Ice Age National Scenic Trail 8075 Old Sauk Pass Road Cross Plains, WI 53528 Phone: 608-798-8700 NATIONAL PARK SERVICE

## Ice Age National Scenic Trail

# Chainsaw Training, Safety, Maintenance and Operation SOP

Plan Created:	July 30, 2021		
Plan Revised: [Insert Revision Date if Applicable]			
Superintendent Si	gnature of Approval:	Date:	

### **Definitions:**

ANSI American National Standards Institute

**CFR** Code of Federal Regulations

Diameter Breast Height (width of tree trunk at chest level)

**DOI** Department of the Interior

FISTA Forest Industry Safety & Training Alliance

FSM Forest Service Manual

GAR "Green-Amber-Red" risk assessment model from Trail Safe!

IATA Ice Age Trail Alliance

IATR NPS-Ice Age National Scenic Trail

JHA Job Hazard Analysis

Lesson Learned Teaching aid shared with others to avoid repeated mistakes from past injuries or Near Miss

MOA Memorandum of Agreement

NCSP National Chainsaw Safety Plan (the chainsaw policy of the NPS)

Near Miss Reportable incident when someone is nearly injured

NPS National Park Service

NRSTC Nationally Recognized Sawyer Training Course

OF-301A Volunteer Service Agreement used by the NPS and USFS

OSHA Occupational Safety and Health Administration

Park Generic term synonymous with Ice Age National Scenic Trail

PPE Personal Protective Equipment

RM-50B NPS' Reference Manual: Occupation Safety & Health Program

**SOP** Standard Operating Procedure

SPE "Severity X Probability X Exposure" risk assessment model from Trail Safe!

**Swamper** Someone directly assisting a chainsaw operator

Trail Safe! Safety video series for Risk Management and the "human factor" of safety

**UPBBP** Universal Precautions of Blood Borne Pathogens

**USFS** United States Forest Service

### **Purpose:**

It is National Park Service (NPS) policy to provide a safe and healthful workplace for individuals performing chainsaw operations. The purpose of this Standard Operating Procedure (SOP) is to provide the rules and guidelines for operating a chainsaw in non-wildland fire settings within Ice Age National Scenic Trail (IATR). This SOP applies to all volunteers, employees, and partners. Contractors (private sector vendors who are awarded contracts to perform chainsaw work on NPS lands) who are not working directly under NPS Supervision will be required to have an equivalent safety program that is approved by the NPS Contracting Officer. Non-NPS Emergency rescue crews are exempt and are expected to have their own training program and safety requirements.

### **Background and Explanation:**

The route of the Ice Age National Scenic Trail extends for approximately 1,200 miles and crosses numerous land management agency jurisdictions, including NPS (both IATR and St. Croix National Scenic Riverway); USFS (Chequamegon-Nicolet NF); US Fish & Wildlife Service (USFWS) refuges; WI Department of Natural Resources (WIDNR) state parks and forests; numerous county public lands; and various other public and private properties. IATR requires a standardized chainsaw training and certification policy that is transferrable along various trail ownerships. Overall administration of the Ice Age National Scenic Trail is the responsibility of the Secretary of the Interior (National Trails System Act, Public Law 90-543).

There has previously been no NPS national policy, training, or certification program addressing chainsaw certification for non-wildland firefighters. The interagency Wildland Fire community had previously addressed this hazardous operation for Wildland Fire operations through policy and training, but much of the NPS felling operations are conducted by employees and volunteers who are not Wildland Firefighters. IATR policy until now has been to provide volunteers with a one-day chainsaw safety orientation course (FISTA curriculum offered at annual "Ice Age Trail-University" venues), but this training did not provide any official chainsaw certification designation for sawyers. USFS has had chainsaw certification standards in place for non-wildland fire personnel, but until recently those standards were not transferrable to NPS.

In 2016 the US Forest Service finalized its Forest Service Saw Plan (FSM 2350, Sections 2358.01 through 2358.6) found at <a href="https://www.fs.usda.gov/about-agency/regulations-policies/saw-policy">https://www.fs.usda.gov/about-agency/regulations-policies/saw-policy</a>

On April 8, 2019, the NPS' National Chainsaw Safety Program (NCSP) for Non-Wildland Fire Operations was signed, and included in NPS RM 50B, Chapter 15. <a href="https://www.nps.gov/policy/RM50B">https://www.nps.gov/policy/RM50B</a> chainsaw safety.htm

On April 24, 2020, RM 50B was amended to allow *Trail Safe!* as an acceptable substitute to the 16-hour NPS Operational Leadership training required by the NCSP for volunteers of National Historic and Scenic Trails only. The amendment also better clarified the need for "universal precautions" of Blood Borne Pathogens training. See Appendix A.

On March 15, 2021 a Memorandum of Agreement (MOA) was signed between USFS and NPS allowing for reciprocity of approved chainsaw training and certification standards. See Appendix B.

On April 7, 2021, IATR was granted a written Implementation Extension of its chainsaw safety program until October 31, 2022 to allow time for new and existing IATR sawyers to rotate through the new training course(s). See Appendix C.

Refer to the "Continuity of Operations During Implementation Extension" section for important information.

Due to the long distance route of the Trail, the current number of volunteer sawyers (approximately 100-110) and their widespread locations, availability of instructors/evaluators, and considering the logistics and timing of training courses needed to initially stand up and then recurringly recertify sawyers, it is the determination of the Superintendent that <a href="IATR will train">IATR will train</a> and certify sawyers via the Forest Service Saw Plan, while also incorporating elements of the NPS NCSP.

This determination does not preclude IATR from certifying chainsaw operators using standalone NCSP procedures/training standards if deemed beneficial for the park in future circumstances.

### **Chainsaw Certification Steps-- Quick Reference**

- 1. Student registers for upcoming course and submits all pre-requisite materials
- 2. Student attends course; instructor/evaluator completes the evaluation form recommending level of chainsaw certification
- 3. Evaluator provides all evaluation forms to NPS
- 4. NPS fills out the saw certification card; superintendent signs; cards are forwarded to USFS District Ranger
- 5. USFS District Ranger signs saw certification cards, and returns to NPS for distribution
- 6. NPS files electronic copies of all final documents and mails saw certification cards to students

### **Roles and Responsibilities:**

#### Superintendent

The superintendent, or their designee, is responsible for:

- 1. Ensuring compliance with all requirements set forth under this policy, including:
  - a) Training requirements
  - b) Skill competencies
  - c) Safe work practices
- 2. Appointing a Chainsaw Safety Program Manager within the park
- 3. Ensuring chainsaw operators follow USFS and/or NPS chainsaw safety program requirements as outlined in this SOP
- 4. Performing an annual review to ensure compliance with this program
- 5. Signing the chainsaw operator's National Sawyer Certification Card Form FS-2300-53 (see Appendix D) as a Co-Approving Official with the USFS. This authority may be delegated. Signatures are based on receiving the recommendation from the Instructor/ Competency Evaluator stating that the individual has successfully met the competency qualification requirements set forth by this policy
- Forwarding the National Sawyer Certification Card to the USFS District Ranger, Medford-Park Falls District, Chequamegon-Nicolet National Forest for final Co-Approving Official signature, along with all corresponding FSM 2358.3 evaluation forms

#### **USFS District Ranger**

The District Ranger, Medford-Park Falls District, Chequamegon-Nicolet National Forest is responsible for:

- Signing the National Sawyer Certification Cards, and returning them to NPS for distribution to sawyers
- 2. Input information from FSM 2358.3 evaluation forms into the National Sawyer Certification Database if available, or otherwise maintain internal records of qualified sawyers following local Forest policy

#### **Chainsaw Safety Program Manager**

The program manager is responsible for serving as the primary point-of-contact at IATR for the chainsaw safety program. As delegated by the superintendent, the Chainsaw Safety Program Manager may support or assist the superintendent in his/her duties.

