



## CONTRACT RENEWAL

#5588-25-KN

Date: January 27, 2025

Supplier: Van Diest Supply Company

Project: 1<sup>st</sup> Year Contract Renewal – Forestry Chemicals & Treatments


Congratulations, you have been awarded the 1<sup>st</sup> year renewal option for contract #5588-25-KN **Forestry Chemicals & Treatments**, dated January 27, 2025.

The Firm shall provide to City of Grand Junction the products set forth in the Contract Documents (Purchase Order) dated March 8, 2024, for Solicitation No. IFB-5380-24-KH for Forestry Chemicals & Treatments, for Vegetation Management Products for the unit prices listed below. This renewal shall cover the entire 2025 calendar year.

- Ecomazapyr 2 SL (Active ingredient: Imazapyr 27.8%) - **\$33.35 / Quart**
- Pendulum Aquacap (Active ingredient: Pendimethalin 38.7%) - **\$122.38 / 2.5 Gallons**
- Q4 Plus (Active ingredient: Quinclorac 8.93%/ Sulfentrazone 0.69% / 2, 4-D 11.81%/ Dicamba 1.49%) - **\$38.25 / Quart**
- T-Zone (Active ingredient: Triclopyr 77.2% / Sulfentrazone 0.66%) - **\$26.25/ Quart**
- Ranger Pro (Active ingredient: Glyphosate 41%) - **\$42.00 / 2.5 Gallons**
- Rodeo (aquatic safe) (Active ingredient: Glyphosate 53.8%) - **\$70.00 / 2.5 Gallons**
- Flumigard WDG (Active ingredient: Flumioxazin 51%) - **\$200.00 / 5 lbs.**
- Snap Shot 2.5TG (Active ingredient: trifluralin 2% / isoxabin 0.5%) - **\$102.50 / 50 lbs. bag**
- Scythe (Active ingredient: Pelargonic Acid 57%) - **\$180.63 / 2.5 Gallons**

Upon receipt of the fully signed contract renewal, please notify Rob Davis, City Forester / Open Space Supervisor at (970) 254-3825 for product ordering.

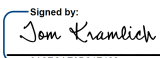
CITY OF GRAND JUNCTION, COLORADO

Signed by:  
  
FO09F221BF93450  
 Kassy Nelson, Buyer

### **SUPPLIER ACKNOWLEDGEMENT**

Receipt of this Contract Renewal is hereby acknowledged:

Contractor: Van Diest Supply Company

By:  Tom Kramlich  
0A2ECAE9D24E422

Title: Area Manager - Colorado

Date: 1/27/2025



Purchase Order  
No. 2024-00000147

DATE 03/07/2024

Ph. (970) 244-1546

Fax

Ship To  
City of Grand Junction  
Parks & Recreation - Admin  
1340 Gunnison Ave  
GRAND JUNCTION, CO 81501

Bill To  
City of Grand Junction  
Parks & Recreation - Admin  
1340 Gunnison Ave  
GRAND JUNCTION, CO 81501

Vendor  
VENDOR NO. 4337  
Van Diest Supply Company  
P O Box 610  
Webster City, IA 50595-0610  
Phone: (308) 345-5057

PAGE 1 of 1  
SHIP VIA Best Way  
DELIVER BY  
FREIGHT TERMS FOB Dest, Frght Prepaid .Allow  
Payment Terms: Net 30 Days  
Buyer Name: Kassandra Hackett  
Buyer Email: kassyh@gjcity.org

Award for IFB-5380-24-KH (Category 3: Vegetation management)

QUANTITY	UNIT	DESCRIPTION	UNIT COST	TOTAL COST
1.0000	Lump Su	CONTRACT SERVICES - Vegetation Management Treatment 100-710-385-250.6145 - Chemical/Fertilizers 5,850.00 100-710-550-090.6145 - Chemical/Fertilizers 9,000.00	14,850.0000	\$14,850.00
PURCHASE ORDER TOTAL				\$14,850.00

Special Instructions: PURCHASE ORDER No. MUST APPEAR ON ALL INVOICES, SHIPPERS, PACKAGES, CORRESPONDENCE  
Tax Exempt No. 98-03544

By:





Purchasing Division

## Invitation for Bid

IFB-5380-24-KH

Forestry Chemicals & Treatments

### **Responses Due:**

February 22, 2024, prior to 1:00 PM Local Time

**Accepting Electronic Responses Only**  
**Responses Only Submitted Through the Rocky Mountain E-**  
**Purchasing [www.bidnetdirect.com/colorado](http://www.bidnetdirect.com/colorado)**

(Purchasing Representative does not have access or control of the vendor side of RMEPS. If website or other problems arise during response submission, vendor **MUST** contact RMEPS to resolve issue prior to the response deadline. 800-835-4603)

### **Purchasing Representative:**

Kassy Hackett, Buyer

[kassyh@gjcity.org](mailto:kassyh@gjcity.org)

Phone (970) 244-1546

**NOTE: Solicitation opening will be held virtually.**  
**See Section 1.7 for details.**

# **Invitation for Bids**

## **Table of Contents**

Section 1	Instruction to Bidders
Section 2	General Contract Conditions
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# **1. Instructions to Bidders**

**NOTE:** It is the Firm's responsibility to read and review all solicitation documentation in its entirety, and to ensure that it has a clear and complete understanding of not only the scope, specifications, project requirements, etc., but also all other requirements, instructions, rules, regulations, laws, conditions, statements, procurement policies, etc. that are associated with the solicitation process and project/Work being solicited.

- 1.1. A.D.A Document Compliance Requirements:** All work documents, and/or bid/proposal documents submitted, as a result of this solicitation must comply with all applicable provisions of §§24-85-101, C.R.S., et seq., and the Accessibility Standards for Individuals with a Disability, as established by the Office Of Information Technology according to Section §24-85-103 (2.5), C.R.S. and 3) all State of Colorado technology standards related to technology accessibility and with Level A.A. of the most current version of the Web Content Accessibility Guidelines (WCAG), incorporated in the State of Colorado technology standards.
- 1.2. Issuing Office:** This Invitation for Bid (IFB) is issued by the City of Grand Junction. All contact regarding this IFB is to be directed to:  
  
Kassy Hackett, Buyer  
[kassyh@gjcity.org](mailto:kassyh@gjcity.org)  
  
With the exception of Pre-Bid or Site Visit Meeting(s) all questions, inquiries, comments, or communication pertaining to this solicitation (whether process, specifications, scope, etc.) must be directed in writing to the Purchasing Agent assigned to the project or Purchasing Division. Other communication may result in disqualification.
- 1.3. Purpose:** The City of Grand Junction is soliciting competitive bids from qualified and interested companies for all labor, equipment, and materials required to provide and deliver **forestry chemical and treatments**. All specifications and scope of work should be verified by Bidders prior to submission of bids.
- 1.4. The Owner:** The Owner is the City of Grand Junction, Colorado and is referred to throughout this Solicitation. The term Owner means the Owner or its authorized representative.
- 1.5. Compliance:** All Firms, by submitting a bid, agree to comply with all conditions, requirements, and instruction of this IFB as stated or implied herein. Should the Owner omit anything which is necessary to the clear understanding of the requirements, or should it appear that various instructions are in conflict, the Firm(s) shall secure instructions from the Purchasing Agent prior to submittal deadline.
- 1.6. Procurement Process:** The most current version of the City of Grand Junction [Purchasing Policy and Procedure Manual](#) is contracting.

- 1.7. **Submission:** *Each bid shall be submitted in electronic format only through the Rocky Mountain E-Purchasing website ([www.bidnetdirect.com/colorado](http://www.bidnetdirect.com/colorado)).* *This site offers both “free” and “paying” registration options that allow for full access of the Owner’s documents and for electronic submission of proposals. (Note: “free” registration may take up to 24 hours to process. Please Plan accordingly.)* Please view our “**Electronic Vendor Registration Guide**” at <http://www.gjcity.org/501/Purchasing-Bids> for details. (Purchasing Representative does not have access or control of the vendor side of RMEPS. If website or other problems arise during response submission, vendor **MUST** contact RMEPS to resolve issue prior to the response deadline. **800-835-4603**).

Solicitation Opening, Forestry Chemicals & Treatments IFB-5380-24-KH  
Feb 22, 2024, 1:00 – 1:30 PM (America/Denver)

Please join my meeting from your computer, tablet or smartphone.  
<https://meet.goto.com/241189933>

You can also dial in using your phone.  
Access Code: 241-189-933  
United States: +1 (571) 317-3122  
- One-touch: tel:+15713173122,,241189933#

Join from a video-conferencing room or system.  
Meeting ID: 241-189-933  
Dial in or type: 67.217.95.2 or [inroomlink.goto.com](https://inroomlink.goto.com)  
Or dial directly: 241189933@67.217.95.2 or 67.217.95.2##241189933

Get the app now and be ready when your first meeting starts:  
<https://meet.goto.com/install>

- 1.8. **Modification and Withdrawal of Bids Before Opening.** Bids may be modified or withdrawn by an appropriate document stating such, duly executed and submitted to the place where Bids are to be submitted at any time prior to Bid Opening.

