

Introduction

This document is designed to review the hazards associated with operating an ATV as well as provide detailed controls to keep people, our equipment and the environment safe.



Training Requirements

Recognized ATV Training Course	Required
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Critical Task Inventory

- Loading and Unloading
- Pre-Trip Inspection
- Basic Operation
- Maintenance
- Carrying Passengers
- Hauling Material
- Pulling a Trailer
- Climbing Slopes
- Descending Slopes
- Traversing Slopes
- Smoking During ATV Operation
- Fire Prevention

PPE Requirements

Image	Description	Standard
	Sturdy Footwear	Required
	Helmet with Chin Strap	Required
	Leather Gloves	Recommended
	Safety Glasses or Goggles	Recommended
	High Visibility Vest	Required when on Active Road

Loading and Unloading

Many accidents occur when loading and unloading ATVs. You can sustain pinched fingers/hands, or even be crushed by the ATV if it slips off the loading ramp.

Hazard Assessment	F	S	P	R
ATV Slips Off Loading Ramp (S)	2	2	2	6
Contact with Bystanders (S)	2	2	2	6
Fuel Spill (S & E)	2	1	3	6
Unsecured During Transport (S)	2	3	2	7



Frequency of Exposure (F)	Severity of Loss (S)	Probability of Loss (P)	F + S + P = Risk Rating (R)
1 = Up to Weekly 2 = Up to Daily 3 = 1+ Times / Day	1=Class C – Minor, non-disabling, non-disruptive 2=Class B – Serious injury or disruptive loss 3=Class A – Major injury, permanent disability or loss	1=Limited chance adverse event will occur 2=Adverse event likely to occur 3=Adverse event likely to occur soon	7 to 9 = High Risk 5 to 6 = Medium Risk 3 to 4 = Low Risk

Type Of Hazard: H = Health (acute or chronic) S = Safety (people and equipment) Q = Quality P = Production E = Environment

Loading and Unloading

Loading

- Set-up the ramps. Attach them to the vehicle. Secure the ramps with ratchet straps so they can't slide out during loading.
- Wear your helmet.
- Keep unnecessary personnel clear of the immediate area.
- Position yourself with each foot on the corresponding foot peg. This helps to ensure even weight distribution.
- Activate the throttle to make sure it is functioning smoothly; you do not want it getting stuck.
- If the brakes are not fully functional, the ATV should be pushed onto the truck, not driven.
- Use first gear to drive up the ramp. Carry a bit of momentum but not too much that you cannot stop within a couple of feet.



Securing the ATV

- To transport, put on handbrake, put in neutral, turn off engine, and shut off the gas.
- Ensure the quad is secured at 4 corners in the back of the vehicle with non-stretch fasteners prior to moving.

Unloading (Experienced Operators)

- Wear your helmet.
- Turn on the gas.
- Start the engine and allow it to slightly warm up while you set-up and secure the ramps.
- Put the ATV in reverse.
- Release the parking brake on the ATV.
- Keep all ground personnel away from the immediate area.
- Keep your weight forward and back down smoothly.

Unloading (Alternate Approach)

An alternative approach is to put the machine in neutral and walk it off the back of the truck.

Pre-Trip Inspection

Complete your pre-trip inspection before any ride or in the evening of the preceding day. If evening inspections are used, if anybody else has operated the ATV since your inspection, it must be inspected again.

Hazard Assessment	F	S	P	R
Running out of Fuel (S)	3	2	2	7
Exposure to Petroleum Product (H)	3	2	2	7
CV Damage (S)	3	2	2	7

Inspection Items

- Oil level
- CV boots (picture) have to tears or punctures.
- Tire pressure
- Brakes (Foot, hand and parking)
- Air coolers / mufflers clear of debris (flammable debris such as peat moss or swamp grass)



Fuel

- Top up the fuel before leaving for work each day.
- Take additional fuel to the work site if necessary.

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Basic Operation

Hazard Assessment	F	S	P	R
Damage to Engine (S)	3	2	2	7
Loss of Control (S)	3	2	2	7
Personal Injury (S)	3	2	2	7

Starting the Engine

- Do not crank the engine more than 10 seconds on each attempt.
- If the engine fails to start after a few seconds, release the starter button. Pause a few seconds before the next attempt. Aggressive starting attempts may cause the starter to heat up and be damaged.

Basic Operation

- Ride at a reasonable speed for your experience, load, and environmental conditions.
- Do not ride fast in unfamiliar territory.
- The maximum permitted speed in any event is 40 km per hour.
- Do not follow closely.

Shifting

- Do not shift gears without releasing the throttle – it is very tough on the transmission.
- Drive in a gear appropriate for the speed. Don't lug the engine in too high of a gear for the speed - shift down. And, don't over-rev the engine – shift up.

Maintenance

Conducting basic maintenance on your ATV can increase its performance and reliability. There are 5 steps to cover:

- General Safety
- Tire Pressure
- Refueling
- Engine Oil
- Air Filters

Hazard Assessment	F	S	P	R
Exposure to Oil or Grease (S & H)	2	1	2	5
Low or Uneven Tire Pressure (S)	2	2	1	5

Maintenance

General Safety

- Avoid conducting maintenance when the engine and exhaust components are hot.
- Wash hands and face prior to eating, drinking and/or smoking.

Tire Pressure

- Use a low-pressure tire gauge when the tires are cold.
- Take two measurements of the tire pressure and use the second reading.
- Pressure must be equal on both sides. Uneven pressure can alter the handling characteristics of the ATV and will place undue stress on the rider's muscles.



Refueling

- Turn off the ATV and make sure there are no other sources of ignition in the area.
- Never refuel within 50 meters of any stream or water body.
- Make sure you fully close any jerry cans used.