Among other duties delegated by the superintendent, the IATR Chainsaw Safety Program Manager will be responsible for:

1. Procuring and providing necessary PPE for sawyers and swampers

- Reporting and investigating all near misses and incidents resulting in injury or property damage according to NPS and Department of the Interior (DOI) policy as well as OSHA regulations, and sharing that information with the USFS if the incident occurred on lands administered by the USFS
- 3. Creating a Lesson Learned paper from the investigation and submit it to the Regional Risk Management Office, and USFS District Ranger as applicable

#### First Line Supervisors/Partner Group

The term "supervisor" is applicable to the IATR Chainsaw Safety Program Manager; and IATA Staff who maintain their chainsaw certification and assist the NPS with overall chainsaw program management, and coordinate volunteer events involving chainsaw work.

Supervisors are responsible for:

- 1. Ensuring that an individual is designated as a "qualified chainsaw operator" (for the specific skill level at which he/she is assigned to perform)
- 2. Ensuring all assigned chainsaw operations are within an operator's skill level
- 3. Ensuring all chainsaw operator qualification cards, CPR and First Aid Certification Cards, and UPBBP training are current
- 4. Taking corrective actions if any unsafe practices are observed
- 5. Reviewing record keeping procedures to determine that up-to-date and accurate records are kept
- 6. Cooperatively plan and schedule training courses in locations and quantities sufficient to ensure program viability

#### **Instructor/Competency Evaluator**

The Instructor/Evaluator is responsible for:

- 1. Instructing at the skill level commensurate with their saw qualifications, to include chainsaw safety, maintenance, complexity assessment, and operations (use)
- 2. Conduct sawyer training using Nationally Recognized Sawyer Training Courses (NRSTC)
- 3. Evaluate sawyers' proficiency in the field using the Sawyer Training and Field Evaluation Form FS-2300-52 (see Appendix E)
- 4. Sign the Sawyer Training and Field Evaluation Form as the sawyer evaluator for sawyers that are determined to have satisfactorily met the requirements for the safe use of saws and recommend them for certification by the certifying official

5. Provide the NPS Superintendent or the designated NPS Chainsaw Safety Program Manager with copies of all completed FS-2300-52 evaluation forms

#### **Chainsaw Operator**

Operators are responsible for:

- 1. Maintaining the correct tools and accessories in good repair before starting any chainsaw operation
- 2. Protecting equipment and tools from damage during transport or use
- 3. Operating chainsaws within their qualification rating (see Appendix F)
- 4. Conducting Risk Analysis and following JHA procedures before and during chainsaw operations (see Appendix G)
- 5. Always enlisting the assistance of a qualified swamper during chainsaw operations
- 6. Helping IATR/IATA to identify swampers in their section of the Trail so that appropriate PPE can be provided to the swampers
- 7. Notifying their first-line supervisor of any chainsaw operation they are not comfortable performing or that is above their ability to perform
- 8. Notifying the first-line supervisor of all chainsaw safety related incidents including injury, property damage, and "near miss" incidents
- 9. Maintaining records of their own required training and qualification/re-qualifications completed
- Presenting verification of current chainsaw certification, and certification in First Aid,
   CPR, and UPBBP training to their first-line supervisor and/or mentor
- 11. Chainsaw operators must be at least 18 years of age

#### **Swampers**

Swampers are responsible for:

- Meeting all pre-requisites before assisting sawyers (OF-301A Volunteer Agreement, currency in First Aid/CPR, and completion of *Trail Safe!* videos)
- 2. Wearing all PPE required of swampers (logger's hard hat with eye and hearing protection, gloves, and sturdy leather boots)
- 3. Following all instructions from the sawyer

4. Assisting the sawyer to maintain control of the operation site and surrounding area

#### **Mentors/Program Growth**

An important component to the growth, and overall success, of the IATR Chainsaw Safety Program is the willingness for sawyers who currently have higher saw qualifications than others to facilitate opportunities for mentoring and skills coaching.

A chainsaw mentor is a sawyer who works with and coaches other certified sawyers having saw qualifications at or below the qualifications of the mentor. Mentoring will assist sawyers to gain additional practice and skills which may allow them to be recommended for a higher saw qualification during subsequent training and evaluation courses conducted by the Instructor/Competency Evaluator.

Mentors shall refer to the charts in Appendix F of this policy to ensure they are coaching other sawyers commensurate with the saw qualifications of all involved.

### **Training Course Scheduling & Rotation**

Chainsaw certification is valid for three years. Courses are capped at 12 students per course. To consistently maintain a cadre of at least 100 qualified sawyers throughout IATR, three to four training courses must be offered each year, and a three year phase-in period completed. Training venues must be established in various geographic locations along the Trail route to minimize volunteer sawyer travel and personal expense. Training venues must also take into consideration the location of most existing IATR sawyers in order to maximize attendance while minimizing volunteer travel needs.

To the extent possible, IATR and IATA will schedule training courses within a 90-mile radius of known populations of existing sawyers (see Appendix H).

To the extent possible, recurring training courses (primarily refresher courses for current sawyers) will return to a previously established training venue three years after the initial course was provided at a particular venue/geographic area. (i.e.: training conducted in Cross Plains, WI in 2021 should again be offered there in 2024 to re-certify those who attended in 2021). Exact training venues may vary due to various factors such as property availability/permission, compliance requirements, etc., but should remain as near to previous venues within a geographic area as possible.

Attrition of existing sawyers will allow for a measured influx of new sawyers to attend upcoming training courses. To the extent possible, sawyers should attempt to receive their recertification within geographic venues where they initially attended, and in years when their expiration dates will occur. This will streamline planning processes and funding requests to

proactively ensure future courses are being offered in predictable manners, and ensure that training opportunities are available where and when needed most.

IATR and IATA may consider offering additional chainsaw skills training in places and at times as funding and logistics allow in order to grow the overall chainsaw program for new sawyer numbers, and offer opportunities for qualified sawyers to improve their skills, attain higher qualification levels, and/or serve as mentors to others.

Training course locations and dates will be determined annually by IATR and IATA, and will be announced to volunteers each year in time for individual planning by those who need to attend to maintain their certification, or those seeking to gain initial certification.

### **Training Application Process**

As training courses are announced and advertised, volunteers will fill out and submit a Chainsaw Training Application to the IATA. This will assist IATA to determine class rosters and create "stand-by" lists. See Appendix I.

### **Training Pre-Requisites**

Prior to being accepted into a chainsaw training course, all sawyers must fulfill the following training pre-requisites and provide verification as noted:

#### OF-301a Individual Volunteer Services Agreement

Volunteers must have a completed and signed Individual Volunteer Agreement on file with the NPS. The form and instructions are available at <a href="https://www.iceagetrail.org/wp-content/uploads/fillable\_individual-301a-updated-packet.pdf">https://www.iceagetrail.org/wp-content/uploads/fillable\_individual-301a-updated-packet.pdf</a>

or https://www.nps.gov/iatr/getinvolved/supportyourpark/iatr\_vip\_program.htm

#### • Trail Safe! Risk Management Videos

Volunteers must view all eight safety videos in order to perform Risk Assessments as outlined below. Email the NPS your participation verification per the instructions found at <a href="https://www.nps.gov/iatr/trail-safe.htm">https://www.nps.gov/iatr/trail-safe.htm</a>. All videos are available through this same link.

