

**From:** "Mckinney.Kris" <Kris.McKinney@we-energies.com>  
**To:** "Stacey Imboden" <SXF@nrc.gov>  
**Date:** 12/2/04 12:40PM  
**Subject:** RE: ATC Right of Way Maintenance

Stacey - Per your earlier request, please consider this response, with the note below from Terry Yakich of ATC, as verification that the ROW clearing specification document provided by ATC to ANL is not proprietary. Please let me know if you need anything else.

Kris

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**From:** Yakich, Terrence [mailto:tyakich@atcllc.com]  
**Sent:** Wednesday, December 01, 2004 5:05 PM  
**To:** Mckinney.Kris; Krumenauer, Matt  
**Cc:** Knorr.Jim (NMC)  
**Subject:** RE: ATC Right of Way Maintenance

Kris - I spoke with Matt and he verified that the ROW clearing specification that he submitted to Mr. Vinikour can be added to your docket. Please consider this as our written approval.

Terry

-----Original Message-----

**From:** Mckinney.Kris [mailto:Kris.McKinney@we-energies.com]  
**Sent:** Wednesday, December 01, 2004 2:37 PM  
**To:** Krumenauer, Matt  
**Cc:** Yakich, Terrence; Knorr.Jim (NMC)  
**Subject:** FW: ATC Right of Way Maintenance

NRC contacted me to confirm that your sending the attached document to their contractor represents your written approval that the document can be added to the docket for preparation of the draft SEIS for Point Beach License Renewal. Please confirm, either by phone or response to this e-mail, whether my interpretation is correct. Thank you for your attention to this matter.

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**From:** Vinikour, William S. [mailto:vinikour@anl.gov]  
**Sent:** Monday, November 22, 2004 1:32 PM  
**To:** Stacey Imboden; James Wilson  
**Cc:** u106924@lanl.gov; sloftin@lanl.gov  
**Subject:** FW: ATC Right of Way Maintenance

Stacey and Jim:

I contacted ATC to obtain some background information on their right-of-way practices at stream crossings. Matt Krumenauer from ATC sent me the e-mail below and the attached ATC ROW Clearing Specifications. I will be citing both of these (the e-mail as a footnote). Therefore, if necessary, please add this e-mail and the ATC

ROW Clearing Specification report to the docket. Sam may also find some of the information in the specifications of use when revising the BA.

Bill

-----  
William S. Vinikour  
Environmental Scientist  
Environmental Assessment Division  
Argonne National Laboratory  
9700 S. Cass Ave., Building 900  
Argonne, IL 60439  
Voice: 630-252-5419  
Fax: 630-252-6090  
E-mail: vinikour@anl.gov  
-----

-----Original Message-----

From: Krumenauer, Matt [mailto:mkrumenauer@atcllc.com]  
Sent: Monday, November 22, 2004 11:09 AM  
To: Krumenauer, Matt; Vinikour, William S.  
Subject: RE: ATC Right of Way Maintenance

I have attached the spec in this e-mail

-----Original Message-----

From: Krumenauer, Matt  
Sent: Monday, November 22, 2004 11:08 AM  
To: 'vinikour@anl.gov'  
Subject: ATC Right of Way Maintenance  
Mr. Vinikour,

In response to your information request I would like to provide the following information about American Transmission Company LLC vegetation practices on the transmission lines that are associated with the Point Beach Nuclear Plant.

ATC follows a Integrated Vegetation Management Plan that is detailed in the attached Transmission Line Right-of-Way Forestry Specification.

ATC maintenance practices at stream crossings are done to avoid impact to the existing waterway channels or shorelines. ATC contractors only use established crossings unless proper permits have been obtained prior to the activities.

Please feel free to contact me to discuss ATC maintenance practices further.

Have a great day.

Matt Krumenauer  
Environmental Project Manager  
920-338-6545

-----Original Message-----

[mailto:vinikour@anl.gov]

From: Vinikour, William S.

Sent: Sunday, November 21, 2004 8:30 AM

To: Info

Subject: Right-of-way maintenance

To Whom It May Concern:

I am currently working on the supplemental environmental impact statement for relicensing of the Point Beach Nuclear Plant. The transmission lines that leave the plant are owned and maintained by your company. I would appreciate it if you could provide me with information on your maintenance practices at stream crossings. A summary would be sufficient (e.g., ATC uses procedures to minimize erosion and shoreline disturbance while encouraging vegetative cover).

I wish to thank you in advance for any information you can provide.

William Vinikour

~~~~~  
William S.Vinikour  
Environmental Scientist  
Environmental Assessment Division  
Argonne National Laboratory  
9700 S. Cass Ave., Building 900  
Argonne, IL 60439  
Voice: 630-252-5419  
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E-mail: vinikour@anl.gov  
~~~~~

CC: "Knorr,Jim (NMC)" <jim.knorr@nmcco.com>, "Yakich, Terrence" <tyakich@atcllc.com>, "Krumenauer, Matt" <mkrumenauer@atcllc.com>

**Mail Envelope Properties** (41AF5361.C3C : 7 : 15420)

**Subject:** RE: ATC Right of Way Maintenance  
**Creation Date:** 12/2/04 12:36PM  
**From:** "Mckinney.Kris" <Kris.McKinney@we-energies.com>

**Created By:** Kris.McKinney@we-energies.com

**Recipients**

nrc.gov

owf4\_po.OWFN\_DO  
 SXF (Stacey Imboden)

atcllc.com

mkrumenauer CC (Matt Krumenauer)  
 tyakich CC (Terrence Yakich)

nmcco.com

jim.knorr CC (Knorr.Jim (NMC))

**Post Office**

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**Route**


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 nmcco.com

<b>Files</b>	<b>Size</b>	<b>Date &amp; Time</b>
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TEXT.htm	24283	
Mime.822	32882	

**Options**

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**Concealed Subject:** No  
**Security:** Standard

		Instruction Number:
ATC Operating Instruction		Revision: 1
TITLE:	TRANSMISSION LINE RIGHT-OF-WAY FORESTRY SPECIFICATION	Page 1 of 24

## Transmission Line Right-of-Way Forestry Specification

### TABLE OF CONTENTS

<u>SECTION</u>		<u>PAGE</u>
1.0	SPECIFICATION DATA SHEET .....	3
2.0	GENERAL .....	4
2.1	Scope .....	4
2.2	Contractor Requirements.....	4
2.3	Personnel Qualifications.....	5
2.4	Permits.....	5
2.5	Right-of-Way Rights, Access and Obstructions .....	5
2.6	Workmanship and Damages.....	6
2.7	Controversies.....	6
2.8	Settlement of Damage Claims .....	6
2.9	Quality Control.....	6
2.10	Rights-of-Way Clearing Widths .....	7
3.0	NOTIFICATIONS.....	7
3.1	General .....	7
3.2	Property Owner.....	7

<b>Effective Date</b> <b>May 01, 2004</b>
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<b>Originator:</b>  <p style="text-align: center;">Scott Schartner Transmission Line Maintenance Support Engineer</p>	<b>Approved by:</b>  <p style="text-align: center;">Rodney Ellifson Manager, Maintenance &amp; Inspection</p>
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**This document is proprietary and confidential to ATC. Review or use by any other party is prohibited without the written consent of ATC.**

**Revised:**

*File Operating Instruction – In-Service Wood Pole Inspection and Remedial Treatment Specifications*

**CAUTION:** Any hard copy reproductions of this policy should be verified against the on-line system for current revisions.

