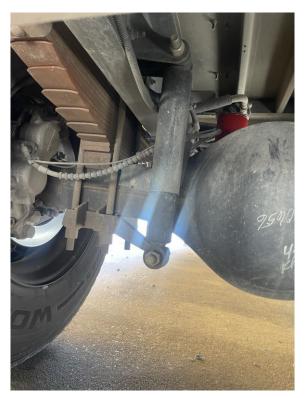
- There are no cracks or distortions in axle seal on the rear axle.
- There are no leaks.



#### Rear Shock Absorbers

- Shock Absorber is securely mounted to the frame of the bus and is not leaking.
- In good condition and not pissing any parts.
- Absorber is not leaking.





#### Torque Spring

 There are no missing parts on the torque spring and is not cracked or damaged.

Bushings are present and not damaged.

Torque Spring is mounted properly.



# Leaf Spring

- Ling Spring links are not missing, cracked, or shifted.
- There are no broken leaf springs.



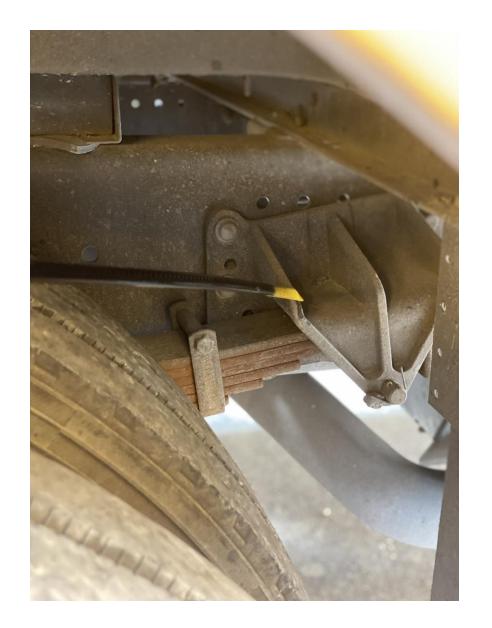
#### **U-Bolts**

- U-Bolts are in good condition.
- Not broken, loose, and no missing parts.



#### Torque Arm

- Torque Arm is in place.
- Not cracked or damages
- No missing or broken bolts.
- No missing or damaged bushings.



#### Brake Lines/ABS

- Lines are not cut frayed or torn.
- Supplies Hydraulic Fluid to brakes.
- Hoses are in good condition and not cracked worn or frayed.
- There are no leaks
- Couplings and fittings are secure.









#### Brake Discs and Lining

- Brake discs are not cracked, bent, or broken.
  - There are no dents are holes.
- Brake pads are in good condition and not worn dangerously thin.
- Brake caliper is securely mounted and in good condition.





## Rear Tires (ICD)

• **Inflation:** The tire is properly inflated, and you would check for proper inflation with a commercial tire gauge.

#### Condition:

- Outside face of the Front tire is in good condition.
- There are no cut or tears.
- Inside face of the tire is in good condition and there are no cuts or tears.
- **Depth:** Tire tread is evenly worn across and there is a minimum of 2/32 of tread depth.



## Spacers

- Spaces are even between rear tires.
- There is no damage or foreign objects in between.



## Rims (rear)

Not damaged or bent.

There are no rust trails that may indicate the rim is loose on the

wheel.

• There are no illegal welds.



#### Lug nuts

- Hub oil seal is securely mounted to the rim.
  - Seal is not leaking and has adequate fluid.

- Lug Nuts
  - All lug nuts are present.
  - Lugs are not loose.
  - There are no receding cracks around lug bolt holes.



#### Valve Stem

- Valve stem is straight and has cap.
  - Stem is not leaking, bent or broken.
  - On rear tires there are two.
  - Both are accessible.





## Side Lights Operation

- Side clearance lights are operational.
- Good in color and not cracked or broken.

(amber in color to middle of bus, red on everything else.)





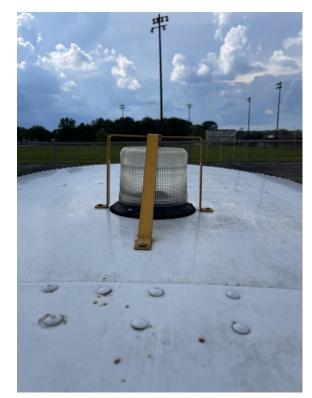
# Splash Guards (Mud Flaps)

- Mud flaps are not missing any parts.
- Flaps are not damaged and are mounted securely.



#### Strobe

- Strobe light is mounted properly and not broken.
  - Some of our buses are equipped with cages over strobe lights.
  - Those with strobe brush guard: brush guard is properly mounted and securely protects strobe light.





#### Rear

- Clearance lights are red in color and not cracked or broken.
- School bus decal is visible and not worn or torn.
- Rear windows are good to see through and not cracked or broken.
- Warning Lights are good in color and not cracked or broken.
- Student decals are good in color and there are no cuts frays or tears.







#### Rear Emergency Door

- Door is not damaged and opens and closes properly.
- Window is not cracked or broken, and the glass is clean.
- Hinges are secure and seals are intact.
- Door holder locks in place and unlocks properly.





## Tailpipe

- Exhaust extends to the rear of the bus and on some buses, the tailpipe extends to the side of the bus.
- There are no obstructions inside and the tailpipe is not resting on any hangers.





## Parking Brake

To set parking brake:

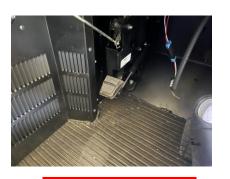
Push down lever with left foot until pushed all the way forward.



**Brake Applied** 

To turn off parking brake:

With service brake applied, pull Parking Brake release handle



Brake Released

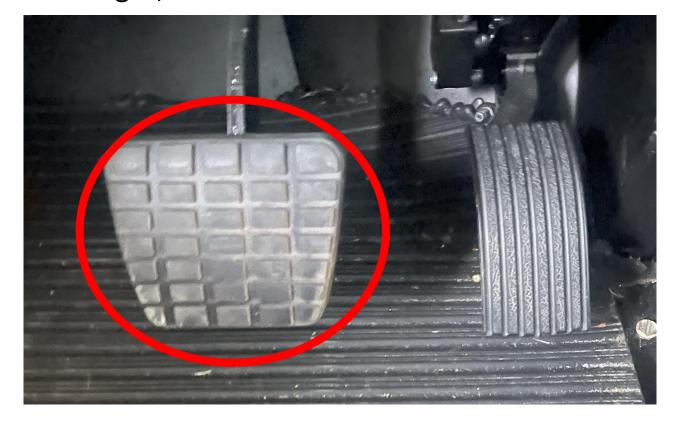


#### Service Brake Test

• Pull the bus forward at 5 mph, then apply the service brake.

• The bus did not pull to the left or right, this indicates that the brakes are

working properly.



#### Front Crossing Arm

- Stop Arm is fully extended and is operational.
  - There are no missing parts
  - Arm is straight and not bent or broken.