#### • First Aid/CPR Certification

Volunteers must always maintain current certification in First Aid and CPR in order to operate chainsaws, and for acceptance into chainsaw training. Training should be attained from a nationally recognized provider such as American Red Cross, American Heart Association, or equivalent.

On-line only training is not sufficient to attain a saw qualification card or to operate a chainsaw. "Blended" courses that comprise a mix of on-line training and in-person skills

training are acceptable. Certification cards that are "provisional" (meaning on-line only) are not sufficient.

(\* Provisional certification is acceptable only to participate in training and evaluation courses, but the sawyer will not be issued a saw card until the skills portion of First Aid/CPR has been completed—nor may the volunteer operate a chainsaw outside of the official training environment until they have met full compliance with First Aid/CPR requirements).

Per Appendix A, First Aid and CPR certification courses must also include "Universal Precautions" of Blood Borne Pathogens (UPBBP). UPBBP (wearing rubber gloves while performing first aid, using barrier masks while performing CPR, etc.) are typically addressed by nationally recognized providers as part of the standard First Aid/CPR training curriculum. There is no requirement to register and pay for the full Blood Borne Pathogens training these vendors may offer. The full Blood Borne Pathogen certification is focused on those who work in the Emergency Medical Field and is not required for chainsaw certification.

Submit copies of your First Aid/CPR certification documentation to IATR and/or IATA.

Submit copies of your First Aid/CPR training receipts directly to IATA for reimbursement of personal expenses.

### **Swamper Qualifications**

Swampers are subject to the same pre-requisites as sawyers. Follow the guidelines above for remaining current with an OF-301a Volunteer Agreement, *Trail Safe!* completion, and current certification in First Aid/CPR.

### **Chainsaw Operator Qualification Levels**

**Taken directly from USFS Saw Policy** 

<u>A Sawyer</u>. An apprentice sawyer who may saw only in the least complex situations or, for training purposes, at the next higher level and in either case only under the immediate supervision of a B or C Sawyer qualified to supervise the work (FSM 2358.1, Appendix F).

<u>B Sawyer – Bucking Only (not applicable in the fire management context)</u>. An intermediate sawyer who may independently buck and limb any size material in moderately complex situations and who may saw at the next higher level, but only under the immediate supervision of a sawyer qualified to supervise the work (FSM 2358.1, Appendix F).

<u>B Sawyer – Felling and Bucking</u>. An intermediate sawyer who may independently fell, buck, and limb any size material in moderately complex situations. This person may saw

at the next higher level under the immediate supervision of a sawyer qualified to supervise the work (FSM 2358.1, Appendix F). This person may also conduct classroom and field training for A and B Sawyers with prior written approval from the Saw Program Coordinator.

<u>C Sawyer – Bucking Only (not applicable in the fire management context)</u>. An advanced sawyer who may independently buck and limb any size material in highly complex situations based on the Regional Saw Program Manager's or Saw Program Coordinator's written recommendation. The recommendation must be supported by demonstrated advanced saw knowledge, skills, and in most cases certification as a B Sawyer (FSM 2358.1, Appendix F). This person may conduct classroom and field training within that person's skill level for A and B Sawyers, and may conduct field proficiency evaluations within that person's skill level for A Sawyers and B Sawyers – Bucking Only.

<u>C Sawyer – Felling and Bucking</u>. An advanced sawyer who may independently fell, buck, and limb any size material in highly complex situations based on the Regional Saw Program Manager's or Saw Program Coordinator's written recommendation. The recommendation must be supported by demonstrated advanced saw knowledge, skills, and in most cases certification as a B Sawyer (FSM 2358.1, Appendix F). This person may conduct classroom, field training, and proficiency evaluations for A and B Sawyers.

<u>C Sawyer Evaluator</u>. An advanced sawyer who may independently fell, buck, and limb any size material in highly complex situations based on the Regional Saw Program Manager's written recommendation. The recommendation must be supported by the successful completion of training on organizing and conducting advanced sawyer evaluation sessions in the field, demonstrated advanced saw knowledge and skills, and in most cases certification as a C Sawyer – Felling and Bucking for at least 3 years (FSM 2358.1, Appendix F). This person may conduct classroom, field training, and proficiency evaluations for sawyers at all certification levels.

## Continuity of Operations During Implementation Extension [Remove this section after October 31, 2022]

In conformance with Appendix C, IATR volunteers who received chainsaw training through IAT-U may continue to operate chainsaws while they await their opportunity to participate in an upcoming chainsaw certification course prior to October 31, 2022, provided that:

- 1. IAT-U chainsaw training must not have already hit it's 3-year expiration date from when the volunteer took that training
- 2. Currency is maintained in First Aid and CPR
- 3. The volunteer has an updated Individual Volunteer Agreement (OF-301a) on file with the NPS and signed by a government representative

- 4. The volunteer has reported watching all Trail Safe! videos to the NPS
- 5. The volunteer is in possession of, and uses, all required PPE in this policy. Volunteers operating chainsaws under this implementation extension should notify the NPS of any needed PPE and it will be mailed to them upon verification that all other pre-requisites have been satisfied
- 6. Volunteers may not continue to operate chainsaws on the Ice Age NST unless these conditions are met

#### Revocation

Revocation processes are initiated by the first-line supervisor and approved by the park superintendent. Revocation of chainsaw operator qualification may occur when:

- 1. An operator has failed to demonstrate appropriate operational procedures resulting in placing themselves or others in danger
- 2. An operator lacks the physical ability to safely undertake cutting activities commensurate with their qualification
- 3. The review of chainsaw-related accidents and near misses reveals the operator was acting outside of their qualification

### **Risk Analysis**:

Prior to beginning each chainsaw operation/task, the crew/operator must perform a risk analysis using the *Trail Safe!* GAR and/or SPE analysis, or similar model, to determine a task rating of:

- a) Low risk
- b) Moderate risk
- c) High risk

Regardless of task rating, all sawyers must still operate within their skill level and certification limitations. Risk Analysis is performed to identify and mitigate hazards.

### **Personal Protective Equipment:**

The intent of PPE is to protect an individual from injury or illness when a hazard cannot be controlled through engineering controls or other more suitable methods. It is the last line of defense.

Sawyers and Swampers will provide their own boots and gloves. The park will provide all other PPE. Refer to JHA #6 (Appendix G) for a list of required and recommended PPE for both Sawyers and Swampers.

Recommended PPE items (belt trauma kit and safety whistle) become mandatory PPE when the Risk Analysis indicates a high risk operation.

### Mandatory First Aid Kit Supplies (29 CFR 1910.266)

The following list sets forth the minimally acceptable number and type of first aid supplies for first aid kits required under paragraph (d)(2) of the logging operations standard (29 CFR 1910.266). The contents of the first aid kit listed should be adequate for small work sites, consisting of approximately two to three individuals. When larger operations or multiple operations are being conducted at the same location, additional first aid kits should be provided at the work site or additional quantities of supplies should be included in the first aid kits:

- 1. Gauze pads (at least 4 x 4 inches).
- 2. Two large gauze pads (at least 8 x 10 inches).
- 3. Box adhesive bandages (Band-Aids).
- 4. One package gauze roller bandage at least 2 inches wide.
- 5. Two triangular bandages.
- 6. Wound cleaning agent such as sealed moistened towelettes or bottles of sterile water.
- 7. Scissors.
- 8. At least one blanket.
- 9. Tweezers.
- 10. Adhesive tape.
- 11. Latex gloves.
- 12. Resuscitation equipment such as resuscitation bag, airway, or pocket mask.
- 13. Two elastic wraps.
- 14. Splint.
- 15. Directions for requesting emergency assistance.

Trauma kit must be kept in a properly labeled container that is organized and kept in a clean and neat condition.

