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7 Preventive Maintenance Program

Purpose

All vehicles registered to Canadian Road Builders Inc. are part of the company's Preventive Maintenance Program as per Regulation: AR121/2009, Section 6:

- Trucks, tractors or trailers or a combination of these vehicles operated outside Alberta that has a gross vehicle weight greater than 4,500 kilograms are included in the program.

Canadian Road Builders Inc. acknowledges the value in maintaining their vehicles and equipment to obtain the ultimate safe work environment for the workers and the value in their product and workmanship. All employees must adhere to all applicable regulations, standards and manufacturer's specifications at all times. The following standards shall be adhered to, including but not limited to; O.H&S Act, NSC, Manufacturer's Standards and Specifications. The company achieves this through their Preventative Maintenance Schedule that outlines the daily inspections and regular service of vehicles/equipment. All records shall be kept on file at the main shop in Acheson Alberta for the current year and four calendar years immediately prior to; or for 6 months after the vehicle has been sold, destroyed or returned to the lessor.

Daily Checks The schedule outlines the maintenance for vehicles and equipment enclosed in this section. There are various daily checklists for the equipment and vehicles for Pre-trip and Post-trip recorded by the operator. These daily checks are recorded on the Prorate cards and logbooks or ELD's for vehicles which follow the NSC standard 13 Part 2, schedule 1. Daily equipment and Pre-Trip checks of vehicles shall include checking and recording any deficiencies on a work order or logbook inspection report, DVIR (Driver Vehicle Inspection Report), for repairs or work to be scheduled. The logbook inspection reports and equipment checklists are maintained in the vehicle/equipment files.

Regular Service Part of the company's maintenance program is to ensure that vehicles and equipment retain their safety, dependability and performance. Regular services are performed as set out by their service manuals. The regular services of all units are as follows: - Gas vehicles every 8000 km,- Diesel vehicles every 10,000 km - Equipment 100, 250 hour service according to the type of equipment.

Annual Post Season Service The Company conducts a complete annual service and necessary upgrades of the vehicles and equipment to prepare for the needs of the upcoming season and safety. This entails the complete service review of the unit's components for wear and tear according the specifications.

CVIP Inspection Procedure

Company vehicles over the 4,500 Kg threshold have an annual Commercial Vehicle Inspection Certification conducted to ensure that it meets or exceeds the requirements set out by the National Safety Code Standards for Motor Carriers.

Truck Mounted Attenuator Maintenance

HOIST: Refer to the hoist manual for specific guidelines on operation and maintenance.

Daily:

1. When going to, or coming from, the job site **ensure safety chains are latched** whenever the attenuator is in the up position.
2. Check operation and adjustment of limit switch.
3. Visually inspect system for loose bolts, damaged parts, etc.
4. Check for 12"-14" of ground clearance under nose. Adjust accordingly.
5. Inspect turnbuckles to ensure that lock nuts are tight.
6. Check light system for correct operation.

Weekly:

1. Visually inspect support strut 3/8" shear bolts.
2. Inspect hoist strap and hardware for damage.
3. Inspect latch system and springs.

Monthly:

1. Inspect demarcation markings on nose of system.
2. Inspect caution and warning decals.
3. Inspect frame retainer straps to ensure that bolts are tight and the strap is not damaged.
4. Inspect electrical wiring and plugs.
5. Inspect sideboards and connection hardware.
6. Inspect rip plates attachment hardware.

Six Months:

1. Replace 3/8" shear bolts in support struts with approved bolts.
2. Ensure that all fasteners are secure.

Note: Replacement of 3/8" shear bolts may need to be done more often if unit is subjected to excessive bouncing during operations.

Always document findings on an inspection form.

7.1 - NSC (National Safety Code)

All company drivers must fulfill the following professional practices as outlined in the Canadian Road Builders Inc. policies and the National Safety Code.

Maintain Vehicle Files Canadian Road Builders Inc. maintains a vehicle file for every company commercial vehicle.

Vehicle Files Include

- Identification of each vehicle including a unit number, the manufacturer's serial number, or a similar identifying mark;
- Make and year of each vehicle;
- Records of inspections of each vehicle (including repairs and routine maintenance) and the nature of work performed on the vehicle;
- Copy of annual or semi-annual CVIP inspections for each vehicle that requires one;
- Copy of trip inspection reports that have defects noted;
- Records pertaining to the carrier's maintenance and inspection program.

Preventive Maintenance

All company commercial vehicles will be subject to bi-yearly preventive maintenance inspections when they are activated for use. Most vehicles will receive the bi-yearly inspection from an inspection "A" being completed when it is in for any regular maintenance or repairs. Some inspections may be more frequent for commercial vehicles that may be subjected to abnormal wear and tear due to extreme operating conditions. For these reasons the amount of inspections will far exceed the required Bi-yearly reporting times.

Daily Logs

All effected drivers must complete a daily log.