A bid must be firm and valid for award and may not be withdrawn or cancelled by the Firm for sixty (60) days following the submittal deadline date, and only prior to award.

- 1.9. **Printed Form for Price Bid:** All Price Bids must be made upon the Price Bid Schedule attached and should give the amounts both in words and in figures and must be signed and acknowledged by the bidder.

The Firm shall specify a unit price in figures for each pay item for which a quantity is given and shall provide the products (in numbers) of the respective unit prices and quantities in the Extended Amount column. The total Bid price shall be equal to the sum of all extended amount prices. When an item in the Price Bid Schedule provides a choice to be made by the Firm, Firm’s choice shall be indicated in accordance with the specifications for that particular item and thereafter no further choice shall be permitted.

Where the unit of a pay item is lump sum, the lump sum amount shall be shown in the "extended amount" column and included in the summation of the total Bid.

All blank spaces in the Price Bid Schedule must be properly filled out.

Bids by corporations must be executed in the corporate name by the president or vice president or other corporate officer accompanied by evidence of authority to sign. The corporate address and state of incorporation shall be shown below the signature.

Bids by partnerships must be executed in the partnership name and signed by a partner whose title must appear under the signature and the official address of the partnership must be shown below the signature.

All names must be typed or printed below the signature.

The Firm's Bid shall contain an acknowledgement of receipt of all Addenda, the numbers of which shall be filled in on the Firm's Bid Form.

The contact information to which communications regarding the Bid are to be directed must be shown.

**1.10. Exclusions:** No oral, telephonic, emailed, or facsimile bid will be considered

**1.11. Contract Documents:** The complete IFB and bidder's response compose the Contract Documents. Copies of these documents can be obtained from the City Purchasing website, <https://www.gjcity.org/501/Purchasing-Bids>.

**1.12. Examination of Specifications:** Bidders shall thoroughly examine and be familiar with the project Statement of Work. The failure or omission of any Bidder to receive or examine any form, addendum, or other document shall in no way relieve any Bidder from any obligation with respect to its bid. The submission of a bid shall be taken as evidence of compliance with this section. Prior to submitting a bid, each Firm shall, at a minimum:

- a. Examine the *Contract Documents* thoroughly;
- b. Visit the site to familiarize itself with local conditions that may in any manner affect cost, progress, or performance of the Work;
- c. Become familiar with federal, state, and local laws, ordinances, rules, and regulations that may in any manner affect cost, progress or performance of the Work;
- d. Study and carefully correlate Bidder's observations with the *Contract Documents*, and;

- e. Notify the Purchasing Agent of all conflicts, errors, ambiguities, or discrepancies in or among the *Contract Documents* within the designated inquiry period.
- 1.13. Questions Regarding Statement of Work:** Any information relative to interpretation of Scope of Work or specifications shall be requested of the Purchasing Representative, in writing, in ample time prior to the response time.
- 1.14. Addenda & Interpretations:** If it becomes necessary to revise any part of this solicitation, a written addendum will be posted electronically on the City's website at <https://www.gjcity.org/501/Purchasing-Bids>. The Owner is not bound by any oral representations, clarifications, or changes made in the written specifications by Owner, unless such clarification or change is provided in written addendum form from the City Purchasing Representative.
- 1.15. Taxes:** The Owner is exempt from the State, County, and Municipal Sales Tax and Federal Excise Tax; therefore, all fees shall not include taxes.
- 1.16. Sales and Use Taxes:** The Firm and all Subcontractors are required to obtain exemption certificates from the Colorado Department of Revenue for sales and use taxes in accordance with the provisions of the General Contract Conditions. Bids shall reflect this method of accounting for sales and use taxes on materials, fixtures, and equipment.
- 1.17. Offers Binding 60 Days:** Unless otherwise specified, all formal offers submitted shall be binding for sixty (60) calendar days following opening date, unless the Bidder, upon request of the Purchasing Representative, agrees to an extension.
- 1.18. Exceptions and Substitutions:** All bids meeting the intent of this IFB shall be considered for award. A Firm taking exception to the specifications does so at the Firm's risk. The Owner reserves the right to accept or reject any or all substitutions or alternatives. When offering substitutions and/or alternatives, Firm must state any exception(s) in the section to which the exception(s) pertain. Exception/substitution, if accepted, must meet, or exceed the stated intent and/or specifications. The absence of stated exception(s) indicates that the Firm has not taken exceptions, and if awarded a Contract shall hold the Firm responsible to perform in strict accordance with the specifications or scope of the bid and Contract Documents.
- 1.19. Collusion Clause:** Each Offeror by submitting a bid certifies that it is not party to any collusive action or any action that may be in violation of the Sherman Antitrust Act. Any and all bids shall be rejected if there is evidence or reason for believing that collusion exists among the proposers. The Owner may or may not, at its discretion, accept future bids for the same service or commodities for participants in such collusion.
- 1.20. Disqualification of Bidders:** A Bid will not be accepted from, nor shall a Contract be awarded to, any person, firm, or corporation that is in arrears to the Owner, upon debt or Contract, or that has defaulted, as surety or otherwise, upon any obligation to the Owner, or that is deemed irresponsible or unreliable.

Bidders may be required to submit satisfactory evidence that it is responsible, have a practical knowledge of the project bid upon and that it has the necessary financial and other resources to complete the proposed Work.

Either of the following reasons, without limitation, shall be considered sufficient to disqualify a Bidder and Bid:

- a. More than one Bid is submitted for the same Work from an individual, firm, or corporation under the same or different name; and
- b. Evidence of collusion among Bidders. Any participant in such collusion shall not receive recognition as a Bidder for any future work of the Owner until such participant has been reinstated as a qualified bidder.

**1.21. Public Disclosure Record:** If the Offeror has knowledge of its employee(s) or sub-contractors having an immediate family relationship with an Owner employee or elected official, the Offeror must provide the Purchasing Agent with the name(s) of the individuals. The individuals are required to file a "Public Disclosure Record", a statement of financial interest, before conducting business with the Owner.

**1.22. Public Opening:** Bids shall be opened in a virtual meeting immediately following the bid deadline. Offerors, its representatives and interested persons may be present. Only the name(s) and business address of the Offeror(s) will be disclosed.

## **2. General Contract Conditions**

**2.1. The Contract:** This Invitation for Bid, submitted documents, and any negotiations, when properly accepted by the Owner, shall constitute an enforceable agreement equally binding between the Owner and Firm. The Contract represents the entire and integrated agreement between the City and the Firm and supersedes all prior negotiations, representations, or agreements, either written or oral, including the Bid documents. The Contract may be amended or modified with Change Orders, Field Orders, or Amendment.

**2.2. Execution, Correlation, Intent, and Interpretations:** The Contract Documents shall be signed by the Owner and Firm. By executing the Contract, the Firm represents that it has familiarized itself with the local conditions under which the Work is to be performed and correlated its observations with the requirements of the Contract Documents. The Contract Documents are complementary, and what is required by anyone, shall be as binding as if required by all. The intention of the Contract Documents is to include all labor, materials, equipment, Work and other items necessary for the proper execution and completion of the Scope of Work as defined in the technical specifications and/or drawings contained herein. All drawings, specifications and copies furnished by the Owner are, and shall remain, Owner property. It's not to be used on any other project.

- 2.3. The Owner:** The Owner is the City of Grand Junction, Colorado and is referred to throughout this Solicitation. The term Owner means the Owner or its authorized representative.
- 2.4. Firm:** The Firm is the person or organization identified as such in the Agreement and is referred to throughout the Contract Documents. The term Firm means the Firm or its authorized representative. The Firm shall carefully study and compare the General Contract Conditions of the Contract, Specification and/or Drawings, Scope of Work, Addenda and Modifications and shall at once report to the Owner any error, inconsistency, or omission it may discover. Firm shall not be liable to the Owner for any damage resulting from such errors, inconsistencies, or omissions. The Firm shall not commence work without clarifying Drawings, Specifications, or Interpretations.
- 2.5. Warranty:** The Firm warrants to the Owner that all materials and equipment furnished under this Contract will be new unless otherwise specified, be of good quality, free from faults and defects and in conformance with the Contract Documents. All materials and equipment not so conforming to these standards may be considered defective. If required by Owner, the Firm shall furnish satisfactory evidence as to the kind and quality of materials and equipment. If within ten (10) days after written notice to the Firm requesting such repairs or replacement, the Firm should neglect to make or undertake with due diligence to the same, the City may make such replacements. All indirect and direct costs of such correction or replacement shall be at the Firm's expense.
- 2.6. Indemnification:** Firm shall defend, indemnify and save harmless the Owner and all its officers, employees, insurers, and self-insurance pool, from and against all liability, suits, actions, or other claims of any character, name and description brought for or on account of any injuries or damages received or sustained by any person, persons, or property on account of any negligent act or fault of the Firm, or of any Firm's agent, employee, sub-Firm or supplier in the execution of, or performance under, any Contract which may result from bid award. Firm shall pay any judgment with costs which may be obtained by and/or against the Owner arising out of or under the performance.
- 2.7. Miscellaneous Conditions:** Material Availability: Firms must accept responsibility for verification of material availability, production schedules, and other pertinent data prior to submission of bid. It is the responsibility of the bidder to notify the Owner immediately if materials specified are discontinued, replaced, or not available for an extended period of time. OSHA Standards: All bidders agree and warrant that Work performed in response to this invitation shall conform to the standards declared by the US Department of Labor under the Occupational Safety and Health Act of 1970 (OSHA). In the event the Work does not conform to OSHA standards, the Owner may require the Work to be redone at no additional expense to the Owner.
- 2.8. Time:** The Contract Time is the period of time allotted in the Contract Documents for completion of product/material receipt. The date of commencement of the Contract is the date established in the Contract Documents.