In addition to the supplies listed above, each trauma kit must have a Safety Plan that is filled out at each job.

The park will provide First Aid Kits that meet this standard to all certified sawyers.

### **Appendix A**

#### Trail Safe! and UPBBP Changes to RM 50B



#### United States Department of the Interior

NATIONAL PARK SERVICE 1849 C Street, N.W. Washington, DC 20240

IN REPLY REFER TO: 2430

April 24,2020

Memorandum

To: Regional, Associate, and Assistant Directors

From: Associate Director, Visitor and Resource Protection

JENNIFER FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

Digitally signed by JENNIFER

FLYNN

Digitally signed by JENNIFER

Subject: Changes to Reference Manual 50B, Ch 15. National Chainsaw Safety Program

On April 17, 2019, the National Chainsaw Safety Program was released under Reference Manual 50B, Occupational Safety and Health Program, with an implementation date of May 1, 2020. Over two hundred comments were received from the field and addressed before the policy was released, and the National Park Service's first Servicewide chainsaw policy has been well received. During the last 12 months, members of the Chain Saw Safety Working Group have continued to look for opportunities to make the policy more effective, and to assist parks in implementing effective safety programs around this use. Two requirements that have caused the field difficulty have been identified, and the following changes are incorporated:

- Bloodborne Pathogens Training. The current policy requires all chainsaw operators
  to complete Bloodborne Pathogens (BBP) training. The policy is amended to provide
  clarity that all chainsaw operators must receive training in "universal precautions".
  The concept of 'universal precautions", a component of BBP protection, is addressed
  during required First Aid and CPR training. Supervisors shall ensure First Aid and
  CPR training for employees includes universal precautions.
- 2. Operational Leadership. The current policy requires chainsaw operators to complete the 16-hour NPS Operational Leadership Course. While over 30,000 NPS employees have completed the training, volunteers who work for partner organizations maintaining National Historic and Scenic Trails do not have ready access to this training; therefore, the chainsaw policy has been modified to allow trail volunteers supervised by partner organizations who are a part of the Trails system to complete the NPS "TrailSafe!" risk management training program as an equivalent training to fulfill this requirement. NPS employees and volunteers directly supervised by the NPS must continue to complete the 16-hour Operational Leadership training, but formal risk management training equivalent to the 16-hour Operational Leadership Course is acceptable until newly hired permanent or seasonal employees or volunteers are able to attend the NPS Operational Leadership Course. Regional

Safety Managers and the Office of Risk Management can be consulted for questions regarding equivalent training.

The changes listed above are in effect as of the date of this memorandum, and the new implementation date of the National Chain Saw Safety Program is May 1, 2021.

Please direct questions to Daryl Avery, Branch Chief, Occupational Safety and Health, at daryl avery@nps.gov, or Susan Eaves, Occupational Safety Manager, at susan eaves@nps.gov.

#### Attachments

Cc: (A) Deputy Director, Operations
Deputy Regional Directors
All Superintendents
Chief, Office of Risk Management
Regional Safety and Health Managers
National and Historic Trails Program Manager

### **Appendix B**

#### **NPS-USFS Reciprocity MOA**

#### MEMORANDUM OF AGREEMENT

#### between the

#### UNITED STATES DEPARTMENT OF AGRICULTURE UNITED STATES FOREST SERVICE

#### and the

### UNITED STATES DEPARTMENT OF THE INTERIOR NATIONAL PARK SERVICE

### REGARDING RECIPROCITY OF THEIR SAWYER TRAINING, EVALUATION, AND CERTIFICATION PROGRAMS

#### I. PARTIES

Agriculture (USDA), United States Forest Service (FS) and the United States Department of the Interior (DOI), National Park Service (NPS), collectively referred to as "the Agencies."

#### II. PURPOSE

The purpose of this MOA is to document agreement between the FS and NPS to grant reciprocity to each other's chainsaw and cross cut saw program ("saw program") and to accept sawyer training, evaluation, and certification conducted by the other agency.

#### III. STATEMENT OF MUTUAL BENEFIT AND INTERESTS

National Scenic and National Historic Trails traverse thousands of miles and multiple states throughout the United States across lands managed by NPS, the FS, or other federal or state agencies. The National Trail System is constructed and maintained by federal employees, volunteers, and volunteer and cooperator organizations. Both the FS and NPS require sawyers to be trained, evaluated, and certified in accordance with specific requirements. After reviewing their saw programs as reflected in Attachment A and Attachment B, the FS and NPS have determined they are similar enough to accept sawyer training, evaluation, and certification conducted by the other Agency. Granting reciprocity to each other's saw program will improve efficiency in program administration, particularly in use of chain saws and crosscut saws to construct and maintain segments of national trails, while continuing to ensure competency of sawyers operating chain saws and crosscut saws on lands managed by the Agencies.

#### IV. AUTHORITY

This MOA is executed under the following authorities:

A. Organic Administration Act, 16 U.S.C. § 551.

- B. Organic Act of 1916, 54 U.S.C. §100101 et seq.
- C. Occupational Safety and Health Act of 1970, Sections 6 and 19, 29 U.S.C. §§ 655 and 668.
- D. Executive Order 12196, Occupational Safety and Health Programs for Federal Employees.

#### V. RECIPROCITY OF THE AGENCIES' SAW PROGRAMS

The Agencies have reviewed each other's sawyer training, evaluation, and certification programs as reflected in Attachments A and B and agree that:

- A. While the programs have different processes, the programs are similar, and both ensure the competency of sawyers.
- B. Each Agency will accept the sawyer training, evaluation, and certification conducted under the other Agency's saw program for federal employees, volunteers, and individuals working for a volunteer or cooperator organization in connection with use of chain saws and crosscut saws on lands managed by each Agency.
- C. Individuals operating a chain saw or crosscut saw on lands managed by either Agency:
  - Must carry a valid FS National Sawyer Qualification Card or NPS National Chainsaw Safety Program Qualification Card; and
  - Must be either a federal employee or affiliated with a volunteer or cooperator
    organization authorized to perform the work involving use of a chain saw or crosscut saw
    under an agreement with the Agency that has jurisdiction over the underlying federal lands.

#### VI. GENERAL PROVISIONS

A. Principal Contacts. The principal contacts for this MOA are:

FS Contact	NPS Contact
Pete Duncan	Daryl Avery
National Saw Program Manager	Branch Chief, Occupational Safety
Recreation, Heritage, and	and Health
Volunteer Resources	DOI-National Park Service
USDA-Forest Service	c: 202-768-1490
o: 530-394-8100	daryl_avery@nps.gov
c: 530-394-8100	
pete.duncan@usda.gov	

Any communications by the FS or NPS related to the matters covered by this MOA will be delivered in person, mailed, or transmitted electronically by e-mail or facsimile to the contacts identified above.