3.3	System Operation .....	8
4.0	<b>SCHEDULING OF WORK .....</b>	<b>8</b>
4.1	General .....	8
5.0	<b>INTEGRATED VEGETATION MAINTENANCE TECHNIQUES .....</b>	<b>9</b>
5.1	General .....	9
5.2	Definitions .....	9
	<b>Figure 1 - Illustration of Wire Zone and Border Zone on a Transmission ROW</b>	<b>10</b>
5.3	Selective Hand Cutting .....	11
5.4	Disposal of Hand Cut Material .....	11
5.5	Mowing .....	12
5.6	Broadcast Foliar Application .....	12
5.7	Broadcast Soil-active Application .....	13
5.8	Selective Foliar Application .....	13
5.9	Selective Basal Applications .....	14
5.10	Cut Stump Treatment .....	14
6.0	<b>GENERAL REQUIREMENTS AND PRECAUTIONS FOR HERBICIDE APPLICATIONS.....</b>	<b>15</b>
6.1	General Restrictions and Requirements .....	15
6.2	Restrictions to Chemical Use .....	16
6.3	Spill Prevention.....	16
6.4	Proper Equipment.....	16
7.0	<b>TRIMMING PROCEDURES .....</b>	<b>17</b>
7.1	General .....	17
7.2	Oak Trimming.....	17
7.3	Danger/Hazard Trees .....	17
7.4	Crew Caused Outage.....	18
7.5	Distribution Underbuild Clearance Requirements.....	18
8.0	<b>TRANSMISSION LINE RIGHT-OF-WAY RECORDS .....</b>	<b>18</b>
8.1	Data Collection and Forms .....	18
8.2	Right-of-Way Clearing Detail Reports .....	19
8.3	Property Owner Notification/Contact Record.....	19
8.4	Bi-Weekly Right-of-Way Clearing Crew Summary .....	19
8.5	Year to Date Right-of-Way Clearing Summary .....	19
8.6	End of Project Right-of-Way Clearing Summary.....	20
APPENDIX A	.....	21
	<b>LIST OF DESIRABLE SPECIES THAT MAY BE RETAINED IN THE "BORDER ZONES" .....</b>	<b>21</b>
	<b>LIST OF UNDESIRABLE SPECIES TO BE REMOVED FROM THE WIRE ZONE AND BORDER ZONE. ....</b>	<b>22</b>
	<b>(NOTE: THIS LISTING MAY NOT BE ALL INCLUSIVE.) .....</b>	<b>22</b>
	<b>LIST OF TALL GROWING INVASIVE SPECIES TO BE REMOVED FROM THE WIRE ZONE AND BORDER ZONE. ....</b>	<b>23</b>
	<b>LIST OF LOW GROWING INVASIVE SPECIES TO BE REMOVED FROM WIRE ZONE (EXCEPT WHEN IN LANDSCAPE PLANTINGS).....</b>	<b>23</b>
APPENDIX B	.....	24

## 1.0 SPECIFICATION DATA SHEET

SPECIFICATION TITLE: Transmission Line Right-of-Way Clearing Specification

SPECIFICATION NUMBER:

Pursuant to the terms and conditions of the Agreement executed and made effective as of May \_\_, 2003 by and between American Transmission Company LLC (ATC) and, \_\_\_\_\_ ("Contractor"), (ATC) hereby requests that Contractor supply qualified and competent personnel, equipment, materials and supplies necessary to perform the following Services:

ATC PROJECT NUMBER:

ATC PROJECT ADMINISTRATOR:

ATC TRANSMISSION LINE SPECIALIST:

CONSTRUCTION REPRESENTATIVE:

DESCRIPTION OF WORK:

START WORK:

COMPLETE WORK:

APPROVED BY:

\_\_\_\_\_  
ATC Transmission Line Specialist

## 2.0 GENERAL

### 2.1 Scope

- 2.1.1 This specification describes right-of-way clearing, maintenance and planned forestry work (hereinafter referred to as the "Services") associated with ATC's transmission line right-of-way corridors.
- 2.1.2 ATC's present work plan is to maintain the transmission line right-of-ways approximately every three (3) years in urban areas, and approximately every five (5) years in rural areas.

### 2.2 Contractor Requirements

- 2.2.1 Contractor shall furnish all supervision, labor, tools, equipment, report forms, maintenance vehicular equipment, transportation and material necessary for the transmission line right-of-way clearing or maintenance. ATC will furnish copies of this specification and the necessary maps for identifying the locations of the transmission lines for which right-of-way clearance is required.
- 2.2.2 Contractor must comply with all provisions in this Transmission Line Right-of-Way Clearing Specification, and the most current revision of ANSI Z133.1.
- 2.2.3 Contractor is required to have experience in the transmission line right-of-way clearance, and will be expected to provide the names and addresses of at least 4 references for which this type of work has been performed.
- 2.2.4 Contractor must comply with all laws and regulations, take all necessary precautions to protect the safety of employees and to prevent accidents or injury to persons on, about, or adjacent to the premises where the Services are being performed. Contractor must comply with all applicable provisions including but not limited to Federal, State, and local laws and regulations including, but not limited to, EPA, OSHA, and DOT regulations.
- 2.2.5 Contractor shall provide ATC with 24-hour emergency call-out assistance throughout the entire year. Contractor must be capable of providing sufficient resources for emergency response.
- 2.2.6 Contractor's personnel will observe ATC facilities in the vicinity where Services are performed. Any facility anomalies observed, including but not limited to broken, loose or worn poles, wires or structures shall be reported to the ATC Transmission Line Specialist. Anomalies that would appear to pose a threat to persons, property or the electric transmission system shall be reported by telephone immediately to the ATC Transmission Line Specialist. Anomalies that do not appear to pose a threat to persons, property or the electric transmission system shall be reported in Contractor's bi-weekly Right-of-Way Detail Report.
- 2.2.7 Contractor personnel shall abide by all terms and conditions of ATC's Karner Blue Habitat Conservation Plan. The plan can be obtained through the ATC Environmental Department (Matt Krumenauer: Office (920) 338-6545, Mobile (920) 360-3325).

- 2.2.8 For projects located in Milwaukee, Waukesha, Washington, and Ozaukee counties, the contractor shall contact the ATC Environmental Department (Terry Yakich: Office (262) 506-6865, Mobile (262) 424-9357) for information regarding possible impacts to Butler's Garter Snake and any necessary restrictions to minimize those impacts.