- 2.9. Payment & Completion:** The Contract Sum is stated in the Contract and is the total amount payable by the Owner to the Firm for the performance of the Work under the Contract Documents. Upon receipt of written notice that the Work is ready for final inspection and acceptance and upon receipt of application for payment, the Owner's Project Manager will promptly make such inspection and, when it finds the Work acceptable under the Contract Documents and the Contract fully performed, the Owner shall make payment in the manner provided in the Contract Documents. Partial payments will be based upon estimates, prepared by the Firm, of the value of Work performed and materials placed in accordance with the Contract Documents. The Work performed by Firm shall be in accordance with generally accepted professional practices and the level of competency presently maintained by other practicing professional firms in the same or similar type of Work in the applicable community. The Work to be performed by Firm hereunder shall be done in compliance with applicable laws, ordinances, rules and regulations.
- 2.10. Protection of Persons & Property:** The Firm shall comply with all applicable laws, ordinances, rules, regulations, and orders of any public authority having jurisdiction for the safety of persons or property or to protect itself from damage, injury, or loss. Firm shall erect and maintain, as required by existing safeguards for safety and protection, and all reasonable precautions, including posting danger signs or other warnings against hazards promulgating safety regulations and notifying owners and users of adjacent utilities. When or where any direct or indirect damage or injury is done to public or private property by or on account of any act, omission, neglect, or misconduct by the Firm in the execution of the Work, or in consequence of the non-execution thereof by the Firm, it shall restore, at its own expense, such property to a condition similar or equal to that existing before such damage or injury was done, by repairing, rebuilding, or otherwise restoring as may be directed, or it shall make good such damage or injury in an acceptable manner.
- 2.12. Change Order/Amendment:** No oral statement of any person shall modify or otherwise change, or affect the terms, conditions or specifications stated in the Contract. All amendments to the Contract shall be made in writing by the City Contract Administrator.
- 2.13. Assignment:** The Firm shall not sell, assign, transfer or convey the Contract resulting from this IFB, in whole or in part, without the prior written approval from the Owner.
- 2.14. Cancellation of Solicitation:** Any solicitation may be canceled by the Owner or any solicitation response by a vendor may be rejected in whole or in part when it is in the best interest of the Owner.
- 2.15. Compliance with Laws:** Responses must comply with all Federal, State, County and local laws governing of the service and the fulfillment of the Service(s) for and on behalf of the public. Firm hereby warrants that it is qualified to assume the responsibilities and render the Work described herein and has all requisite corporate authority and professional licenses in good standing, required by law.

- 2.16. Confidentiality:** All materials submitted in response to this Solicitation shall ultimately become public record and shall be subject to inspection after Contract award. “**Proprietary or Confidential Information**” is defined as any information that is not generally known to competitors and which provides a competitive advantage. Unrestricted disclosure of proprietary information places it in the public domain. Only submittal information clearly identified with the words “**Confidential Disclosure**” and uploaded as a separate document shall establish a confidential, proprietary relationship. Any material to be treated as confidential or proprietary in nature must include a justification for the request. The request shall be reviewed and either approved or denied by the Owner. If denied, the proposer shall have the opportunity to withdraw its entire bid, or to remove the confidential or proprietary restrictions. Neither cost nor pricing information nor the total response shall be considered confidential or proprietary.
- 2.17. Conflict of Interest:** No public official and/or Owner employee shall have interest in the Contract resulting from this Invitation for Bid.
- 2.18. Contract Termination:** The Contract shall remain in effect until any of the following occurs: (1) Contract expires; (2) completion of Work; (3) final acceptance of Work or, (4) for convenience terminated by either party with a written *Notice of Cancellation* stating therein the reasons for such cancellation and the effective date of cancellation at least thirty days past notification.
- 2.19. Employment Discrimination:** During the performance of any Work per agreement with the Owner, the Firm, agrees to:
- 2.19.1.** Not discriminate against any employee or applicant for employment because of race, religion, color, sex, age, disability, citizenship status, marital status, veteran status, sexual orientation, national origin, or any legally protected status except when such condition is a legitimate occupational qualification reasonably necessary for the normal operations of the Firm. The Firm agrees to post in conspicuous places, visible to employees and applicants for employment, notices setting forth the provisions of this nondiscrimination clause.
  - 2.19.2.** In all solicitations or advertisements for employees placed by or on behalf of the Firm, that the Firm is an Equal Opportunity Employer.
  - 2.19.3.** Notices, advertisements, and solicitations placed in accordance with federal law, rule, or regulation shall be deemed sufficient for the purpose of meeting the requirements of this section.
- 2.20. Immigration Reform and Control Act of 1986 and Immigration Compliance:** The Firm certifies that it does not and will not during the performance of the Contract employ Service(s)er without authorization Work or otherwise violate the provisions of the Federal Immigration Reform and Control Act of 1986 and/or law regulating immigration compliance.
- 2.21. Ethics:** The Firm shall not accept or offer gifts or anything of value and/or enter into any business arrangement with any employee, official, or agent of the Owner.

- 2.22. Failure to Deliver:** In the event of failure of the Firm to perform in accordance with the Contract Documents, the Owner, after due oral or written notice, may procure Work from other sources and hold the Firm responsible for any and all costs resulting in the purchase of additional Work and materials necessary to perform the Service(s). This remedy shall be in addition to any other remedies that the Owner may have.
- 2.23. Failure to Enforce:** Failure by the Owner at any time to enforce the provisions of the Contract shall not be construed as a waiver of any such provisions. Such failure to enforce shall not affect the validity of the Contract or any part thereof or the right of the Owner to enforce any provision of the Contract Documents at any time in accordance with the terms thereof.
- 2.24. Force Majeure:** The Firm shall not be held responsible for failure to perform the duties and responsibilities imposed by the Contract due to legal strikes, fires, riots, rebellions, and acts of God beyond the control of the Firm, unless otherwise specified in the Contract.
- 2.25. Independent Firm:** The Firm shall be legally considered an independent Firm and neither the Firm nor its employees shall, under any circumstances, be considered servants or agents of the Owner. The Owner shall be at no time legally responsible for any negligence or other wrongdoing by the Firm, its servants, or agents. The Owner shall not withhold from the Contract payments to the Firm any federal or state unemployment taxes, federal or state income taxes, Social Security, or any other amounts for benefits to the Firm. Further, the Owner shall not provide to the Firm any insurance coverage or other benefits, including Service(s)ers' Compensation, normally provided by the Owner for its employees.
- 2.26. Nonconforming Terms and Conditions:** A response that includes terms and conditions that do not conform to the terms and conditions of this Solicitation is subject to rejection as non-responsive. The Owner reserves the right to permit the Firm to withdraw nonconforming terms and conditions from its response prior to a determination by the Owner of non-responsiveness based on the submission of nonconforming terms and conditions.
- 2.27. Ownership:** All plans, prints, designs, concepts, etc., shall become the property of the Owner.
- 2.28. Patents/Copyrights:** The Firm agrees to protect the Owner from any claims involving infringements of patents and/or copyrights. In no event shall the Owner be liable to the Firm for any/all suits arising on the grounds of patent(s)/copyright(s) infringement. Patent/copyright infringement shall null and void any agreement resulting from response to this Solicitation.
- 2.29. Remedies:** The Firm and Owner agree that both parties have all rights, duties, and remedies available as stated in the Uniform Commercial Code.