- B. <u>Conduct of Activities</u>. The FS and NPS and their respective divisions and offices will handle their own activities and utilize their own resources, including the expenditure of their own funds, in pursuing the objectives of this MOA. Each Agency will carry out its separate activities in a coordinated and mutually beneficial manner.
- C. <u>Non-Fund-Obligating Document</u>. Nothing in this MOA shall obligate either the FS or NPS to obligate or transfer any funds. Specific work projects or activities that involve the transfer of funds, services, or property among the various divisions and offices of the FS or NPS will require execution of separate agreements and be contingent upon the availability of appropriated funds. Such activities must be independently authorized by appropriate statutory authority. This MOA does not provide such authority. Negotiation, execution, and administration of each such agreement must comply with all applicable statutes and regulations.
- D. <u>Lack of Benefit to Members of Congress</u>. Pursuant to 41 U.S.C. § 22, no member of or delegate to Congress may benefit from this MOA, either directly or indirectly.
- E. <u>Enforceability</u>. This MOA is not intended to, and does not create, any right or benefit, substantive or procedural, enforceable at law or equity, by a party against the United States, its agencies, its officers, or any person.
- F. Existing Authority. Nothing in this MOA is intended to alter, limit, or expand the Agencies' statutory and regulatory authority.
- G. <u>Participation in Similar Activities</u>. This MOA in no way restricts either of the Agencies from participating in similar activities with other public or private agencies, organizations, and individuals.
- H. <u>Effective Date</u>, <u>Extension</u>, <u>Amendment</u>, <u>and Termination</u>. This MOA takes effect upon the signature of the FS and NPS and shall remain in effect for five years from the date of execution. This MOA may be extended or amended upon written request of either the FS or NPS and the subsequent written concurrence of the other Agency. Either the FS or NPS may terminate this MOA with a 60-day written notice to the other Agency.

#### VII. SIGNATORIES

By signing below, the respective Agencies certify that the individuals listed in this MOA are their representatives and are authorized to act in their respective areas for matters related to this MOA.

Amanda G. McAdams Digitally signed by Amanda G. McAdams Date: 2021.03.15 05:28:25 - 07:00\*

03/15/2021

Michiko Martin

Director

Recreation Heritage, and Volunteer Resources United States Department of Agriculture

United States Forest Service

JENNIFER FLYNN

Digitally signed by JENNIFER FLYNN Date: 2021.02.26 20:42:30 -05'00'

Date

Jennifer Flynn

Associate Director

Visitor and Resource Protection

United States Department of the Interior

National Park Service

### **Appendix C**

#### **IATR Implementation Extension**



#### United States Department of the Interior

NATIONAL PARK SERVICE 1849 C Street, N.W. Washington, DC 20240

1.C. (2400)

April 7, 2021

#### Memorandum

To: Superintendent, Ice Age National Scenic Trail

JENNIFER

Oglady agreed by JENNIFER FLYN Date: 2021.04.07 (0.00.17 0.007

From: Associate Director, Visitor and Resource Protection FLYNN

Subject: National Chainsaw Safety Program Policy - Implementation Extension

Your waiver request for the implementation of the training-related program elements outlined in Reference Manual 50B, Occupational Safety and Health Program, Chapter 15, National Chainsaw Safety Program, is approved. The full policy implementation deadline for Ice Age National Scenic Trail is now October 31, 2022.

As stated in your waiver request, all other program elements identified in Chapter 15 will follow the Servicewide implementation deadline. If you do achieve full implementation prior to October 31, 2022, please inform the Office of Risk Management.

As requested, the signed Reciprocity Memorandum of Agreement is attached for your reference.

Please direct questions to Daryl Avery, Branch Chief, Occupational Safety and Health, at daryl\_avery@nps.gov or at 202-678-1490.

Attachment: NPS & USFS Memorandum of Agreement, Chainsaw Safety Reciprocity Agreement

Cc: Regional Director, Regions 3, 4, & 5 Chief, Office of Risk Management Chief, Office of Policy Regional Safety Manager, Regions 3, 4, & 5

### **Appendix D**

### **Sawyer Certification Card**



### **Appendix E**

#### **Evaluation Form**

Form FS-2300-52, Sawyer Training and Field Evaluation for Chain Saws Agency/Cooperator Name: Name: Date: Training Location: Address: Classroom: Field: Yes, I permit the Forest Service to share my Sawyer qualifications and e-mail Telephone Number: address with other federal agencies and non-federal organizations so that I can be E-mail Address: contacted about saw project opportunities in my area. \_ Yes No 🗆 Previous Certification: Level Agency/Unit YearFirst Aid/CPR: I certify that I have completed and will maintain first aid and CPR training (initial) BELOW THIS LINE – TO BE COMPLETED B **EVALUATOR** SAFETY EQUIPMENT AN Y/NHard hat G1oves Approved fuel/oil container Eve protection Boots Bar guard Vhatle/radio/cellular telephone Hearing protection Chaps edges Long-sleeved shirt Axe (3-5 1t Tool kit First aid kit Chain s G O ER TIONS TO LI CUTT SAW USE: APPLII SCORE Starting procedure Batip pe (boring) e communication with co-workers Correct body position trol of cutting area Thumb placement Bar tip use (general) ut preparation Chain brake use ING hd RUSHING SCORE Overhead & gro 4d 1 aza. Aysis Limb removal sequence Escape route Spring poles (tension/compression analysis) Kickback recognition Swamp ou BUCKING SCORE SCORE & gound hazard Overhe Wedging procedure Swamp out I work area Bucking sequence Axe use Bind/tension (compression analysis) Kerf observation Use of compound cuts Escape route Kickback recognition Multiple bind situations Privacy Act Statement

Collection and use is covered by Privacy Act System of Records OPM/GOVT-1 and USDA/OP-1, and is consistent with the provisions of 5 USC 552a (Privacy Act of 1974), which authorizes acceptance of the information requested on this form. The data will be used to maintain official records of volunteers of the USDA for the purposes of tort claims and injury compensation. Furnishing this data is voluntary, however, if this form is incomplete, enrollment in the program cannot proceed.

The U.S. Department of Agriculture (USDA) prohibits discrimination in all programs and activities on the basis of race, color, national origin, gender, religion, age, disability, politic beliefs, sexual orientation, and marital or family status. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication program information (Braille, large print, audiotape, etc.) should contact USDA's TARGET Center at 202-720-2600 (voice and TDD).

To file a complaint of discrimination, write USDA, Director, Office of Civil Rights, 1400 Independence Avenue, SW, Washington, DC 20250-9410 or call (800) 795-3272 (voice) or

		FELLING	
SCORE	FELLING AREA	SCORE	FELLING PROCEDURE
	Control of cutting area		Procedure alteration (if necessary)
	Ground & overhead hazard analysis		Wedging procedure
	Positive communication		Use of escape route/safety zone
	FELLING PROCEDURE		Exposure time at stump
	Go/no-go decision/walk away		
	Plumbing of lean (determination of lay)		STUMP A. ALYSIS
	Cutting Plan		Fe ing to desired lay
	Use of gunning sights		nde of cecut
	Undercut/facecut	•	C)*
	Warning shout		Sturm shot
$\perp$	Back cut		Harge/holding wood
	Proper body position/looking up		Other
		<b>%</b> C	<b>%</b>
eight Slope ondition eet from cen COMM		Lee 2 DBH Strecties _ nter If lay I, Technical Ski	Tree 3  Height DBH % Slope Species Condition Feet from center of lay  11s, Awareness, Verbal Skills, Weak-Strong Traits
o Slope ondition eet from cen COMM	DBH	ter f lay Technical Ski	Height DBH Species Condition Feet from center of lay
Slope ondition eet from cen COMM	DBH	ter f lay Technical Ski	Height DBH Species Condition Feet from center of lay lls, Awareness, Verbal Skills, Weak-Strong Traits of Final Approval
Slopeonditioneet from cen	DBH	ter f lay	Height DBH Species Condition Feet from center of lay lls, Awareness, Verbal Skills, Weak-Strong Traits Final Approval C Sawyer – Bucking Only C Sawyer Evaluator

Evaluator's Name \_\_\_\_\_ Evaluator's E-mail Address\_\_\_\_\_

Student's Signature\_\_\_\_\_

### **Appendix F**

## FSM 2358.1: Sawyer Responsibilities and Limitations and Training, Knowledge, and Skill Requirements

#### A Sawyer

May saw only in the least complex situations or, for training purposes, at the next higher level and in either case only under the immediate supervision of a B or C Sawyer qualified to supervise the work.