## **2.3 Personnel Qualifications**

- 2.3.1 All personnel assigned to perform right-of-way maintenance and forestry services for ATC must be "Qualified Personnel," "Qualified Line-Clearance Arborists" or, "Qualified Line-Clearance Arborist Trainees" as required to perform the Services and as defined in ANSI Z133.1. Personnel shall be instructed and shall follow all provisions in ANSI Z133.1 relative to work performed in proximity to electrical lines and hazards, and staffing shall be consistent with such standard.
- 2.3.2 Supervision of all Services shall be performed using Qualified Personnel as defined in ANSI Z133.1, who are full-time supervisors with at least 2 years of field experience in the clearing of transmission line right-of-ways.

## **2.4 Permits**

- 2.4.1 Contractor shall be responsible for obtaining all licenses and permits necessary for the performance of the Services.

## **2.5 Right-of-Way Rights, Access and Obstructions**

- 2.5.1 Contractor shall confirm all easement and license rights prior to performing any Services, and shall not use lands beyond the easement or license boundaries for any purpose, including ingress or egress, without the written consent of the landowner.
- 2.5.2 Contractor shall determine the best means of access to the site. Existing roads are to be utilized for access whenever possible. Use of private roads and off right-of-way access requires the written consent of the property owner. Contractor shall not negotiate a fee of any kind for access to existing right-of-way. Contractor is responsible for all damages to public and private roads and properties, including damage to crops and fences.
- 2.5.3 Contractor shall limit vehicular and equipment travel within the right-of-way strip and to as narrow a passageway as practicable.
- 2.5.4 Contractor shall take all necessary precautions to avoid damage to plantings and visual screens, and if possible, use adjacent vacant property over which the easement extends for access to sites.
- 2.5.5 When a waterway/wetland crossing is necessary, Contractor shall use established crossings of the waterway. Contractor shall not disturb the existing waterway channels or shorelines. If the use of motorized vehicular equipment to cross a waterway/wetland without an established and approved crossing cannot be avoided, Contractor must obtain all proper permits in advance, and provide the appropriate ATC Transmission Line Specialist with written notice prior to proceeding.

- 2.5.6 Contractor shall close or replace all fences it opens or removes during performance of the Services.

## **2.6 Workmanship and Damages**

- 2.6.1 All work shall be performed in a workmanlike manner, in accordance with this specification and all applicable Federal, State and local laws and regulations. Contractor shall at all times exercise care to prevent injury to any persons and property.
- 2.6.2 Contractor shall be responsible for all damages to persons, and restoration of property caused during the performance of the Services.
- 2.6.3 Contractor must repair and restore to their original condition, any fences that have been taken down and roadways that have been used to provide access to a work site.

## **2.7 Controversies**

- 2.7.1 Controversies arising between property owners and Contractor shall be immediately referred to the appropriate ATC Transmission Line Specialist. Controversial Services shall not be performed until the controversy is resolved to ATC's satisfaction.

## **2.8 Settlement of Damage Claims**

- 2.8.1 Contractor is responsible for all damages caused while performing Services. Damage may include, but is not limited to adverse effects to crops, fences, lands, roads, driveways, culverts, drain tiles, woodlands, buildings and livestock. Contractor shall bear all expenses in the resolution of such claims. Contractor must notify the ATC Transmission Line Specialist of any and all claims brought by the property owners within one (1) business day.
- 2.8.2 Contractor shall keep a record detailing all claims, damages and settlements, and provide the ATC Transmission Line Specialist with a written report promptly upon completion of each settlement.
- 2.8.3 In the event that Contractor and the property owner are unable to resolve any complaint or controversy, ATC may, at its sole option and discretion, proceed to resolve the complaint or controversy. Any such resolution shall be binding upon the Contractor, and costs and expenses incurred by ATC in such resolution may be deducted from amounts owed to Contractor by ATC.

## **2.9 Quality Control**

- 2.9.1 Contractor's field supervisors shall personally inspect a satisfactory portion of completed Services and shall provide written assurance to ATC that the completed Services meet this specification.

Each field supervisor shall maintain a log of the transmission line spans inspected, and provide this information to the appropriate ATC Transmission Line Specialist on a bi-weekly basis. This information shall be provided to the specialist in an excel spreadsheet format and electronically forwarded via e-mail.

- 2.9.2 ATC will perform follow-up quality control checks via planned walking and aerial inspections, wood pole groundline inspection and treatment schedules, reports from local distribution companies (LDC's), ATC employees, property owners, and the general public.

## **2.10 Rights-of-Way Clearing Widths**

- 2.10.1 Contractor shall confirm the width of all easement and license rights prior to performing any Services. Contractor shall contact the ATC Real Estate Department (Kim McAdams (262) 506-6876) and request copies of the necessary easement and license documents for the right-of-ways scheduled for Services. Contractor must allow 60-days for the ATC Real Estate Department to provide all of the easement documents.
- 2.10.2 ATC shall advise of any known unrecorded special conditions.
- 2.10.3 Contractor shall consult with the ATC Transmission Line Specialist for written instructions if no easement width is specified, no easement document can be located or the ROW easement provides for a larger area than has previously been maintained.

## **3.0 NOTIFICATIONS**

### **3.1 General**

- 3.1.1 Contractor shall comply with all notice provisions contained in applicable statutes, regulations and ordinances including but not limited to Wis. Adm. Code sec. PSC 113.0510.

### **3.2 Property Owner**

- 3.2.1 For trimming, mowing, cutting and removal operations, Contractor shall notify property owners of Services to be performed which affects their property. Where permitted by Wis. Adm. Code sec. PSC 113.0510, verbal notification for clearing is sufficient. When property owners are unavailable, door tags/cards supplied by ATC shall be used to notify property owners of intended Services, and to provide property owners with contact information. Any Services performed without notice must have the appropriate ATC Transmission Line Specialist's prior approval. Notification of intent to perform Services (but not written approval) may be given to a caretaker or other individual designated as responsible by the property owner.
- 3.2.2 In addition to all other provisions in this section 3.1, Contractor must obtain written approval on forms provided by ATC from property owners prior to any herbicide application
- 3.2.3 Contractor must provide a contact name and telephone number on the door tags/cards, identifying a representative who will be available for evening hour callbacks from property owners.
- 3.2.4 A detailed record of all property owner notification contacts shall be maintained by Contractor and provided to ATC as set forth in Section 8.3 of this Specification.

### **3.3 System Operation**

- 3.3.1 At the beginning of each workday, each Contractor crew shall inform the appropriate System Operating Office of the line number and location they will be working on that day.

ATC System Operations Pewaukee	(262) 544-7008
ATC System Operations Cottage Grove	(800) 937-3762

Contractor shall also provide the system Operating Office with a cell phone number with which each crew can be reached at all times.