- 2.30. Governing Law:** Any agreement as a result of responding to this Solicitation shall be deemed to have been made in, and shall be construed and interpreted in accordance with, the laws of the City of Grand Junction, Mesa County, Colorado.
- 2.31. Expenses:** Expenses incurred in preparation, submission, and presentation of a response to this Solicitation are the responsibility of the Firm and cannot be charged to the Owner.
- 2.32. Sovereign Immunity:** The Owner specifically reserves its right to sovereign immunity pursuant to Colorado Law as a defense to any action arising out of or under a Contract.
- 2.33. Public Funds/Non-Appropriation of Funds:** Funds for payment have been provided through the Owner's budget approved by the City Council/Board of County Commissioners for the stated fiscal year only. Colorado law prohibits the obligation and expenditure of public funds beyond the fiscal year for which a budget has been approved. Therefore, anticipated orders or other obligations that may arise past the end of the stated Owner's fiscal year shall be subject to budget approval. The Contract will be subject to and provide a non-appropriation of funds clause.
- 2.34. Cooperative Purchasing:** Purchases as a result of this solicitation are primarily for the Owner. Other governmental entities may be extended the opportunity to utilize the resultant Contract award with the agreement of the successful provider and the participating agencies. All participating entities shall be required to abide by the specifications, terms, conditions, and pricings established in this Solicitation. The quantities furnished in this bid document are for only the Owner. It does not include quantities for any other jurisdiction. The Owner shall be responsible only for the award for its jurisdiction. Other participating entities shall place its own awards on its respective Contract/Purchase Orders through its Purchasing Office or use its Purchasing Card for purchase/payment as authorized or agreed upon between the provider and the individual entity. The Owner accepts no liability for payment of orders placed by other participating jurisdictions that choose to piggy-back on our solicitation. Orders placed by participating jurisdictions under the terms of this solicitation shall indicate its specific delivery and invoicing instructions.
- 2.35. Definitions:**
- 2.35.1.** The term "Work" includes all labor, materials, equipment, and/or services necessary to produce the requirements of the Contract Documents.
- 2.35.2.** "City" is the City of Grand Junction, Colorado and is referred to throughout the Contract Documents. The term City means the City or its authorized representative. Based on such observations and the Firm's Application for Payment, the City will determine the amounts owing to the Firm and will issue Certificates for Payment in such amounts, as provided in the Contract. The City will have authority to reject Service(s) which does not conform to the Contract documents. Whenever, in its reasonable opinion, it considers it necessary or advisable to ensure the proper implementation of the intent of the Contract Documents, it will

have authority to require the Firm to stop the Service(s) or any portion, or to require special inspection or testing of the Service(s), whether or not such Service(s) can be then be fabricated, installed, or completed. The City will not be responsible for the acts or omissions of the Firm, and sub-Firm, or any of its agents or employees, or any other persons performing any of the Service(s).

**2.35.3.** “Firm” is the person, organization, firm, or consultant identified as such in the Agreement and is referred to throughout the Contract Documents. The term Firm means the Firm or its authorized representative. The Firm shall carefully study and compare the General Contract Conditions of the Contract, Specification and Drawings, Scope of Work, Addenda and Modifications and shall at once report to the Owner any error, inconsistency, or omission it may discover. Firm shall not be liable to the Owner for any damage resulting from such errors, inconsistencies, or omissions. The Firm shall not commence Work without clarifying Drawings, Specifications, or Interpretations.

**2.35.4.** “Sub-Contractor” is a person or organization who has a direct Contract with the Firm to perform any of the work at the site. The term sub-contractor is referred to throughout the Contract documents and means a sub-contractor or its authorized representative.

### **3. Specifications and Special Conditions & Provisions**

**3.1. General:** The City of Grand Junction is soliciting competitive bids from qualified and interested companies for all labor, equipment, and materials required to provide and deliver the following **forestry chemical and treatments**.

Delivery costs of the product to the City of Grand Junction must be included in the bid price.

**It is the intent of the City to Award Firm(s) by Category, although the City reserves the right to make award(s) in the best interest of the City.**

**3.2. Specifications:**

2024 City of Grand Junction Plant Health Care Chemical Products

*Products being proposed in this bid must not be restricted use formulations in Colorado.*

*Bids for urban forestry treatments must be product / brand specific.*

*Bids for Japanese beetle and vegetation management treatments must be a product / brand that has active ingredients as close to listed percentages as possible.*

#### **Urban Forestry Tree Treatments**

*The following urban forestry products must be bid as product / brand name listed below.*

- Product name: **Mectinite**
  - Active ingredient: 4% liquid emamectin benzoate
  - Preference will be given towards solutions containing lowest signal word (i.e. “Caution” over “Warning” or “Danger”)
  - Provide price per quart

- Product name: **Xytect**
  - Active ingredient: Imidacloprid 21.4%
  - Provide price per gallon
- Product name: **Transtect**
  - Active ingredient: Dinotefuran 70%
  - Water soluble packets
  - Must be formulated for ornamental use
  - Provide price per 20 water soluble packets
- Product name: **Lepitect**
  - Active ingredient: Acephate 97.4%
  - Provide price per 10 oz pouch

### **Japanese Beetle Treatments**

- 22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea.
  - Provide price per ton in 1,000 lbs totes (2,000 total lbs)
  - Provide price per 50 lbs bag

### **Vegetation Management Products**

- Product name: Ecomazapyr 2 SL
  - Active ingredient: Imazapyr 27.8%
  - Provide price per quart
- Product name: Pendulum Aquacap
  - Active ingredient: Pendimethalin 38.7%
  - Provide price per 2.5 gallons
- Product name: Q4 Plus
  - Active ingredient: Quinclorac 8.93%/ Sulfentrazone 0.69% / 2, 4-D 11.81%/ Dicamba 1.49%
  - Provide price per quart
- Product name: T-Zone
  - Active ingredient: Triclopyr 77.2% / Sulfentrazone 0.66%
  - Provide price per quart
- Product name: Ranger Pro
  - Active ingredient: Glyphosate 41%
  - Provide price per 2.5 gallons
- Product name: Rodeo (aquatic safe)
  - Active ingredient: Glyphosate 53.8%
  - Provide price per 2.5 gallons
- Product name: Flumigard WDG
  - Active ingredient: Flumioxazin 51%
  - Provide price per gallon
- Product name: Snap Shot 2.5TG
  - Active ingredient: trifluralin 2% / isoxabin 0.5%
  - Provide price per 50 lbs bag
- Scythe
  - Active ingredient: Pelargonic Acid 57%

- Provide price per 2.5 gallons

### **3.3. Special Conditions & Provisions:**

#### **3.3.1. Questions Regarding Solicitation Process/Scope of Work:**

Kassy Hackett, Buyer  
City of Grand Junction  
[kassyh@gjcity.org](mailto:kassyh@gjcity.org)

#### **3.3.2. Project Manager:** The Project Manager for the purchase is Rob Davis, who can be reached at (970) 254-3825. After Award, all communications directed to the City shall be addressed and mailed or delivered to:

City of Grand Junction  
Park & Recreation Department  
Attn: Rob Davis, Project Manager  
333 West Avenue, Building C  
Grand Junction, CO 81501

#### **3.3.3. Contract Administrator:** The Contract Administrator for the Project is Duane Hoff Jr., Contract Administrator, who can be reached at (970)244-1545. After Award, contract related inquiries, issues, and other communications shall be directed to:

Duane Hoff Jr., Contract Administrator  
[duaneh@gjcity.org](mailto:duaneh@gjcity.org)

#### **3.3.4. Materials Specifications Sheet:** Bidders shall supply materials specifications sheets for all products proposed for bid, with their bid submittals.

#### **3.3.5. Rejection of Products/Supplies:** The City of Grand Junction reserves the right to return products/supplies due to product flaws and/or not meeting specifications. Judgment of non-conformity will be at the discretion of the City of Grand Junction Project Manager.

#### **3.3.6. Delivery Location:** Items shall be delivered "F.O.B. Destination – Freight Pre-paid and Allowed" to:

2529 High Country Court  
Grand Junction, CO 81501

**\*\*Please call before delivery to verify proper location of material drop.**  
**\*\* Rob Davis, (970) 254-3825**

**Map will be provided to awarded vendor.**

**3.3.7. Pricing:** Pricing shall be all inclusive to include but not be limited to: all labor, equipment, supplies, materials, freight (F.O.B. Destination – Freight Pre-paid and Allowed to each site), travel, mobilization costs, fuel, set-up and take down costs, and full-time inspection costs, and all other costs related to the successful completion of the project.

The Owner shall not pay nor be liable for any other additional costs including but not limited to: taxes, shipping charges, insurance, interest, penalties, termination payments, attorney fees, liquidated damages, etc.

**3.3.8. Minimum Order Quantities:** The bidder shall not establish a minimum order quantity for items under contract.

**3.3.9. Contract:** A binding contract shall consist of: (1) the IFB and any amendments thereto, (2) the bidder's response (bid) to the IFB, (3) clarification of the bid, if any, and (4) the City's Purchasing Department's acceptance of the bid by "Notice of Award" or by "Purchase Order". All Exhibits and Attachments included in the IFB shall be incorporated into the Contract by reference.

A. The Contract expresses the complete agreement of the parties and, performance shall be governed solely by the specifications and requirements contained therein.

B. Any change to the contract, whether by modification and/or supplementation, must be accomplished by a formal Contract amendment signed and approved by and between the duly authorized representative of the bidder and the City Purchasing Division or by a modified Purchase Order prior to the effective date of such modification. The bidder expressly and explicitly understands and agrees that no other method and/or no other document, including acts and oral communications by or from any person, shall be used or construed as an amendment or modification to the contract.

**3.3.12. Contract Period:** The original contract period shall be as stated in the Invitation for Bid (IFB). The contract shall not bind, nor purport to bind, the City for any contractual commitment in excess of the original contract period, which is March 7, 2024 to March 7, 2025.