Sawing activities restricted to brushing, bucking, and limbing and, if specifically noted on the sawyer's National Sawyer Certification Card, felling the least complex, small-diameter trees.

Has successfully completed an NRSTC that introduces general sawing principles, including brushing, bucking, limbing, and felling; has been trained at the introductory level; and has successfully completed a sawyer training and field proficiency evaluation for that level.

The proficiency of A Sawyers is determined by a sawyer evaluator, certified by the certifying official, and documented on the National Sawyer Certification Card. **Formal Instruction:** at least 4 hours

**Demonstrated Field Proficiency:** at least 8 hours

**Total Training:** 12-36 hours

**Prerequisites:** First Aid and CPR

Acquired through formal instruction utilizing one or more NRSTCs, including introduction and review of:

- JHA.
- PPE requirements.
- Saw accidents, near misses, and lessons learned from them.
- Forest Service saw directives (FSM 2358 and FSH 6709.11, sec. 22.48).
- Situation awareness.
- Proper selection, maintenance, and care of saws and other cutting equipment.
- Operational safety.
- Introduction to brushing, bucking, limbing, and felling techniques.
- Proper stance and maintenance of a safe work area.

Developed through hands-on operation of saws and axes.

- Emphasis is placed on situation awareness, correctly selecting and using tools, and saw and axe handling techniques.
- Practices and successfully demonstrates brushing, bucking, and limbing logs of various sizes and in minimally complex situations.
- Introduced to felling in minimally complex situations.
- Demonstrates ability to identify various binds and the proper method and sequence of cuts to safely release them.
- Demonstrates ability to assess when a sawing task exceeds the sawyer's capabilities.

#### Field Evaluation:

Demonstrated application of formal instruction in brushing, bucking, and limbing techniques of least complexity. Demonstrated proficiency in and safe use of a saw in the least complex situations.

## FSM 2358.1: Sawyer Responsibilities and Limitations and Training, Knowledge, and Skill Requirements

#### B Sawyer – Bucking Only

This certification level is not used for fire management activities. There is no Incident Qualification and Certification System (IQCS) equivalent.

May independently buck and limb any size material in moderately complex situations within the restrictions noted on the sawyer's National Sawyer Certification Card.

May saw at the next higher level, but only under the immediate supervision of a sawyer qualified to supervise the work.

May not fell.

Can supervise A Sawyers when they are bucking but not when felling

Has successfully completed an NRSTC covering general saw bucking, limbing, and brushing.

The proficiency of B Sawyers – Bucking Only is determined by a sawyer evaluator, certified by the certifying official, and documented on the National Sawyer Certification Card. **Formal Instruction:** at least 4 hours

**Demonstrated Field Proficiency:** at least 4 hours

**Total Training:** 8-36 hours

**Prerequisites:** First Aid and CPR

Acquired through formal instruction utilizing one or more NRSTCs, which review the topics covered in A Sawyer training and introduce:

- Types of binds and techniques to relieve them.
- In-depth instruction on bucking, limbing, and brushing techniques.
- Identification and evaluation of hazardous bucking situations.
- Proper turndown procedure for cutting situations that exceed the sawyer's abilities.
- Specialized saw uses, as needed.

- Proficient in basic saw skills and use of tools needed for crosscut, axe, and chain saw use.
- Successfully demonstrates techniques for brushing, bucking, and limbing logs of various sizes and in various binds.
- Demonstrates completeness and accuracy of log sizeup, placement of wedges, complexity analysis, and application of safe bucking techniques.
- When using a crosscut saw, proficient in single and double bucking techniques, including clear team communication.
- Demonstrates ability to assess when a sawing task exceeds the sawyer's capabilities.

#### **Field Evaluation:**

Demonstrated application of formal instruction in brushing, bucking, and limbing techniques of moderate complexity. Demonstrated proficiency in and safe use of a saw in moderately complex situations.

## FSM 2358.1: Sawver Responsibilities and Limitations and Training, Knowledge, and Skill

<u>FSM 2358.</u>	<u> 1: Sawyer Responsibili</u>	<u>ities and Limitations and</u>
Requireme	<u>ents</u>	
D. C	May independently fell	Formal Instructions at least
B Sawyer –	May independently fell, buck, and limb any size	Formal Instruction: at least 8 hours
Felling and Bucking	material in moderately	Demonstrated Field
Ducking	complex situations within	Proficiency: at least 12
	the restrictions noted on	hours
	the sawyer's National	Total Training: 20-36 hours
	Sawyer Certification	D D . A 1
	<u>Card.</u>	Prerequisites: First Aid and
	May saw at the next	<u>CPR</u>
	higher level under the	
	immediate supervision of	
	a sawyer qualified to	
	supervise the work.	
	Has successfully	
	completed an NRSTC for	
	general felling and	
	bucking.	
	C	
	Can supervise any A	
	<u>Sawyer.</u>	
	May conduct formal	
	instruction for	
	A and B Sawyers with	
	written approval from the	
	Saw Program	

Coordinator.

May not conduct field proficiency evaluations of

A and B Sawyers.

The proficiency of

B Sawyers - Felling and Bucking is determined by

a sawyer evaluator,

certified by the certifying

official, and documented

on the National Sawyer

Certification Card.

or more NRSTCs, which ncy: at least 12 review the topics covered in A Sawyer training and ing: 20-36 hours introduce: Types of binds and es: First Aid and mitigation techniques. Principles of felling and bucking. In-depth instruction on felling techniques in moderately complex situations. Identification and evaluation of hazardous felling and bucking situations. Proper turndown procedure for cutting situations that exceed the sawyer's abilities. Solutions for hung-up trees. Specialized saw uses, as needed.

Acquired through formal

instruction utilizing one

Proficient in basic saw skills and tools needed for crosscut, axe, and chain saw use. Demonstrates proficiency in all skills listed in B Sawyer -Bucking Only. Demonstrates proper placement of face cuts and back cuts in sound trees, as verified by stump analysis. **Demonstrates** completeness and accuracy in tree size-up, complexity analysis, placement of wedges, undercuts, back cuts, and stump analysis. Proficient in single and double bucking techniques, including clear team communication (crosscut saw only). Demonstrates ability to assess when a sawing task exceeds sawyer's capabilities. Can safely remove hung-up trees of low complexity. Field Evaluation: **Demonstrated** application of formal instruction in brushing/felling/bucking/limbing tech. of moderate complexity. Demonstrated proficiency in/safe use of saw in moderately complex situations.

## FSM 2358.1: Sawyer Responsibilities and Limitations and Training, Knowledge, and Skill Requirements

### C Sawyer – Bucking Only

This certification level is not used for fire management activities. There is no IQCS equivalent.

May independently buck and limb any size material in highly complex situations based on the recommendation of the Regional Saw Program Manager or Saw Program Coordinator, which is supported by demonstrated advanced saw knowledge and skills and, in most cases, certification as a B Sawyer.

Has experience working with C Sawyers in analyzing and implementing safe bucking practices in complex situations. Has demonstrated ability for advanced saw work, advanced understanding of Forest Service saw directives, and ability to teach saw skills to others. Has demonstrated good judgment in assessing complex situations and own skill limitations and in safely completing sawing tasks.

May conduct formal instruction within that person's skill level for A and B Sawyers.

May conduct field proficiency evaluations within their skill level for A Sawyers and B Sawyers – Bucking Only.

The proficiency of C Sawyers – Bucking Only is determined by one sawyer evaluator, certified by the certifying official, and documented on the National Sawyer Certification Card.