- 3.3.2 Contractor shall inspect all sites where Services are to be performed prior to beginning each Service. All provisions contained in ANSI Z133.1 relative to working in proximity to electrical hazards shall be observed, except that the minimum approach distances set forth in Table 1 of ANSI Z133.1 shall be observed at all times. In the event Contractor believes that it will be unable to perform the Services while maintaining the clearances set forth in Table 1, Contractor shall so inform the ATC Transmission Line Specialist, and shall further contact the closest ATC System Operations Center at the numbers listed above, and request an outage while Services are being performed. In the event that an outage cannot be allowed at that time, the Services shall be suspended and not performed until an outage is available.
- 3.3.3 The contractor shall provide ATC with a single point of contact to accommodate ATC System Operating Red Alerts. In the event that ATC System Operating declares a Red Alert Status, ATC System Operating will notify the contractor single point of contact, which will have the ability to immediately advise all Right-of-Way clearing crews to modify work plans such that, only clearing maintenance with no risk of accidental outage may continue. ATC System operating will advise the single point of contact when Red Alert Status has been discontinued.

## **4.0 SCHEDULING OF WORK**

### **4.1 General**

- 4.1.1 Contractor shall notify the appropriate ATC Transmission Line Specialist of the planned start date ten (10) working days prior to beginning any Services. The notice shall include information on the crew size, working hours and all equipment to be used in performance of the Services.
- 4.1.2 Contractor shall notify the appropriate ATC Transmission Line Specialist at the end of each week where the forestry crews will be starting work the following week. More frequent notifications shall be made if requested by the ATC Transmission Line Specialist.

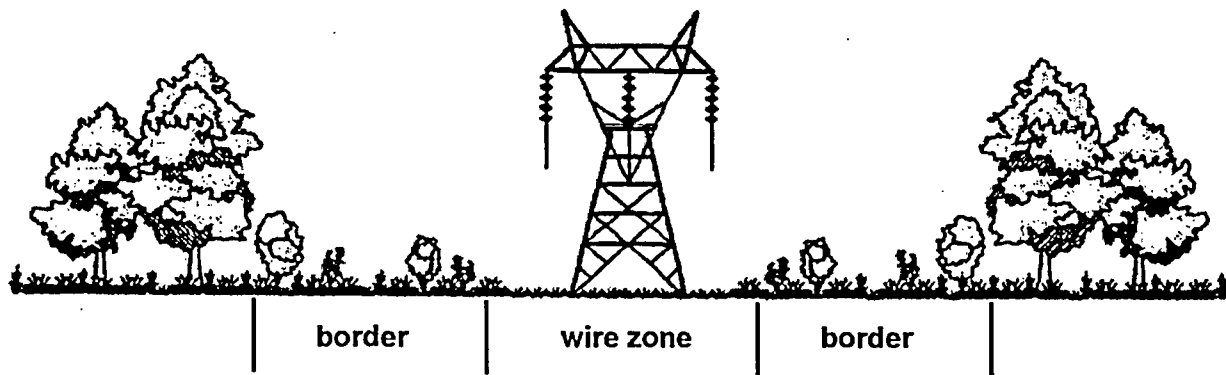
## 5.0 INTEGRATED VEGETATION MAINTENANCE TECHNIQUES

### 5.1 General

- 5.1.1 Transmission Line Right-of-Way clearance shall be based upon an integrated vegetation management philosophy in which alternative maintenance techniques are considered and selected on the basis of the technique or combination of techniques best calculated to achieve cost effective long-term control or elimination of Undesirable Species while encouraging and enhancing the growth of Desirable Species. Refer to the flowchart diagram illustrated in Appendix B.

### 5.2 Definitions

- 5.2.1 **Integrated Vegetative Maintenance (IVM)** - Options include three groups of treatments: physical, chemical, and ecological. These treatment options shall be combined to produce the most cost effective long-term increase in growth of Desirable Species and decrease in Undesirable Species on ATC rights-of-way.
- 5.2.2 **Undesirable Species** – Vegetative growth capable of exceeding fifteen (15) feet in height at maturity, which is likely to grow to come in contact with energized conductors or which interferes with access to transmission facilities. (See, Appendix A)
- 5.2.3 **Desirable Species** - Vegetation, which does not unreasonably interfere with the operation, maintenance or access to overhead electric lines, structures or facilities. (See, Appendix A)
- 5.2.4 **Invasive Species** – Rapidly spreading, undesirable species as designated from time to time by the Wisconsin Department of Natural Resources. Refer to Appendix A – List of Invasive Species.
- 5.2.5 **Wire Zone** - Right-of-Way located within the transmission line corridor with the boundary extremities located in between the area directly beneath the location of the outer most conductors being supported. Desirable species in this location are low growing forbs, grasses or crops that will not interfere with access and are located away from poles and other support structures. Note: All Undesirable Species, and all Invasive Species are to be removed from the "Wire Zone". See Figure 1 below, Illustration of Wire Zone and Border Zone on a Transmission ROW.
- 5.2.6 **Border Zone** - Right-of-Way located between the wire zone extremities and the edge of the right-of-way described within the easement or license. Desirable Species in the border zone are short growing woody species such as shrubs and low trees or forbs and grasses which do not interfere with access and are located away from poles and other support structures. Note: All Undesirable Species, and all "tall growing"-Invasive Species are to be removed from the "Border Zone". See Figure 1 below, Illustration of Wire Zone and Border Zone on a Transmission ROW.



**Figure 1 - Illustration of Wire Zone and Border Zone on a Transmission ROW**

- 5.2.7 **Selective Hand Cutting** – A physical treatment option by which Undesirable Species are removed using hand or chain saws. Selective Hand Cutting shall be required where the low density of Undesirable Species makes the use of herbicides or mowing impractical.
- 5.2.8 **Mowing** – A physical treatment option which Undesirable Species are cut with mechanical equipment. Mowing is permitted for relatively flat areas with high densities of Undesirable Species. When mowing is necessary in a wetland, all appropriate permits must be obtained.
- 5.2.9 **Chemical Right-of-Way Treatment** – Chemical herbicidal application to control Undesirable Species.
- 5.2.10 **Broadcast Foliar Application** – A chemical treatment option in which a herbicide is applied to canopies of Undesirable Species. Permitted broadcast application consists of the use of a spray device to apply a low-volume herbicide mixture to target the Undesirable Species with a minimal amount of the herbicide reaching the Desirable Species.
- 5.2.11 **Broadcast Soil-active Application** – A chemical treatment option in which a herbicide is broadly applied, generally following Mowing to control the re-growth of Undesirable Species.
- 5.2.12 **Selective Foliar Application** – A chemical treatment option in which the herbicide is applied to actively growing individual stems or clumps of Undesirable Species. This treatment avoids or minimizes damage to Desirable Species.
- 5.2.13 **Basal Application** – A chemical treatment option in which herbicides are applied to the lower portion, or base of individual Undesirable Species. Basal treatments are generally used in urban areas, near sensitive crops or environmentally sensitive areas or where dormant application is most practicable.
- 5.2.14 **Cut Stump Treatments** – A chemical treatment option in which Undesirable Species stumps are treated within ½-hour after cutting by application of a herbicide to the cut area.