**3.3.13. Renewals:** The awarded Contractor and the Owner agree that the Contract may, upon mutual agreement of the Contractor and the Owner, be extended under the terms and conditions of the Contract for up to three (3) additional one (1) year Contract periods, contingent upon the applicable fiscal year funding/appropriations.

**3.3.14. Authorized Representatives of the City:** Those authorized to represent the City shall include Purchasing Agent, Engineers, and Inspectors employed by the City, only.



**3.4. Firm's Bid Documents:** For Firm's convenience, the following is a list of forms/items to be submitted with the Firm's bid response. However, should a form/item not be listed in this section, but required in the solicitation documents, it is the Firm's responsibility to ensure all forms/items are submitted.

- **Firm's Bid Form**

- **Materials Specification Sheets**

**3.5. IFB Tentative Time Schedule:**

- |  |                   |
|--|-------------------|
| • Invitation for Bids available                  | February 6, 2024  |
| • Inquiry deadline, no questions after this date | February 15, 2024 |
| • Addendum issued, if needed                     | February 16, 2024 |
| • Response Deadline                              | February 22, 2024 |
| • Council Approval                               | March 6, 2024     |
| • Purchase Order executed                        | March 7, 2024     |

## 4. Firm's Bid Form

### IFB-5380-24-KH "Forestry Chemicals & Treatments"

Urban Forestry Tree Treatments			
Item	Qty	Description	Unit Price
1	Quart	<b>Mectinite</b> Active ingredient: 4% liquid emamectin benzoate	
2	Gallon	<b>Xytect</b> Active ingredient: Imidacloprid 21.4%	
3	20 water soluble packets	<b>Transtect</b> Active ingredient: Dinotefuran 70%	
4	10 oz pouch	<b>Xytect</b> Active ingredient: Acephate 97.4%	

Japanese Beetle Treatments			
Item	Qty	Description	Unit Price
5.a.	Ton in 1,000 lbs totes (2,000 total lbs)	22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea	
5.b.	50 lbs bag	22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea	

Vegetation Management Products			
Item	Qty	Description	Unit Price
6	Quart	<b>Ecomazapyr 2 SL</b> Active ingredient: Imazapyr 27.8%	
7	2.5 Gallons	<b>Pendulum Aquacap</b> Active ingredient: Pendimethalin 38.7%	
8	Quart	<b>Q4 Plus</b> Active ingredient: Quinclorac 8.93% / Sulfentrazone 0.69% / 2, 4-D 11.81% / Dicamba 1.49%	
9	Quart	<b>T-Zone</b> Active ingredient: Triclopyr 77.2% / Sulfentrazone 0.66%	
10	2.5 Gallons	<b>Ranger Pro</b> Active ingredient: Glyphosate 41%	

11	2.5 Gallons	<b>Rodeo (aquatic safe)</b> Active ingredient: Glyphosate 53.8%	
12	Gallon	<b>Flumigard WDG</b> Active ingredient: Flumioxazin 51%	
13	50 lbs bag	<b>Snap Shot 2.5TG</b> Active ingredient: trifluralin 2% / isoxabin 0.5%	
14	2.5 Gallons	<b>Scythe</b> Active ingredient: Pelargonic Acid 57%	

RECEIPT OF ADDENDA: the undersigned Vendor acknowledges receipt of Addenda to the Solicitation, Specifications, and other Contract Documents.

State number of Addenda received: \_\_\_\_\_.

*It is the responsibility of the Bidder to ensure all Addenda have been received and acknowledged.*

NOTES:

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DATE \_\_\_\_\_

- Direct purchases by the City of Grand Junction are tax exempt from Colorado Sales or Use Tax. Tax exempt #98-903544.
- The undersigned certifies that no Federal, State, County or Municipal tax will be added to the above quoted prices.
- Prompt payment discount of \_\_\_\_\_ percent of the net dollar amount will be offered to the City if the invoice is paid within \_\_\_\_\_ days after the receipt of the invoice. The Owner reserves the right to consider any such discounts when determining the bid award that are no less than Net 10 days.
- The undersigned certifies and agrees that this bid is submitted in accordance with all applicable Federal, State, County, and City laws.
- Standard Payment terms are N30.

\_\_\_\_\_  
(Company Name of Bidder – Typed or Printed)

\_\_\_\_\_  
(Phone Number of Bidder)

\_\_\_\_\_  
(Address of Bidder)  
Printed)

\_\_\_\_\_  
(Authorized Agent or Contact Name – Typed or

\_\_\_\_\_  
(City, State, and Zip Code)

\_\_\_\_\_  
(Authorized Signature)

\_\_\_\_\_  
(E-mail Address of Agent or Sales Contact)



Purchasing Division

## **ADDENDUM NO. 1**

**DATE:** February 16, 2024  
**FROM:** City of Grand Junction Purchasing Division  
**TO:** All Offerors  
**RE:** Forestry Chemicals & Treatments IFB-5380-24-KH

Offerors responding to the above referenced solicitation are hereby instructed that the requirements have been clarified, modified, superseded and supplemented as to this date as hereinafter described.

Please make note of the following clarifications:

1. **Q:** I'm not sure if this matters, but in the document it lists "Xytect" as 2 separate active ingredients. The 21.4% Imidicloprid is correct, where as the 97.4% Acephate is not. The 97.4% Acephate would have the trade name "Lepitect."

**A:** This has been updated in the addendum 1 version of the Firm's Bid Form.

Firm shall utilize the addendum 1 version of the Firm's Bid Form attached for their bid.

2. **Q:** What are the anticipated volumes of each product?

**A:** Please reference the addendum 1 version of the Firm's Bid Form for estimated quantities.

3. **Q:** Do you anticipate the city purchasing all products at once or spread out throughout the year?

**A:** For the Urban Forestry Tree Treatments & Vegetation Management Products, the City plans on making an initial large order after award and smaller orders, if needed, throughout the year. For the Japanese Beetle Treatments, we plan on doing one large order. The City may need to order more but it is highly unlikely.

4. **Q:** Will the city allow for a partial award? We are only looking to bid on urban forestry tree treatments.

**A:** The City will accept partial awards by category not by line item. Firm must be able to provide all line items in that category.

**It is the intent of the City to Award Firm(s) by Category, although the City reserves the right to make award(s) in the best interest of the City.**

5. **Q:** Can you provide an approximate need in tons of the 22-00-07 w/0.067% Acelepryn?

**A:** This has been updated in the addendum 1 version of the Firm's Bid Form.

Firm shall utilize the addendum 1 version of the Firm's Bid Form attached for their bid.

6. The following condition shall be added to section 3.3 Special Conditions & Provisions:

**Estimated Quantities:** The quantities indicated in this Invitation for Bid are **estimates** that pertain to the total aggregate quantities that may be ordered throughout the stated Contract period. Variation of quantities may increase or decrease. The estimates do not indicate single order amounts unless otherwise stated. The Owner makes no guarantees about single order quantities or total aggregate order quantities.

The original solicitation for the project noted above is amended as noted.

All other conditions of subject remain the same.

Respectfully,

A handwritten signature in black ink, appearing to read 'K. Hackett', with a stylized flourish at the end.

Kassy Hackett, Buyer  
City of Grand Junction, Colorado

# 1. Firm's Bid Form (Addendum 1)

IFB-5380-24-KH "Forestry Chemicals & Treatments"

Urban Forestry Tree Treatments					
Item	Description	Unit	Estimated Qty	Unit Price	Extended Price
1	<b>Mectinite</b> Active ingredient: 4% liquid emamectin benzoate	Quart	64		
2	<b>Xytect</b> Active ingredient: Imidacloprid 21.4%	Gallon	20		
3	<b>Transtect</b> Active ingredient: Dinotefuran 70%	20 water soluble packets	800 packets		
4	<b>Lepitect</b> Active ingredient: Acephate 97.4%	10 oz pouch	12		
Total:					

Japanese Beetle Treatments					
Item	Description	Unit	Estimated Qty	Unit Price	Extended Price
5.a.	22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea	Ton in 1,000 lbs totes (2,000 total lbs)	39 tons		
5.b.	22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea	50 lbs bag			
Total:					

Vegetation Management Products					
Item	Description	Unit	Estimated Qty	Unit Price	Extended Price
6	<b>Ecomazapyr 2 SL</b> Active ingredient: Imazapyr 27.8%	Quart	20		
7	<b>Pendulum Aquacap</b> Active ingredient: Pendimethalin 38.7%	2.5 Gallons	40		
8	<b>Q4 Plus</b> Active ingredient: Quinclorac 8.93% / Sulfentrazone 0.69% / 2, 4-D 11.81% / Dicamba 1.49%	Quart	40		
9	<b>T-Zone</b> Active ingredient: Triclopyr 77.2% / Sulfentrazone 0.66%	Quart	40		

10	<b>Ranger Pro</b> Active ingredient: Glyphosate 41%	2.5 Gallons	15		
11	<b>Rodeo (aquatic safe)</b> Active ingredient: Glyphosate 53.8%	2.5 Gallons	5		
12	<b>Flumigard WDG</b> Active ingredient: Flumioxazin 51%	Pounds	60		
13	<b>Snap Shot 2.5TG</b> Active ingredient: trifluralin 2% / isoxabin 0.5%	50 lbs bag	40		
14	<b>Scythe</b> Active ingredient: Pelargonic Acid 57%	2.5 Gallons	2		
<b>Total:</b>					

RECEIPT OF ADDENDA: the undersigned Vendor acknowledges receipt of Addenda to the Solicitation, Specifications, and other Contract Documents.