Formal Instruction: required; variable

## **Demonstrated Field Proficiency:**variable

**Total Training:** to be determined by sawyer instructor

**Prerequisites:** First Aid and CPR

Acquired through formal instruction that:

- (a) utilizes information gathered and activities designed by the C Sawyer Evaluator that are specifically tailored to local needs; (b) reviews the topics covered in B Sawyer training; and (c) introduces:
- Principles of advanced bucking.
- Advanced bucking techniques.
- Determination of complexity of saw operations.
- Tree health.
- Fiber characteristics.
- Advanced teaching methods and techniques for evaluating A and B Sawyers.

- Proficient in advanced saw skills and tools needed for crosscut saw, axe, and chain saw use.
- Able to communicate knowledge effectively and demonstrate field skills clearly to A and B Sawyers.
- Able to understand, use, and communicate the contents of applicable federal regulations regarding the use of saws in the workplace and Forest Service saw directives to other sawyers and staff.
- Able to complete complex bucking tasks safely, including single and double bucking (crosscut saw only).
- Able to identify defects in danger trees comprehensively and clearly.
- Additional skills may include refinement of various cutting techniques; decision processes for determining the use of saws, rigging, and explosives; and techniques for removing cut logs, such as use of skids and other mechanical means.

#### **Field Evaluation:**

Evaluations may take place during regularly scheduled NRSTCs. Demonstrated application of formal instruction in brushing, bucking, and limbing techniques in highly complex situations. Demonstrated proficiency in and safe use of a saw in highly complex situations.

## FSM 2358.1: Sawyer Responsibilities and Limitations and Training, Knowledge, and Skill Requirements

### C Sawyer – Felling and Bucking

May independently fell, buck, and limb any size material in highly complex situations based on the written recommendation of the Regional Saw Program Manager or Saw Program Coordinator, which is supported by demonstrated advanced saw knowledge and skills and, in most cases, certification as a B Sawyer.

Has experience working with C Sawyers in analyzing and implementing safe felling and bucking practices in complex situations. Has demonstrated ability for advanced saw work, advanced understanding of Forest Service saw directives, and the ability to teach saw skills to others. Has demonstrated good judgment in assessing complex situations and own skill limitations and in safely completing sawing tasks. May conduct formal instruction and proficiency evaluations for A and B Sawyers.

The proficiency of C Sawyers – Felling and Bucking is determined by two sawyer evaluators, certified by the certifying official, and documented on the National Sawyer Certification Card.

Formal Instruction: required; variable

## **Demonstrated Field Proficiency:**variable

**Total Training:** to be determined by sawyer instructor

**Prerequisites:** First Aid and CPR

Acquired through formal instruction that:

- (a) utilizes information gathered and activities designed by the C Sawyer Evaluator that are specifically tailored to local needs; (b) reviews the topics covered in B Sawyer training; and (c) introduces:
- Principles of advanced felling and bucking.
- Advanced felling and bucking techniques.
- Determining complexity of saw operations.
- Tree health.
- Fiber characteristics.
- Advanced teaching methods and techniques for evaluating A and B Sawyers.

- Proficient in advanced saw skills and tools needed for crosscut, axe, and chain saw use.
- Demonstrates proficiency in all skills listed in C Sawyer – Bucking Only.
- Able to communicate knowledge effectively and demonstrate field skills clearly to A and B Sawyers.
- Able to identify defects in danger trees comprehensively and clearly.
- Able to fell trees of a greater diameter than the length of the saw bar (chain saw only).
- Able to fell trees against their natural lean.
- Additional skills may include refinement of various cutting techniques; decision processes for determining the use of saws, rigging, and explosives; and techniques for removing standing trees.

#### **Field Evaluation:**

Evaluations may take place during regularly scheduled NRSTCs. Demonstrated application of formal instruction in brushing, bucking, felling, and limbing techniques in highly complex situations. Demonstrated proficiency in and safe use of a saw in highly complex situations.

#### FSM 2358.1: Sawyer Responsibilities and Limitations and Training, Knowledge, and Skill **Requirements**

#### C Sawyer -**Evaluator**

May independently fell, buck, and limb any size material in highly complex situations.

May conduct formal instruction and proficiency evaluations for all sawyer certification levels.

This certification level is not used for fire management activities. There is no IQCS equivalent.

Has successfully completed training to organize and conduct advanced sawyer certification sessions in the field and has received a recommendation from the Regional Saw Program Manager, which is supported by demonstrated advanced saw knowledge and skills and, in most cases, certification as a C Sawyer - Felling and Bucking for at least 3 years.

Has demonstrated ability for advanced instruction, hazard assessment, and instruction in complex sawing techniques and an advanced understanding of Forest Service saw directives. Has demonstrated good judgment in assessing complex situations and own skill limitations and in safely completing sawing tasks.

The proficiency of C Sawyer Evaluators is determined by the Regional Saw Program Manager (or that person's designee) and another sawyer evaluator, certified by the certifying official, and documented on the National Sawyer Certification Card.

**Formal Instruction:** required

### **Demonstrated Field Proficiency:**

variable

**Total Training:** to be determined by Regional Saw Program Manager (or that person's designee)

**Prerequisites:** First Aid and CPR

Must be recommended for the training by the immediate supervisor, a line officer, or the Saw Program Coordinator.

Acquired through formal instruction that:

- (a) utilizes information gathered and activities designed by the Regional Saw Program Manager (or that person's designee) that are specifically tailored to local needs; (b) may be tailored to the students' needs; and (c) includes:
- Administrative duties and responsibilities.
- Advanced teaching methods and techniques for evaluating A, B, and C Sawyers.

- Able to effectively demonstrate and teach advanced sawing techniques, field skills, and hazard assessment decisionmaking processes.
- Able to understand, use, and communicate applicable federal regulations regarding the use of saws in the workplace and Forest Service saw directives to other sawyers and staff.

#### **Field Evaluation:**

Evaluations may take place during regularly scheduled C Sawyer NRSTCs. Demonstrated knowledge of techniques for providing instruction in brushing, bucking, felling, and limbing techniques in highly complex situations. Demonstrated ability to provide instruction in safe use of a saw in highly complex situations.

### **Appendix G**

JOB HAZARD ANALYSIS (JHA): Ice Age National Scenic Trail

Chainsaw Operations: IATR-06	
Analysis By: Daniel W. Watson, VIP Coordinator	

Approved By: Eric Gabriel, Superintendent

**Required Personal Protective Equipment (PPE)**: Hard Hat (ANSI Z89.1 compliant), Sturdy leather (cut-resistant) Boots, leather or other sturdy Work Gloves, Eye Protection/Face Shield (ANSI Z87.1 compliant), Hearing Protection (ear muffs, plugs, or a combination), Saw Chaps (meets or exceeds USFS 6170-4F), Weather-Appropriate Shirt & Long Pants

Recommended Additional PPE: Blood Stopper Belt Trauma Kit, Safety Whistle

**Tools and Equipment**: Chainsaw, Saw Kit, Fuel & Bar Oil, Logger's First Aid Kit (meets 29 CFR 1910.266), Cellular Phone or Two-Way Radio

**Required Standards and General Notes:** Chainsaw Operators must possess a valid National Sawyer Certification Card. Chainsaw operations always involve at least two people for safety enhancement. Sawyers and Swampers maintain currency in First Aid/CPR, *Trail Safe!* videos, and an approved OF-301A Volunteer Services Agreement