### **5.3 Selective Hand Cutting**

- 5.3.1 Selective Hand Cutting shall be required where the low density of Undesirable Species makes the use of herbicides or mowing impractical. All stems or trunks of species capable of obtaining a mature height of fifteen (15) feet shall be completely severed from the root system at a point not more than 4 inches above the ground line. All Undesirable Species over six (6) feet tall shall be cut & Cut Stump Treated over the entire length and width of the right-of-way.
- 5.3.2 Subject to specific easement restrictions, a (15) foot route in the center of the Wire Zone along the entire length of the right-of-way, and a fifteen (15)-foot distance around each pole shall be cleared and treated for all Undesirable Species. The 15-foot distance around each pole shall be reduced as required for narrower easements. Undesirable Species less than six (6) feet in height may either be Chemically Treated or Cut Stump treated.
- 5.3.3 All vines within fifteen (15) feet of the structure, or guys and anchors shall be trimmed or removed and treated. All brush or trees within six (6) feet of the structure, or guys and anchors shall be trimmed or removed and treated.
- 5.3.4 Areas involving tag alder and willow shall be cleared to a distance of 6 feet beyond the wire zone.
- 5.3.5 Where Chemical Right-of-Way Treatment is prohibited and not covered under special easement conditions, all Undesirable Species, regardless of height, shall be cut or mowed.
- 5.3.6 Trees with trunks located outside of the easement corridor, but which have branches or growth protruding into the easement corridor, shall be side trimmed to the easement line, or if the property owner provides Contractor with written permission on a form provided by ATC, Contractor may trim the branch(es) protruding into the easement corridor back to the trunk or remove the entire tree, whichever the property owner permits.

### **5.4 Disposal of Hand Cut Material**

- 5.4.1 Vegetative material from trimming or cutting activities shall be disposed of in one of the manners described below. If no disposal technique is specified by the property owner, the cut material shall be disposed of by windrow/pile, lop and scatter, or chipping.

NOTE: Regardless of type of disposal, a 15-foot access route free of cut material that could impair access to the transmission line facilities shall be maintained down the length of the right-of-way and to include a 15-foot distance around each structure adjusted to less than the 15-foot requirement around the structure if easement rights do not permit a 15-foot distance.

- 5.4.2 Windrow/Pile - Cut material shall be piled in large piles or windrows at the edge of the right-of-way. Piles shall not exceed 3 feet in height. A 15-foot break shall be provided in the pile every 75 feet. The number of individual piles shall be kept to a minimum.
- 5.4.3 Lop and Scatter - Cut material shall be delimbed and cut to lay in close contact with the ground.

- 5.4.4 Chipping - Cut material shall be chipped. Chips may be blown on site unless specific removal instructions are specified. Chip depths shall not be concentrated to depths of greater than 4 inches but should be spread over the entire site.
- 5.4.5 Disposal Precautions - The following precautions apply to all disposal operations:
- No cut material including chips shall enter any stream or watercourse.
  - No cut material shall be disposed of in access roads, snowmobile trails, agricultural fields or maintained lawn areas.
  - No Black Cherry (*Prunus Scrotina*) or Black Walnut (*Juglans nigra*) cut during the actual growing season shall be disposed of within an active pasture. Note: The foliage is poisonous to cattle.
  - If equipment is used to form windrows/piles, care should be taken to avoid excess soil disturbances. The windrows/piles shall have sufficient openings or breaks to allow for wildlife movement and access by maintenance equipment.
  - Cut material shall be kept well back from roads and streams, approximately 100 ft. or out of sight.

## 5.5 Mowing

- 5.5.1 Contractor is required to obtain verbal permission from property owners prior to any mowing operations on the Right of Way.
- 5.5.2 Contractor shall make arrangements for follow-up herbicide application within 18-months of mowing the Right of Way. Refer to sections 5.0 and 6.0 for herbicide application guidelines.
- 5.5.3 Contractor shall only utilize mowing equipment when economically justifiable.
- 5.5.4 The contractor, prior to commencing mowing activities within ATC transmission line right-of-way, must obtain all necessary permits.
- 5.5.5 Soil disturbance should be minimized; no grubbing of root systems is permitted. The goal is to minimize the amount of soil disturbance to prevent creating areas where soil erosion could occur.
- 5.5.6 No wetlands, streams or waterways are to be crossed with the mowing equipment except over existing bridges or culverts unless all necessary permits are obtained. Work may proceed up to the wetland, stream or waterway from both directions.

## 5.6 Broadcast Foliar Application

- 5.6.1 The preferred broadcast method is through the use of a Radiarc®, or equivalent, spray device to apply a low-volume herbicide mixture. The application shall minimize the amount of herbicide that reaches the ground and affects Desirable Species. Broadcast Foliar applications may be used with chemically selective or non-selective herbicide products. Methods for Broadcast Foliar Application can include tractor-mounted boom sprayers,

tractor-mounted Radiarc® boomless sprayers, or hose-end spray guns.

- 5.6.2 Broadcast Foliar Application may be used in areas with a high density of woody Undesirable Species, where vehicular traffic is permitted and with the written permission of landowners. Broadcast Foliar Application should not be used on right-of-ways in urban areas, adjacent to croplands or near sensitive habitats.

## **5.7 Broadcast Soil-active Application**

- 5.7.1 Soil surface applied herbicides that control broadleaved Undesirable Species by taking the chemical up through the roots may be used only if the treatment will not damage grasses in the area. This type of application shall also not be used on frozen ground.
- 5.7.2 Contractor shall avoid affecting trees that may have roots extending into the treatment area.

## **5.8 Selective Foliar Application**

- 5.8.1 Application may use either a backpack or truck-mounted sprayer to deliver herbicide on individual stems or clumps of actively growing Undesirable Species. This low-volume approach shall be used on vegetation under 8 feet in height. A high volume foliar application can be used for taller Undesirable Species. Another acceptable alternative is to mow the right-of-way so that a low-volume approach can be used in the following growing season. The low-volume foliar technique is more selective than broadcast applications because less coverage is required to control individual plants, minimizing potential overspray.
- 5.8.2 Low-volume foliar applications are to be used in suburban areas or where otherwise required by landowners, and may be used in areas with low stem density. Low-volume foliar application shall be completed in late summer to minimize brownout.

## 5.9 Selective Basal Applications

- 5.9.1 Selective basal applications shall be made using the following procedures:

### Low Volume Basal

For Undesirable tree Species, the low volume herbicide mixture shall be applied to the basal portion of the stem/trunk including the root collar to a height of 6 to 18 inches above the ground line depending on stem/trunk diameter. (The rule of thumb should be that on stems of less than 3/4-inch diameter, the stem/trunk should be treated from the ground line up 6 to 10 inches; stems that are 3/4 inch to 1½-inch diameter should be treated from the ground line up 10 to 18 inches.)