State number of Addenda received: \_\_\_\_\_.

*It is the responsibility of the Bidder to ensure all Addenda have been received and acknowledged.*

NOTES: \_\_\_\_\_

\_\_\_\_\_

DATE \_\_\_\_\_

- Direct purchases by the City of Grand Junction are tax exempt from Colorado Sales or Use Tax. Tax exempt #98-903544.
- The undersigned certifies that no Federal, State, County or Municipal tax will be added to the above quoted prices.
- Prompt payment discount of \_\_\_\_\_ percent of the net dollar amount will be offered to the City if the invoice is paid within \_\_\_\_\_ days after the receipt of the invoice. The Owner reserves the right to consider any such discounts when determining the bid award that are no less than Net 10 days.
- The undersigned certifies and agrees that this bid is submitted in accordance with all applicable Federal, State, County, and City laws.
- Standard Payment terms are N30.

\_\_\_\_\_  
(Company Name of Bidder – Typed or Printed)

\_\_\_\_\_  
(Phone Number of Bidder)

\_\_\_\_\_  
(Address of Bidder)

\_\_\_\_\_  
(Authorized Agent or Contact Name – Typed or Printed)

\_\_\_\_\_  
(City, State, and Zip Code)

\_\_\_\_\_  
(Authorized Signature)

\_\_\_\_\_  
(E-mail Address of Agent or Sales Contact)

# 1. Firm's Bid Form (Addendum 1)

IFB-5380-24-KH "Forestry Chemicals & Treatments"

Urban Forestry Tree Treatments					
Item	Description	Unit	Estimated Qty	Unit Price	Extended Price
1	<b>Mectinite</b> Active ingredient: 4% liquid emamectin benzoate	Quart	64	No Bid	
2	<b>Xytect</b> Active ingredient: Imidacloprid 21.4%	Gallon	20	No Bid	
3	<b>Transtect</b> Active ingredient: Dinotefuran 70%	20 water soluble packets	800 packets	No Bid	
4	<b>Lepitect</b> Active ingredient: Acephate 97.4%	10 oz pouch	12	No Bid	
Total:					

Japanese Beetle Treatments					
Item	Description	Unit	Estimated Qty	Unit Price	Extended Price
5.a.	22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea	Ton in 1,000 lbs totes (2,000 total lbs)	39 tons	No Bid	
5.b.	22-0-7 Fertilizer with .067 Acelepryn insecticide with 50% polymer coated sulfur coated urea	50 lbs bag		No Bid	
Total:					

Vegetation Management Products					
Item	Description	Unit	Estimated Qty	Unit Price	Extended Price
6	<b>Ecomazapyr 2 SL</b> Active ingredient: Imazapyr 27.8%	Quart	20	\$33.35 quart	\$667.00
7	<b>Pendulum Aquacap</b> Active ingredient: Pendimethalin 38.7%	2.5 Gallons	40	\$122.38 2.5 gal	\$4,895.20
8	<b>Q4 Plus</b> Active ingredient: Quinclorac 8.93% / Sulfentrazone 0.69% / 2, 4-D 11.81% / Dicamba 1.49%	Quart	40	\$38.25 quart	\$1,530.00
9	<b>T-Zone</b> Active ingredient: Triclopyr 77.2% / Sulfentrazone 0.66%	Quart	40	\$26.25 quart	\$1,050.00



10	<b>Ranger Pro</b> Active ingredient: Glyphosate 41%	2.5 Gallons	15	#42.00 2.5 gal.	#630.00
11	<del>Aqua Neat</del> <b>Rodeo (aquatic safe)</b> Active ingredient: Glyphosate 53.8%	2.5 Gallons	5	#70.00 2.5 gal.	#350.00
12	<b>Flumigard WDG</b> Active ingredient: Flumioxazin 51%	Pounds	60	#200.00 5 lbs.	#2,400.00
13	<b>Snap Shot 2.5TG</b> Active ingredient: trifluralin 2% / isoxabin 0.5%	50 lbs bag	40	#102.50 50 lb. bag	#4,100.00
14	<b>Scythe</b> Active ingredient: Pelargonic Acid 57%	2.5 Gallons	2	#180.63 2.5 gals.	#361.26
Total:					#15,983.46

RECEIPT OF ADDENDA: the undersigned Vendor acknowledges receipt of Addenda to the Solicitation, Specifications, and other Contract Documents.

State number of Addenda received: 1.

It is the responsibility of the Bidder to ensure all Addenda have been received and acknowledged.

NOTES: Total: Fifteen thousand nine hundred eighty three dollars and forty six cents.

DATE Feb. 20, 2024

- Direct purchases by the City of Grand Junction are tax exempt from Colorado Sales or Use Tax. Tax exempt #98-903544.
- The undersigned certifies that no Federal, State, County or Municipal tax will be added to the above quoted prices.
- Prompt payment discount of NA percent of the net dollar amount will be offered to the City if the invoice is paid within NA days after the receipt of the invoice. The Owner reserves the right to consider any such discounts when determining the bid award that are no less than Net 10 days.
- The undersigned certifies and agrees that this bid is submitted in accordance with all applicable Federal, State, County, and City laws.
- Standard Payment terms are N30.

Van Diest Supply Company  
(Company Name of Bidder - Typed or Printed)

640 Gooseberry Dr. Unit 1a03  
(Address of Bidder)

Longmont, CO 80503  
(City, State, and Zip Code)

Tom.kramlich@vdsc.com  
(E-mail Address of Agent or Sales Contact)

303-854-4673  
(Phone Number of Bidder)

Tom Kramlich  
(Authorized Agent or Contact Name - Typed or Printed)

Tom Kramlich  
(Authorized Signature)

1434 220th Street  
Webster City, IA 50595

Iowa - corporation

# Aqua Neat<sup>®</sup>

## Aquatic Herbicide

FOR USE ON EMERGED AQUATIC WEEDS AND BRUSH IN AQUATIC SITES. FOR USE IN FORESTRY (INCLUDING WEED CONTROL IN CHRISTMAS TREE PLANTATIONS), RIGHTS-OF-WAY, HABITAT RESTORATION AREAS, NON-CROP AND OTHER LISTED APPLICATION SITES.

### ACTIVE INGREDIENT:

Glyphosate, N-(phosphonomethyl)glycine,  
in the form of its isopropylamine salt\*..... 53.8%

**OTHER INGREDIENTS:**..... 46.2%

**TOTAL:**..... 100.0%

\*Contains 648 grams per litre or 5.4 pounds per U.S. gallon of the active ingredient, glyphosate, in the form of its isopropylamine salt. Equivalent to 480 grams per litre or 4 pounds per U.S. gallon of the acid, glyphosate.

### KEEP OUT OF REACH OF CHILDREN CAUTION / PRECAUCION

Si usted no entiende la etiqueta, busque a alguien para que se la explique a usted en detalle. (If you do not understand the label, find someone to explain it to you in detail.)

SEE INSIDE BOOKLET FOR FIRST AID AND  
ADDITIONAL PRECAUTIONARY STATEMENTS

For Chemical Spill, Leak, Fire, or  
Exposure, Call CHEMTREC  
(800) 424-9300

For Medical Emergencies Only,  
Call (877) 325-1840

EPA Reg. No. 228-365

Manufactured for  
Nufarm Americas Inc.  
11901 S. Austin Avenue  
Alsip, IL 60803





**PRECAUTIONARY STATEMENTS  
HAZARDS TO HUMANS AND DOMESTIC ANIMALS  
CAUTION / PRECAUCION**

Harmful if inhaled. Avoid breathing spray mist. Remove contaminated clothing and wash clothing before reuse. Wash thoroughly with soap and water after handling.

FIRST AID	
IF INHALED	<ul style="list-style-type: none"><li>• Move person to fresh air.</li><li>• If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible.</li><li>• Call a poison control center or doctor for further treatment advice.</li></ul>
<b>HOT LINE NUMBER</b> Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-877-325-1840 for emergency medical treatment information.	

**PERSONAL PROTECTIVE EQUIPMENT (PPE):**

Applicators and other handlers must wear long-sleeved shirt and long pants and shoes plus socks. Discard clothing and other absorbent materials that have been drenched or heavily contaminated with this product's concentrate. Do not reuse them. Follow manufacturer's instructions for cleaning/maintaining PPE. If no such instructions for washables exists, use detergent and hot water. Keep and wash PPE separately from other laundry.