Checking and Adding Engine Oil

A complete oil change must be performed after every 50 hours of operation (refer to the vehicle's Daily Inspection Log for the number of accumulated hours.)

- Park the machine on a level surface and warm up engine for several minutes. Shut off.
- Unscrew the dipstick completely and wipe it off with clean rag.
- Rest the dipstick in hole. Note: let unscrewed dipstick just rest on the case thread.
- Pull up dipstick, inspect oil.
- Add oil to maximum level if needed. Do not overfill.

Air Filters

- Air filters need to be inspected frequently – particularly when working in dusty conditions.
- Use solvent to clean air filters – not gasoline.

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Carrying Passengers

Most ATVs can carry only one person safely. "Two-Ups" take the operator plus one passenger.

Hazard Assessment	F	S	P	R
Various Bodily Injuries (S)	2	3	2	7

Controls

- Do not carry passengers unless the machine is designed to do so. There should only be one person per seat on any vehicle.
- Passengers are not permitted in cargo boxes or trailers.
- Passengers must wear all required PPE.
- Reduce speed when transporting passengers.
- Passengers should get off and walk on rough or sloped terrain.



Fire Prevention

ATV's have been known to start forest fires – especially working in muskeg areas during the summer. Flammable material on the cooling fins of the cylinder head and exhaust system can dry out quickly and may result in producing a hot ember that can fall off the ATV and start a fire.

**Prevent
Forest Fires;
Check The
ATV for
Accumulated
Flammable
Debris!**

Task Steps and Hazards	F	S	P	R
Forest Fire (S)	2	3	2	7
Burns (S)	2	2	2	6

Precautionary Measures

- Keep the air fins clear of flammable debris.
- Park on exposed soil whenever possible.
- Wear gloves when removing material from engine or exhaust system to prevent burn injuries.
- During high fire-risk times, fire extinguishers are required on all vehicles.

Hauling Material

Hauling loads will alter the handling characteristics of the ATV and you need to adjust your driving habits accordingly.

Hazard Assessment	F	S	P	R
Loss of Control Due to a Heavy Load (S)	3	2	2	7
Loss of Load (S)	3	2	2	7
Hit by Bungee Cord (S)	3	2	2	7

Securing the Load

- Distribute the load evenly from side to side and with a 60% bias to the rear racks.
- Secure the load with bungee or ratchet straps.
- Replace worn or defective straps.
- It is recommended that you leave your helmet on and wear safety glasses when handling bungee cords as they have a nasty habit of snapping back and hitting you.



Hauling Chainsaws and Fuel

- Make sure the jerry cans are completely closed.
- Saws must have a chain guard in place.
- Strap the saws and the jerry cans securely to the rack.
- If taking extra bar oil, transport the fuel and the bar oil in a milk crate on your rack. Bar oil containers are not suitable for strapping to the rack alone – they get squished and often pop open spilling the oil.

Driving with Loads

Loaded ATVs will handle differently. The heavier the load, the greater the effect.

Loaded ATVs will:

- be harder to steer,
- be less stable on slopes,
- be harder to stop,,
- react more violently to bumps, and
- get stuck more easily.

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Pulling a Trailer

Pulling a trailer requires extra care and attention. A trailer puts extra weight on your vehicle and increases the space you need to drive and stop safely. Trailer safety involves some simple and important rules.

Hazard Assessment	F	S	P	R
Overturning (S)	3	2	2	7
Unexpected Disconnect (S)	3	2	1	6
Personal Injury to Occupants (S)	3	3	2	8

Trailer Safety

- Adjust the ball and clamp if the trailer attachment appears loose or if the trailer comes off.
- Keep the hitch socket clear of mud.
- Never transport passengers in the trailer.
- Keep the heaviest objects low in the trailer.
- Avoid side slopes.
- Travel at slow speeds.
- Back-up slowly – ATV trailers jackknife quickly.



Traversing Slopes

Traversing a slope can cause the ATV to slip and/or rollover.

Hazard Assessment	F	S	P	R
Loss of Traction (S)	3	2	2	7
ATV Rollover (S)	3	2	2	7

Traveling Across Slopes

- Avoid traveling across slopes.
- Maintain your body weight toward the uphill side of the ATV.
- On a slippery or loose surface, you may need to steer slightly uphill to maintain a straight course across the slope.

Making Turns on Slopes

Where possible, avoid making up-slope turns on slopes.



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Climbing Slopes

The riding technique for climbing hills on an ATV involves transferring your weight toward the front of the vehicle, which helps keep the wheels on the ground.

Hazard Assessment	F	S	P	R
Loss of Traction (S)	3	2	2	7
ATV Rollover (S)	3	2	2	7
Contact with Object (S)	3	2	2	7

Inspect

Always check the terrain carefully before you start up any hill.

Limits

- Never climb slopes with excessively slippery or loose surfaces.
- Never go over the top of a hill at speed. An obstacle, sharp drop, another person, or vehicle could be on the other side.

Get Your Weight Forward

- Shift your body forward on the seat and lean forward.
- For maximum weight shift, stand on the foot pegs and lean over handlebars.



Climbing the Hill

- Climb hills with the ATV pointing straight up hill.
- Take a running start in an appropriate gear and speed for the conditions.
- Maintain a steady speed as you ascend the hill without applying sudden power or changing gears to avoid the ATV from overturning.

Descending Slopes

Hazard Assessment	F	S	P	R
Loss of Traction (S)	3	2	2	7
ATV Rollover (S)	3	2	2	7

Precautionary Measures

- Pre-inspect any steep hills before you start driving down.
- Shift down to allow the engine to assist with braking.
- Use both your front and rear brakes to assist with braking.
- Keep your feet on the foot pegs and shift your weight to the rear of the machine.

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