- A copy of schedule 1 is located in each commercial vehicle. Drivers must produce a schedule 1 when requested by an officer.
- Company employees must submit copies of their daily logs to the Canadian Road Builders Inc. main office in Acheson within 20 days after completing a daily log.
- Copies of daily logs and supporting documentation (fuel receipts, BOL's etc.) must be kept for the previous six months.
- Logs must be completed with all necessary items on them for everyday of each month.
- All company drivers shall not operate any unit without having in their possession copies of their daily logs from the previous 14 days.

Hours of Service

Drivers must not exceed the hours of service dictated by the National Safety Code. Refer to chapter 14, NSC of the CRBI safety manual.

7.2 - Inspections

The Preventive Maintenance Program will be utilized to ensure all maintenance that is to be performed is equal to or exceeds the minimum schedule for regular maintenance and repair specified by the vehicle manufacturer and the National Safety Code commercial standards by qualified personnel only.

Inspections:

- **“C” Inspections:**

CVIP inspections are done on an annually basis prior to the seasonal start up. No regulated commercial vehicle can be operated on a roadway unless it has a valid inspection certificate. This is issued under the Commercial Vehicle Inspection Program (CVIP).

This program applies to:

- Federal registered commercial vehicles that are registered for a gross weight of 4,500 kilograms or more;
- A combination of federal registered commercial vehicles/trailers with a combined weight of 4,500 kilograms or more;
- Any vehicles being towed by an NSC vehicle;
- A vehicle operating under the authority of an Operating Authority Certificate.

- **“A” (NSC Regulated Vehicle & Trailer) Inspections:**

Are completed bi-yearly on all units (including trailers) as per NSC Standard 11. These are documented on the EQUIPMENT SERVICE & REPAIR RECORD and indicated by “A” Inspection being written in the comment section.

Vehicles and equipment are in service from May to November. Due to this the "A - INSPECTIONS" will be performed between June & September of that calendar year.

Drivers are to perform daily pre & post trip inspections in accordance with NSC Standard 13.

What are GVW and TARE weights?

The TARE weight of a vehicle means the weight of the vehicle when it is empty or not carrying cargo.

The GVW of the vehicle means the licensed maximum weight of the vehicle as per the vehicle's certificate of registration.

Maintenance:

Services and regular maintenance of company equipment and vehicles are of upmost importance to the company. The following outlines the schedules utilized to ensure they are kept in the best and safest condition. All maintenance and repairs are documented and filed in the Acheson Shop.

Services are completed at intervals of **8000 km (Gas) & 10,000 km' (diesel)** for all vehicles. Items are documented on Work Orders. "Service" is written in the comments section to indicate it as such.

All equipment is serviced at **100 hrs and/or 250 hrs**, depending on the unit. These are also documented on Work Orders. "Service" is written in the comments section to indicate it as such.

7.3 - Shop Operation Policy

Our policy is that a record will be kept of all preventive maintenance / repairs for each company vehicle or piece of equipment. These records will be updated as required.

It is our intent that at no time will we allow a piece of equipment or vehicle to knowingly leave our shop in such a condition that it does not meet all company rules and outside regulations, for safe operation and accident prevention.

Shop Rules

1. All unsafe shop equipment will be reported to your foreman, superintendent or to the shop personnel, and will be placed out of service until it can be properly repaired or replaced as needed.
2. It is the duty of all employees who witness any and all unsafe work practices to notify the offending party at once. Appropriate steps should then be taken to rectify the unsafe practice or condition.
3. Observe the need for and use of all necessary P.P.E. This includes but is not limited to safety eyewear, face shields, hearing protection. Exhaust hoses and blocking for elevated equipment must be used when required along with lock-out procedures.

7.4 - Field Equipment Policy

It is our intention to institute a program that will carry out our shops safe vehicle/equipment policy into the areas of fieldwork. Our policy is that all the vehicles/equipment that is worked on in the field will be repaired to the same standards as to meet the shop criteria. Field vehicles/equipment will be checked by the operators as per the daily pre/post trip inspection as per NSC standard 13 Part 2, schedule 1 where applicable. Any unsafe conditions will immediately be reported to their supervisor, or superintendent, and documented on a Canadian Road Builders Inc. Work Order form in order for the equipment to be scheduled for repair. All defects found on a NSC regulated vehicle are required to be documented on the Driver's Vehicle Inspection Report by the driver of that unit.

Field Rules

1. All unsafe mobile equipment will be reported to your immediate supervisor and placed out of service until it has been properly repaired as per regulations.
2. It is the duty of all employees who witness any unsafe work practices to notify the offending party and also the immediate supervisor. Appropriate steps should then be taken to rectify the unsafe practice or condition.
3. Observe the need for and use of all necessary P.P.E. This includes but is not limited to safety eyewear, hearing protection. Blocking for elevated equipment and Lock-out procedures must be followed at all times.