**Engineering Control Statements:** When handlers use closed systems, enclosed cabs, or aircraft in a manner that meets the requirements listed in Worker Protection Standard (WPS) for agricultural pesticides [40 CFR 170.240 (d)], the handler PPE requirements may be reduced or modified as specified in the WPS.

USER SAFETY RECOMMENDATIONS
<b>Users Should:</b> <ul style="list-style-type: none"><li>• Wash hands before eating, drinking, chewing gum, using tobacco, or using the toilet.</li><li>• Remove clothing immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing.</li></ul>

**ENVIRONMENTAL HAZARDS**

For aquatic uses, do not contaminate water when disposing of equipment washwaters. Treatment of aquatic weeds can result in oxygen depletion or loss due to decomposition of dead plants. This oxygen loss can cause fish suffocation.

For terrestrial uses, do not apply directly to water, to areas where surface water is present or to intertidal areas below the mean high water mark.

In case of, SPILL OR LEAK, soak up and remove to a landfill. Do not contaminate water when disposing of equipment washwaters or rinsate.

**PHYSICAL OR CHEMICAL HAZARDS**

Spray solutions of this product should be mixed, stored and applied using only stainless steel, aluminum, fiberglass, plastic and plastic-lined steel containers.

DO NOT MIX, STORE OR APPLY THIS PRODUCT OR SPRAY SOLUTIONS OF THIS PRODUCT IN GALVANIZED STEEL OR UNLINED STEEL (EXCEPT STAINLESS STEEL) CONTAINERS OR SPRAY TANKS. This product or spray solutions of this product react with such containers and tanks to produce hydrogen gas which may form a highly combustible gas mixture. This gas mixture could flash or explode, causing serious personal injury, if ignited by open flame, spark, welder's torch, lighted cigarette or other ignition source.

**DIRECTIONS FOR USE**

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

Do not apply this product in a way that will contact workers or other persons, either directly or through drift. Only protected handlers may be in the area during application. For any requirements specific to your State or Tribe, consult the State or Tribal agency responsible for pesticide regulation.

Read the entire label before using this product. Use strictly in accordance with label precautionary statements and directions.

### **AGRICULTURAL USE REQUIREMENTS**

Use this product only in accordance with its labeling and with the Worker Protection Standard, 40 CFR Part 170. This Standard contains requirements for the protection of agricultural workers on farms, forests, nurseries, and greenhouses, and handlers of agricultural pesticides. It contains requirements for training decontamination, notification, and emergency assistance. It also contains specific instructions and exceptions pertaining to the statements on this label about personal protection equipment (PPE) and Restricted-Entry Interval. The requirements in this box only apply to uses of this product that are covered by the Worker Protection Standard.

Do not enter or allow worker entry into treated areas during the Restricted-Entry Interval (REI) of 12 hours.

PPE required for early entry to treated areas that is permitted under the Worker Protection Standard and that involves contact with anything that has been treated, such as plants, soil, or water, is: coveralls, shoes plus socks, and chemical-resistant gloves Category A (such as butyl rubber, natural rubber, neoprene rubber or nitrile rubber) > 14 mils.

### **NON-AGRICULTURAL USE REQUIREMENTS**

The requirements in this box apply to uses of this product that are NOT within the scope of the Worker Protection Standard for agricultural pesticides (40 CFR Part 170). The WPS applies when this product is used to produce agricultural plants on farms, forests, nurseries or greenhouses. Keep people and pets off treated areas until spray solution has dried to prevent transfer of this product onto desirable vegetation.

### **PRODUCT INFORMATION**

DO NOT APPLY THIS PRODUCT USING AERIAL SPRAY EQUIPMENT EXCEPT UNDER CONDITIONS AS SPECIFIED WITHIN THIS LABEL OR CURRENT SUPPLEMENTAL LABELING ISSUED BY MANUFACTURER.

This product, a water-soluble liquid, mixes readily with water and nonionic surfactant to be applied as a foliar spray after dilution and thoroughly mixing with water in accordance with label instructions for the control or destruction of many herbaceous and woody plants. Always use the higher rate of this product per acre within the specified range when vegetation is heavy or dense. When treating dense multi-canopied sites or woody vegetation or difficult-to-control herbaceous or woody plants.

This product moves through the plant from the point of foliage contact to and into the root system. Visible effects on most annual weeds occur within 2 to 4 days but on most perennial brush species may not occur for 7 days or more. Extremely cool or cloudy weather following treatment may slow the activity of this product and delay visual effects of control. Visible effects are a gradual wilting and yellowing of the plant which advances to complete browning of above-ground growth and deterioration of underground plant parts.

Unless otherwise directed on this label, delay application until vegetation has emerged and reached the stages described for control of such vegetation under the "WEEDS CONTROLLED" section of this label.

Unemerged plants arising from unattached underground rhizomes or root stocks of perennials or brush will not be affected by the spray and will continue to grow. For this reason best control of most perennial weeds or brush is obtained when treatment is made at late growth stages approaching maturity.

Always use the higher rate of this product per acre within the specified range when vegetation is heavy or dense.

Do not treat weeds or brush under poor growing conditions such as drought stress, disease or insect damage, as reduced control may result. Reduced results may also occur when treating weeds or brush heavily covered with dust.

Reduced control may result when applications are made to any weed or brush species that have been mowed, grazed or cut, and have not been allowed to regrow to the recommended stage for treatment.

Rainfall or irrigation occurring within 6 hours after application may reduce effectiveness. Heavy rainfall or irrigation within 2 hours after application may wash the product off the foliage and a repeat treatment may be required.

Mixing this product with herbicides or other materials not instructed in this label may result in reduced performance. However, unless otherwise prohibited on this label or the label of an intended tank mix product may be applied in combination with any herbicide registered for the same site, timing, and method of application. Observe the most restrictive label statements of various tank mix products used. TO THE FULLEST EXTENT PERMITTED BY LAW, BUYER AND ALL USERS ARE RESPONSIBLE FOR ALL LOSS OR DAMAGE IN CONNECTION WITH THE USE OR HANDLING OF MIXTURES OF THIS PRODUCT OR OTHER MATERIALS THAT ARE NOT EXPRESSLY SPECIFIED IN THIS LABEL.

For best results, spray coverage should be uniform and complete. Do not spray weed foliage to the point of runoff.

When this product comes in contact with soil (on the soil surface or as suspended soil or sediment in water) it is bound to soil particles. Under labeled use situations, once this product is bound to soil particles, it is not available for plant uptake and will not harm off-site vegetation where roots grow into the treatment area or if the soil is transported off-site. Under labeled use conditions, the strong affinity of this product to soil particles prevents this product from leaching out of the soil profile and entering ground water. The affinity between this product and soil particles remains until this product is degraded, which is primarily a biological degradation process carried out under both aerobic and anaerobic conditions by soil micro flora.



This product does not provide residual weed control. For subsequent residual weed control, follow a label-approved herbicide program. Read and carefully observe the cautionary statements and all other information appearing on the labels of all herbicides used. Read **"WARRANTY DISCLAIMER"** and **"LIMITATION OF LIABILITY"** before buying or using. If items are not acceptable, return at once unopened. Buyer and all users are responsible for all loss or damage in connection with the use of handling of mixtures of this product or other materials that are not expressly specified in this label.

For more product information, call toll-free 1-800-345-3330.

### **ATTENTION**

AVOID CONTACT WITH FOLIAGE, GREEN STEMS, EXPOSED NON-WOODY ROOTS, OR FRUIT OF CROPS, DESIRABLE PLANTS AND TREES, SINCE SEVERE INJURY OR DESTRUCTION MAY RESULT. AVOID DRIFT. EXTREME CARE MUST BE USED WHEN APPLYING THIS PRODUCT TO PREVENT INJURY TO DESIRABLE PLANTS AND CROPS.

Do not allow the herbicide solution to mist, drip, drift or splash onto desirable vegetation since minute quantities of this product can cause severe damage or destruction to the crop, plants or other areas on which treatment was not intended. The likelihood of plant or crop injury occurring from the use of this product is greatest when winds are gusty or in excess of 5 miles per hour or when other conditions, including lesser wind velocities, will allow spray drift to occur. When spraying, avoid combinations of pressure and nozzle type that will result in splatter or fine particles (mist) which are likely to drift. AVOID APPLYING AT EXCESSIVE SPEED OR PRESSURE.

NOTE: Use of this product in any manner not consistent with this label may result in injury to persons, animals or crops, or other unintended consequences. When not in use, keep container closed to prevent spills and contamination.

### **MIXING AND APPLICATION INSTRUCTIONS**

APPLY THESE SPRAY SOLUTIONS IN PROPERLY MAINTAINED AND CALIBRATED EQUIPMENT CAPABLE OF DELIVERING DESIRED VOLUMES. HAND-GUN APPLICATIONS SHOULD BE PROPERLY DIRECTED TO AVOID SPRAYING DESIRABLE PLANTS. NOTE: REDUCED RESULTS MAY OCCUR IF WATER CONTAINING SOIL IS USED, SUCH AS WATER FROM PONDS AND UNLINED DITCHES.