### Low Volume Basal Banding

For Undesirable tree Species, the low volume herbicide mixture shall be applied to the basal portion of the stem/trunk no higher than 3 feet on the stem/trunk with a bandwidth of 6 to 18 inches depending on stem/trunk diameter. (The rule of thumb should be that on stems/trunks of less than 3/4-inch diameter, the stem/trunk should be banded 6 to 10 inches in width; stems that are 3/4 inch to 1½-inch diameter should be banded 10 inches to 18 inches in width. Larger diameter stems shall be Cut Stump Treated.)

- 5.9.2 The low volume herbicide mixture application shall be applied using either a backpack or canister sprayer equipped with a special low volume basal wand (Example: B and G Extenda-ban drip-proof extension valve with Y-2 tip, or equivalent). The nozzle shall be adjusted to produce a fine-coarse mist. A fog or solid stream pattern should not be used. In no case will leaking equipment be tolerated.
- 5.9.3 Herbicide Application shall not occur when precipitation is sufficient to render the application ineffective.
- 5.9.4 Undesirable Species stems less than 6 feet tall shall be treated with a herbicide.

## 5.10 Cut Stump Treatment

- 5.10.1 Chemical application to all cut stumps shall be made within one-half hour, with immediate application strongly recommended. The herbicide should be applied specifically to the cambium layer (just inside the bark) of the freshly cut stump.
- 5.10.2 A Low Volume formulation is also an acceptable Cut Stump Treatment. In this treatment, the chemical should be applied to completely wet the bark and root crown.
- 5.10.3 Application shall not occur when precipitation will dilute and undermine the effectiveness of the chemical.

## **6.0 GENERAL REQUIREMENTS AND PRECAUTIONS FOR HERBICIDE APPLICATIONS**

### **6.1 General Restrictions and Requirements**

- 6.1.1 Herbicides shall not be used without the express written consent of the landowner.
- 6.1.2 All herbicides shall be handled and applied in a manner that will prevent damage to Desirable Species and property. Contractor may use only herbicides registered by the Environmental Protection Agency and the appropriate State Department of Agriculture for the intended use.
- 6.1.3 Any container in which a herbicide is stored shall be securely locked or bolted to vehicles on the right-of-way and kept locked when left unattended. Empty herbicide containers shall be removed from the right-of-way and kept in a locked compartment until properly disposed. Disposal of herbicides and their containers shall be in accordance with the rules and regulations of all appropriate Federal and State agencies.
- 6.1.4 Herbicides shall be applied only by properly qualified, certified & licensed applicators. Contractor shall be responsible for the accurate recording and submitting of all herbicide usage forms required by any regulatory agency and for complying with all applicable Federal, State and local rules and regulations.
- 6.1.5 Contractor shall comply with OSHA Hazard Communication requirements and comply with all requirements to have in its possession copies of the herbicide labels for each herbicide being used. The labels shall list the herbicide composition, description, directions for use, precautionary statements, warnings, environmental hazards, practical treatments, storage and disposal instructions and any other relevant information about the herbicide being applied. Upon request, the labels as well as the material safety data sheets (MSDS) must be shown to anyone desiring this information.
- 6.1.6 Contractor shall provide hazard communication and safety programs in compliance with OSHA and other applicable laws and regulations. The communication and programs shall address the purpose of using herbicides, material safety data sheets and product labels, protective safety equipment and clothing and product information. An appropriate safety manual and program is to be provided and utilized by Contractor and its employees.

## **6.2 Restrictions to Chemical Use**

6.2.1 Specific conditions in which herbicide applications are not to be made are as follows:

- Where prohibited by the manufacturer and supplier.
- Where a property owner has not consented in writing to the application.
- Within a wetland, marshy site, or near a stream unless label instructions allow, and property owner has consented in writing.
- Within a vegetable garden.

## **6.3 Spill Prevention**

6.3.1 Herbicide spills shall be immediately cleaned up in compliance with industry best practices, manufacturer's instructions, and all Federal, State and local laws and regulations.

6.3.2 Contractor shall provide each crew with a spill kit containing sufficient materials for cleaning up and neutralizing potential spills of herbicides.

6.3.3 Contractor shall be responsible for all clean-up costs associated with providing herbicide application Services to ATC. Contractor must notify the ATC Transmission Line Specialist of any and all spills within twenty-four (24) hours.

6.3.4 Contractor shall keep a record of all spills and complete information regarding the clean-up effort, and provide the appropriate ATC Transmission Line Specialist with a written report of this information promptly upon completion of any spill clean-up.

## **6.4 Proper Equipment**

6.4.1 Contractor shall supply each herbicide application crewmember with all required EPA equipment.

6.4.2 Contractor shall provide vehicles that have adequate covers and locks to comply with Federal and State DOT regulations, in which to store and transport the herbicides.

## 7.0 TRIMMING PROCEDURES

### 7.1 General

7.1.1 Where there is no specified right-of-way width, the following minimum procedures apply:

- Vertical - 15 feet below nearest conductor (only for Undesirable Species, not shrubs and ornamentals).

NOTE: Where distribution underbuild is present, the required vertical clearance for distribution circuits shall be as defined in section 7.5.

- Horizontal - 20 feet from the nearest conductor. (NOTE: THIS DISTANCE IS SITE SPECIFIC, SUBJECT TO CHANGE AND MAY REQUIRE ADDITIONAL APPROVALS FROM THE PROPERTY OWNER.)
- Branch Cuts are to be made back to the main stem or to a branch using directional lateral trimming.
- A minimum number of cuts to tree branches should be made to maintain required clearances.
- Cuts to tree branches are to be made outside the branch bark ridge leaving as small a stub as possible.
- Precautions shall be taken to avoid stripping or tearing of bark when cutting large diameter limbs.

7.1.2 Where an easement exists, but the property owner objects to the proposed scope of work, the appropriate Transmission Line Specialist shall be notified. The Specialist will consult with ATC Real Estate and/or Legal to resolve this situation and achieve adequate clearances.

### 7.2 Oak Trimming

7.2.1 All Oak trimming shall be scheduled to accommodate all applicable statutes, regulations and ordinances, including but not limited to Wis. Adm. Code sec. PSC 113.0511 as amended from time to time, established procedures and timelines to prevent the spread of Oak wilt disease.

### 7.3 Danger/Hazard Trees

7.3.1 Danger/Hazard trees (described below) are trees located outside of the easement width that may fall and come into contact with the electrical facilities. Danger/Hazard trees shall be identified by Contractor and removed with property owner's written approval on forms provided by ATC.

- 7.3.2 Danger trees include, but are not necessarily limited to the following conditions: (1) tree defect or wound, (2) sweep towards a line, or (3) a tree position in relation to surrounding trees which subjects it to wind throw. When any of these conditions exist, and where the possibility of tree to conductor contact exists within two years (considering normal growth), the tree shall be removed.