Sequence of Job Steps	Potential Hazards/ Injury	Safe Action or Procedure
	Sources	
Certification/Training	Various potential injuries due to	Complete approved chainsaw operator
	operating saw outside of	training (NRSTP); operate chainsaw
	skill/training level	within certification parameters
Risk Management Analysis	Site-Specific Hazards	Identify site-specific hazards
		associated with each saw operation,
		mitigate hazards or stop work until
		safety concerns are addressed. Utilize
		Trail Safe! risk analysis tools
		(SPE/GAR) to determine Low,
		Moderate, or High Risk
Fueling	Fire from gas spilled on muffler	Let saw cool before refueling.
8	or other ignition source; fuel	
	geysering; damage to equipment	Fuel on bare ground, use funnels.
	from improperly labeled fuel	5 , , , , , , , , , , , , , , , , , , ,

<sup>\*</sup> Swampers also required to wear identified PPE, minus chaps

	containers	No smoking during refueling, or during chainsaw operations (includes vaping and e-cigarettes)  Move at least 10 feet away from fueling site before starting saw.  Replace excessively gas/oil-soaked gloves.  Mix fuel in well ventilated area.  Clean up spills promptly.  Gasoline will be stored in approved containers or Department of Transportation (DOT) approved containers in quantities of 5 gallons or less. "Approved" containers are tested and certified by a nationally recognized testing laboratory (NRTL) such as Underwriters Laboratory (UL) or Factory Mutual Engineering Corp (FM). Approved containers will be marked or labeled with the UL or FM label. A safety can is a common type of approved container with a flash arresting screen, spring-closing lid and spout cover, and so designed that it will safely relieve internal pressure when subjected to fire exposure.  Clearly mark fuel containers that have gas/oil mix ratio.
Saw Maintenance	Fatigue/injury from improper saw maintenance	Keep saw sharpened.  Keep idle adjusted properly.  Inspect for bar wear/proper chain tension.  Take frequent rest breaks.
Sharpening Chain	Cuts to hands	Wear gloves when sharpening chain.  Use vise if available.  Never file chain while saw is running.

Transporting Saw	Injury due to falls while carrying saw	Always employ chain guard (scabbard) whenever saw is not in operation.
All Sawing Maneuvers	Cuts to body, various reasons	Wear all PPE (chaps, gloves, boots, etc.).
		Drop-starting a chainsaw is prohibited. A chainsaw must be started with the chain brake engaged and the operator holding the saw firmly in a manner that minimizes movement of the saw when pulling the starter handle.
		Chainsaws may not be operated unless the manufacturer's safety devices are in proper working order. Chainsaw safety devices may not be removed or modified.
		The chain brake must be engaged or the engine shut off if it is carried more than two steps.
		In manual tree felling operations, notches (face cuts) must be used on all trees and trunks greater than 5 inches in DBH.
		Check chain tension periodically to avoid "throwing" chain.
		When more than one individual is limbing or bucking a tree, each is positioned and their duties organized so the actions of one individual will not create a hazard for the other individual.
		Chainsaw engines must be started and operated at a 10-foot minimum distance from other individuals.
Felling *Securing Felling Area	Others being struck by trees/limbs/debris	The sawyer has the responsibility and authority to identify, secure, and manage the felling area.  A MINIMUM OF 2.5 TIMES THE

HEIGHT OF MATERIAL BEING FELLED IN ALL DIRECTIONS MUST BE SECURED. Note: This requirement does not apply in the presence of site restrictions, such as waterways or cliffs. Other individuals must be beyond a tree's striking range and at a distance as close to twice the tree's height as practical

No one is allowed inside secured felling area without authorization of the sawyer.

Additionally, the entire downhill side will be included in the secure area on hillsides with steep slopes where material can roll for long, unpredictable distances.

Establish a safe zone outside secured area where everyone remains until felling is completed and the sawyer signals "all clear."

Position lookouts on all trails and roads entering the secured felling area.

Before leaving the secured felling area, the sawyer must ensure that no hazards remain such as hang ups, unstable logs, or other dangers.

It is the responsibility of the work leader and other volunteer workers to understand and follow these established standards, and to follow the direction of the sawyer.

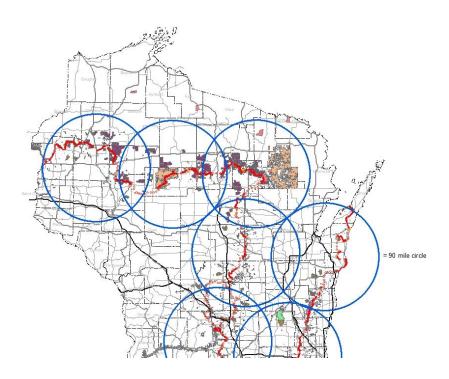
At times when Risk Assessments are elevated due to more complex operations, especially when chainsaw operations are part of a larger overall event with multiple workers moving through an area, the sawyer should enlist the help of another qualified sawyer (person of appropriate skills and knowledge) to serve as an overall lookout to maintain control of the

		secured area, allowing the active sawyer and swamper team to more fully focus on their immediate tasks, thus mitigating the chance of unapproved others entering the secured area.
Saw Certification & Working within the Felling Area	Other crew members observing felling procedures	Make sure all trainees are aware of which tree is to be felled and what direction it is planned to fall.  Point out identified hazards from size up.  It is the sawyer's discretion to allow trainees within the 2-tree lengths to observe felling, but regardless, maintain safe distance and established escape route.  All observers must remain quiet during felling.
Medical Emergencies	Personal injury or illness	All sawyers & swampers will maintain current First Aid/CPR training, and all saw work will be performed by sawyer/swamper buddy-system teams.  Each operation must include a "safety station" within 100 feet of the work zone that contains a logger's first aid kit meeting paragraph (d)(2) of the logging standard 29 CFR 1910.266(e)(1) and (e)(2), Logging Operations.  The safety station shall include "Site Safety Plan" information available to all people on site denoting the location of the work site (physical address, Lat/Long, GPS coordinates, or other appropriate locator info) and the name, address, and phone number of the nearest medical facility. IATA "Safety Net" documentation is sufficient for this purpose at larger sponsored work events. It is recommended that the Site Safety Plan be kept inside the logger's first aid kit within the safety station.

	Each logger's first aid kit comes with an "Emergency Assistance Instructions" card that should be filled out to satisfy this requirement.
	Communications to request advanced emergency medical treatment must be provided for (cellular phones/radios, etc.).

### **Appendix H**

### Training Venue Radius Map



### Appendix I



### 2021 NPS Volunteer Sawyer Training Application

Open to Active IATA Members

Your Name:	E-MAIL:
Street Address:	City, State, Zip:
Day Telephone:	Cell or Evening Telephone:
Are you a member of the Alliance?	Yes No
Are you currently First Aid / CPR Certified?	Yes No
Have you completed the "Trail Safe" online	safety training? Yes No
How many times have you used a chainsaw	v in the last year? 0 1-4 5-9 10+
Will use your own chainsaw and PPE – chaps hearing protection – for this training?	s, cut resistant safety boots, helmet w/eye & Yes No
If not using your chainsaw & PPE, what lengt belt line to about 2" below the boot top (not	h of chaps do you need as measured from the an inseam measurement)? 32" 36" 40"
Emergency Contact Name and Telephone:	
· · · — —	
Do you actively volunteer with the Alliance?	Please describe:
Planes list any valous white in in a such as Co	was of Lauring Craw Lauring and Skills or
otherwise, you have completed in the last 3	ame of Logging, Crew Leadership and Skills or years:
Places complete and veture (ampilie professed)	this faces to be adding a sector if one as a solitor.

Please complete and return (email is preferred) this form to <a href="mailto:brad@iceagetrail.org">brad@iceagetrail.org</a> or mail to: Ice Age Trail Alliance, 2110 Main Street, Cross Plains, WI 53528, attention Brad Crary

This is an application and not an approval for the training. Limited space is available for each class. Individuals will be notified of acceptance to the training.