#### **7.4 Crew Caused Outage**

- 7.4.1 If a contract forestry crew causes a line contact, an arc or line outage, the contract forestry crew will discontinue all line clearance activities on the transmission corridor, and immediately:
- Without further endangering personnel, ensure that all personnel are clear of lines and call 911 if emergency response is required.
  - Call the ATC system operator and notify them of the event.
  - Call the appropriate ATC Transmission Line Specialist and wait for further instructions.

#### **7.5 Distribution Underbuild Clearance Requirements**

- 7.5.1 When the transmission line structures have underbuild distribution circuits attached, Contractor shall trim Undesirable Species from the distribution lines as a part of this ATC specification.
- 7.5.2 Undesireable Species shall be trimmed or removed to provide a minimum fifteen (15)-foot clearance from primary distribution underbuild conductors.

### **8.0 TRANSMISSION LINE RIGHT-OF-WAY RECORDS**

#### **8.1 Data Collection and Forms**

- 8.1.1 Contractor shall provide accurate information in the reports specified below. Data shall be provided in both an electronic format and a hard copy.
- 8.1.2 All reports shall be forwarded to the appropriate ATC Transmission Line Specialist via Email and in hard copy on a bi-weekly basis in a Microsoft Excel Spreadsheet.

## 8.2 Right-of-Way Clearing Detail Reports

- 8.2.1 This report shall provide individual span information for all spans cleared during the preceding 2-week period. It shall be provided with the invoice for the Services, no later than 2-weeks after the right-of-way clearing has been completed, and all information listed below shall be contained in this report.

**Heading** – Each report sheet shall have the information listed below in the heading.

- Former Utility Name
- LDC District
- Circuit Number
- Span Number
- Contractor Name
- Forestry Crew Leader
- Date
- Page Number
- 

**Report Content:**

- Type of Access
- Urban/Rural
- Agricultural (Y/N)
- Special Conditions
- ATC Facility Defects (Comment)
- Forestry (Y/N)
- Labor Hours
- Equipment Type
- Right-of Way Width
- 
- Type of Treatment
- Type of Herbicide
- Equipment Hours
- Wetland (Y/N)
- 

## 8.3 Property Owner Notification/Contact Record

- 8.3.1 This report shall summarize all property owner notifications/contacts. It shall be attached to the appropriate "Right-of-Way Clearing Detail Report" bi-weekly. The report shall list the following information:

- Circuit Number
- Address
- Property Owner
- Complaints
- Span Number
- City
- 
- Date Contacted
- Phone Number
- 
- Property Owner Name
- Notes
- 

## 8.4 Bi-Weekly Right-of-Way Clearing Crew Summary

- 8.4.1 This report shall summarize each individual forestry crew's work on a bi-weekly basis. It shall provide the total number of spans of right-of way cleared, percentage and cost of all spans cleared, and right-of-way categories. The total bi-weekly expenditure as well as the average cost per span shall be calculated on this report. It shall be attached to each "Right-of-Way Clearing Detail Report" bi-weekly.

## 8.5 Year to Date Right-of-Way Clearing Summary

- 8.5.1 This report shall provide company wide totals, percentages and cost of all forestry right-of-way clearing completed, and right-of-way clearing categories. The total contract expenditure as well as the average cost per span shall be calculated on this report. This report shall be provided on a bi-weekly basis.

- 8.5.2 This report shall provide company totals for each of the four (4) ATC regions, percentages and cost of all forestry right-of-way clearing completed, and right-of-way clearing categories. The total contract expenditure as well as the average cost per span shall be calculated on this report. This report shall be provided on a bi-weekly basis.

## **8.6 End of Project Right-of-Way Clearing Summary**

- 8.6.1 This report shall provide company wide totals, percentages and cost of all forestry right-of-way clearing completed, and right-of-way clearing categories. The total contract expenditure as well as the average cost per span shall be calculated on this report. This report shall be provided at the end of the project.
- 8.6.2 This report shall provide company totals for each of the four (4) ATC regions, percentages and cost of all forestry right-of-way clearing completed, and right-of-way clearing categories. The total contract expenditure as well as the average cost per span shall be calculated on this report. This report shall be provided at the end of the project.

## APPENDIX A

### LIST OF DESIRABLE SPECIES THAT MAY BE RETAINED IN THE "BORDER ZONES"

(Species of lower growth form that are compatible with electric rights-of-way and planted so as not to interfere with access).

<b>SCIENTIFIC NAME</b>	<b>COMMON NAME</b>
<i>Comptoria peregrina</i>	Sweetfern
<i>Cornus alternifolia</i>	Alternate Leaf Dogwood
<i>Cornus amomum</i>	Silky Dogwood
<i>Cornus racemosa</i>	Gray Dogwood
<i>Cornus stolonifera</i>	Redosier Dogwood
<i>Corylus Americana</i>	American Hazelnut
<i>Corylus cornuta</i>	Beaked Hazelnut
<i>Gaylussacia</i> spp.	Huckleberry
<i>Hammamelis virginiana</i>	Witchhazel
<i>Ilex verticillata</i>	Common winterberry
<i>Lindera benzoin</i>	Spicebush
<i>Rosa</i> spp.	Rose (including wild rose, multiflora rose, etc.)
<i>Rubus</i> spp.	Brambles (including wild raspberry, blackberry, etc.)
<i>Sambucus Canadensis</i>	Common Elderberry
<i>Sambucus pubens</i>	Scarlet Elderberry
<i>Spirea</i> spp.	Spirea
<i>Vaccinium</i> spp.	Blueberry
<i>Viburnum acerifolium</i>	Mapleleaf Viburnum
<i>Viburnum alnifolium</i>	Hobblebush
<i>Viburnum cassinoides</i>	Witherod
<i>Viburnum lentago</i>	Nannyberry
<i>Viburnum recognitum</i>	Arrowood
<i>Acer spicatum</i>	Mountain Maple
<i>Amelanchier</i>	Shadbush
<i>Carpinus caroliniana</i>	American Hornbeam
<i>Cornus florida</i>	Flowering Dogwood
<i>Crataegus</i> spp.	Hawthorn
<i>Juniperus virginiana</i>	Red Cedar
<i>Ostrya virginiana</i>	Hop Hornbeam
<i>Prunus virginiana</i>	Choke Cherry
<i>Malus</i> spp.	Apple
<i>Rhus</i> spp.	Sumac

**LIST OF UNDESIRABLE SPECIES TO BE REMOVED FROM THE  
WIRE ZONE AND BORDER ZONE.**

(NOTE: THIS LISTING MAY NOT BE ALL INCLUSIVE.)

Species that may exceed the heights described in this Specification and are  
therefore incompatible with electric rights-of-way.

<b>SCIENTIFIC NAME</b>	<b>COMMON NAME</b>
<i>Abies balsamea</i>	Balsam Fir
<i>Acer negundo</i>	Boxelder
<i>Acer spp.</i>	Maples
<i>Betula spp.</i>	Birches
<i>Carya spp.</i>	Hickories
<i>Fagus grandifolia</i>	American Beech
<i>Fraxinus spp.</i>	Ash
<i>Juglans cinerea</i>	Butternut
<i>Juglans nigra</i>	Black Walnut
<i>Juniperus virginiana</i>	Eastern Red Cedar
<i>Larix laricina</i>	Tamarack
<i>Picea spp.</i>	Spruces
<i>Pinus spp.</i>	Pines
<i>Populus spp.</i>	Aspens and Cottonwood
<i>Prunus spp.</i>	Cherries
<i>Quercus spp.</i>	Oaks
<i>Robinia pseudoacacia</i>	Black Locust
<i>Salix spp.</i>	Willows (Tall Growing)
<i>Tilia Americana</i>	Basswood
<i>Tsuga Canadensis</i>	Hemlock
<i>Ulmus spp.</i>	Elm

**LIST OF TALL GROWING INVASIVE SPECIES TO BE REMOVED FROM THE WIRE ZONE AND BORDER ZONE.**

(Species that, because of their height or growth potential, are incompatible with electric rights-of-way).

**SCIENTIFIC NAME**

**COMMON NAME**

Trees:

<i>Ailanthus altissima</i>	Tree of Heaven
<i>Alnus glutinosa</i>	European (Black) Alder
<i>Elaeagnus angustifolia</i>	Russian Olive
<i>Elaeagnus umbellata</i>	Autumn Olive
<i>Morus alba</i>	White Mulberry
<i>Rhamnus cathartica</i>	Buckthorns: Common
<i>Rhamnus frangula</i>	Buckthorns: Glossy
<i>Sorbus acuparia</i>	European Mountain Ash

**LIST OF LOW GROWING INVASIVE SPECIES TO BE REMOVED FROM WIRE ZONE (EXCEPT WHEN IN LANDSCAPE PLANTINGS).**

(Species that, because of their growth potential, are incompatible with electric rights-of-way).

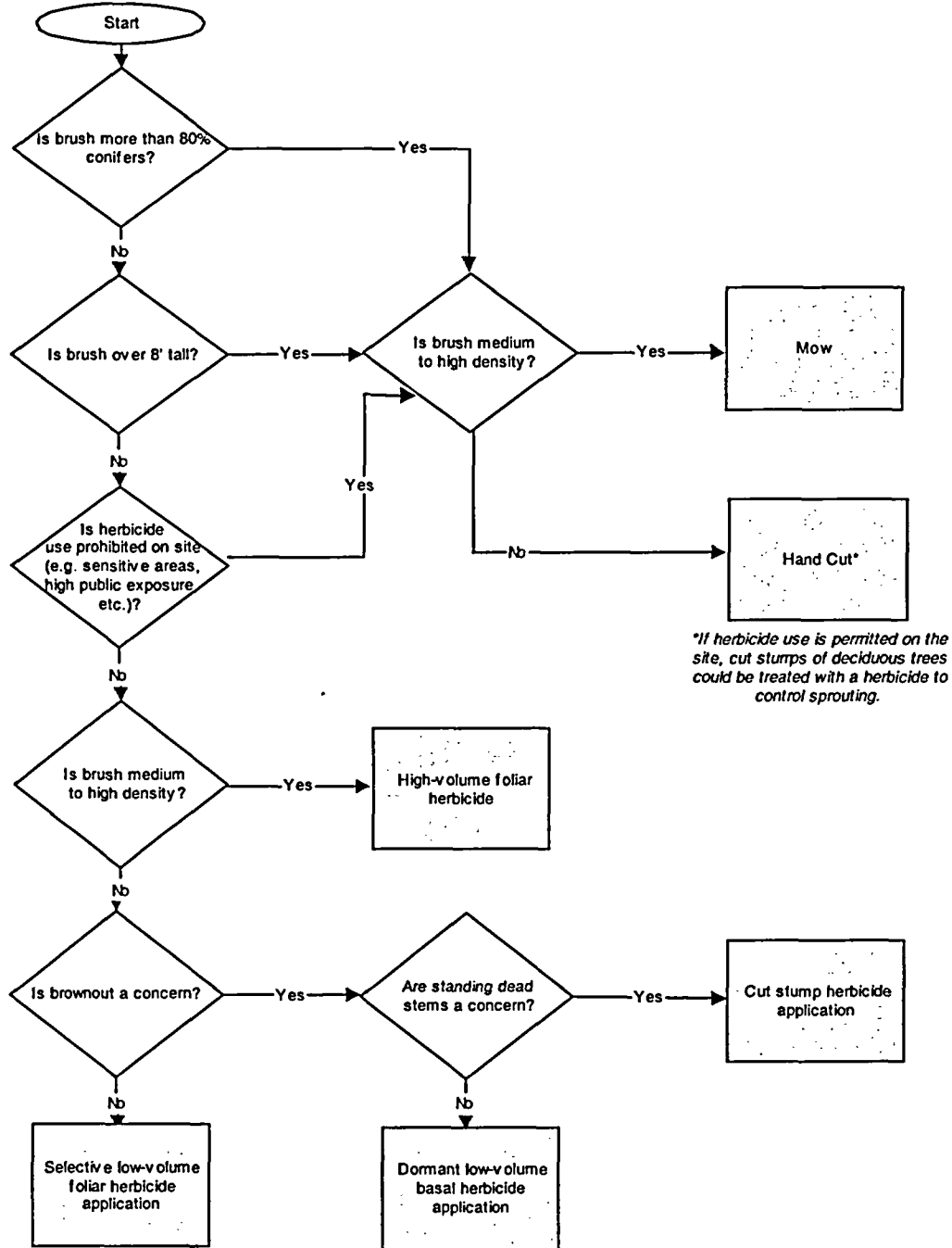
Shrubs:

<i>Berberis thunbergii</i>	Japanese Barberry
<i>Berberis vulgaris</i>	European Barberry
<i>Caragana arborescens</i>	Siberian Pea Shrub
<i>Euonymus alatus</i>	Burning Bush
<i>Ligustrum vulgare</i>	Common Privet
<i>Lonicera maackii</i>	Amur Honeysuckle
<i>Lonicera morrowii</i>	Honeysuckle: Tartarian
<i>Lonicera tatarica</i>	Honeysuckle: Morrow's
<i>Lonicera x bella</i>	Honeysuckle: Bella
<i>Rhodotypos scandens</i>	Black jet-bead
<i>Rosa multiflora</i>	Multiflora Rose
<i>Viburnum lantana</i>	Wayfaring Tree
<i>Viburnum opulus</i>	European Highbush Cranberry

## APPENDIX B

### GUIDELINES FOR PRESCRIBING BRUSH CONTROL TREATMENTS

*This matrix is a general guideline for prescribing an appropriate brush control treatment for individual sites not managed for allowable crop nurseries or orchards. Individual area specifications and characteristics should be evaluated when using this matrix.*



*Note: Brush refers to undesirable woody vegetation. This guide is not intended to address appropriate timing of treatments. Multiple treatments may be required within any given span, depending on condition and location of undesirable vegetation (wire zone versus boarder zone).*