### **TANK MIXTURES**

Always predetermine the compatibility of labeled tank mixtures of this product with water carrier by mixing small proportional quantities in advance. Mix labeled tank mixtures of this product with water as follows:

1. Place a 20 to 35 mesh screen or wetting basket over filling port.
2. Through the screen, fill the spray tank one-half full with water and start agitation.
3. If a wettable powder is used, make a slurry with the water carrier, and add it SLOWLY through the screen into the tank. Continue agitation.
4. If a flowable formulation is used, premix one part flowable with one part water. Add diluted mixture SLOWLY through the screen into the tank. Continue agitation.
5. If an emulsifiable concentrate formulation is used, premix one part emulsifiable concentrate with two parts water. Add diluted SLOWLY through the screen into the tank. Continue agitation.
6. Continue filling the spray tank with water and add the required amount of this product near the end of the filling process.
7. Where nonionic surfactant is recommended, add this to the spray tank before completing the filling process.
8. Add individual formulations to the spray tank as follows: wettable powder, flowable, emulsifiable concentrate, drift control additive, water soluble liquid followed by surfactant.

Maintain good agitation at all times until the contents of the tank are sprayed. If the spray mixture is allowed to settle, thorough agitation is required to resuspend the mixture before spraying is resumed. To prevent or minimize foam, avoid the use of mechanical agitators, place the filling hose below the surface of the spray solution, terminate by-pass and return lines at the bottom of the tank and if needed use an approved anti-foam or defoaming agent.

Screen size in nozzle or line strainers should be no finer than 50 mesh. Carefully select proper nozzle to avoid spraying a fine mist. For best results with conventional ground application equipment, use flat fan nozzles.

Clean sprayer and parts immediately after using this product by thoroughly flushing with water.

For best results with conventional ground application equipment, use flat fan nozzles. Check for even distribution of spray droplets.

When using this product, mix 2 or more quarts of a nonionic surfactant per 100 gallons of spray solution. Use a nonionic surfactant labeled for use with herbicides. The surfactant must contain 50 percent or more active ingredient.

Always read and follow the manufacturer's surfactant label instructions for best results.

These surfactants should not be used in excess of 1 quart per acre when making broadcast applications.

Colorants or marking dyes approved for use with herbicides may be added to spray mixtures of this product. Colorants or dyes used in spray solutions of this product may reduce performance, especially at lower rates or dilutions. Use colorants or dyes according to the manufacturer's label instructions.

Clean sprayer and parts immediately after using this product by thoroughly flushing with water and dispose of rinsate according to labeled use or disposal instructions.

Carefully observe all cautionary statements and other information appearing in the surfactant label.

## APPLICATION EQUIPMENT AND TECHNIQUES

This product may be applied with the following application equipment:

**Aerial** - Fixed Wing and Helicopter

**Broadcast Spray**

**Controlled Droplet Applicator (CDA)** - Hand-held or boom-mounted applicators which produce a spray consisting of a narrow range of droplet sizes.

**Hand-Held and High-Volume Spray Equipment\*** - Knapsack and backpack sprayers, pump-up pressure sprayers, handguns, handwands, lances and other hand-held and motorized spray equipment used to direct the spray onto weed foliage.

\*This product is not registered in California or Arizona for use in mistblowers.

**Selective Equipment** - Recirculating sprayers and wiper applicators. See the appropriate part of this section for specific instructions and rates of application.

## APPLICATION INFORMATION

Observe the following directions to minimize off-site movement during aerial application of this herbicide. Minimization of off-site movement is the responsibility of the grower, Pest Control Advisor, and aerial applicator.

### AERIAL EQUIPMENT

Use the specified rates of this product and surfactant in 3 to 20 gallons of water per acre as a broadcast spray, unless otherwise specified. See the "WEEDS CONTROLLED" section of this label for specific rates. Unless otherwise specified, do not exceed 1.5 pints per acre. Aerial applications of this product may only be made as specified in this label.

**AVOID DRIFT** - DO NOT APPLY DURING LOW-LEVEL INVERSION CONDITIONS, WHEN WINDS ARE GUSTY OR UNDER ANY OTHER CONDITION WHICH WILL ALLOW DRIFT. DRIFT MAY CAUSE DAMAGE TO ANY VEGETATION CONTACTED TO WHICH TREATMENT IS NOT INTENDED. TO PREVENT INJURY TO ADJACENT DESIRABLE VEGETATION, APPROPRIATE BUFFER ZONES MUST BE MAINTAINED.

Coarse sprays are less likely to drift; therefore, do not use nozzles or nozzle configurations which dispense spray as fine spray droplets. Do not angle nozzles forward into the airstream and do not increase spray volume by increasing nozzle pressure above the manufacturer's instructions.

Drift control additives may be used. When a drift control additive is used, read and carefully observe the precautionary statements and all other information appearing in the additive label.

**Ensure uniform application** - To avoid streaked, uneven or overlapped application, use appropriate marking devices.

Thoroughly wash aircraft, especially landing gear, after each day of spraying to remove residues of this product accumulated during spraying or from spills. PROLONGED EXPOSURE OF THIS PRODUCT TO UNCOATED STEEL SURFACES MAY RESULT IN CORROSION AND POSSIBLE FAILURE OF THE PART. LANDING GEAR ARE MOST SUSCEPTIBLE. The maintenance of an organic coating (paint) which meets aerospace specification MIL-C-38413 may prevent corrosion.

For use of this product by air in California see additional instructions in "FOR AERIAL APPLICATION IN CALIFORNIA ONLY" Section.

### FOR AERIAL APPLICATION IN CALIFORNIA ONLY

EXTREME CARE MUST BE EXERCISED TO AVOID CONTACT OF SPRAY WITH FOLIAGE, GREEN STEMS, OR FRUIT OF DESIRABLE CROPS, PLANTS, TREES, OR OTHER DESIRABLE VEGETATION SINCE SEVERE DAMAGE OR DESTRUCTION MAY RESULT.

#### Written Directions

A written direction MUST be submitted by or on behalf of the applicator to the Fresno County Agricultural Commissioner 24 hours prior to the application. This written direction MUST state the proximity of surrounding crops, and that conditions of each manufacturer's applicable product label(s) and this label have been satisfied.

#### Aerial Applicator Training and Equipment

Aerial application of this herbicide is limited to pilots who have successfully completed a Fresno County Agricultural Commissioner and California Department of Pesticide Regulation approved training program for aerial application of herbicides. All aircraft must be inspected, critiqued in flight, and certified at a Fresno County Agricultural Commissioner approved fly-in. Test and calibrate spray equipment at intervals sufficient to insure that proper rates of herbicides and adjuvants are being applied during commercial use. Applicator must document such calibrations and testing. Demonstration of performance at Fresno County Agricultural Commissioner approved "fly-ins" constitutes such documentation, or other written records showing calculations and measurements of flight and spray parameters acceptable to the Fresno County Agricultural Commissioner.

#### Application at night

Do not apply this product by air earlier than 30 minutes prior to sunrise and/or later than 30 minutes after sunset without prior permission from the Fresno County Agricultural Commissioner.

#### Aquatic and Other Noncrop Sites

When applied as directed and under the conditions described in the "Weeds Controlled" section of the label booklet for this product, this herbicide will control or partially control the labeled weeds growing in the following industrial, recreational and public areas, or other similar sites.



**Aquatic Sites-including all bodies of fresh and brackish water which may be flowing, nonflowing or transient. This includes lakes, rivers, streams, ponds, seeps, irrigation and drainage ditches, canals, reservoirs, estuaries and similar sites.**

If aquatic sites are present in the noncrop areas and are part of the intended treatment, read and observe the following directions: There is no limit on the use of treated water for irrigation, recreation or domestic purposes.

Consult local state fish and game agency and water control authorities before applying this product to public water. Permits may be required to treat such water.

**NOTE:** Do not apply this product within 1/2 mile upstream of an active potable water intake in flowing water (i.e., river, stream, etc.) or within 1/2 mile of an active potable water intake in a standing body of water such as a lake, pond or reservoir. To make aquatic applications around and within 1/2 mile of active potable water intakes, the water intake must be turned off for a minimum period of 48 hours after the application. The water intake may be turned on prior to 48 hours if the glyphosate level in the intake water is below 0.7 parts per million as determined by laboratory analysis. These aquatic applications may be made ONLY in those cases where there are alternative water sources or holding ponds which would permit the turning off of an active potable water intake for a minimum period of 48 hours after application.

This product does not control plants which are completely submerged or have a majority of their foliage underwater.

**AVOID DRIFT - DO NOT APPLY WHEN WINDS ARE GUSTY OR UNDER ANY OTHER CONDITION WHICH WILL ALLOW DRIFT. DRIFT MAY CAUSE DAMAGE TO ANY VEGETATION CONTACTED TO WHICH TREATMENT IS NOT INTENDED. TO PREVENT INJURY TO ADJACENT DESIRABLE VEGETATION, APPROPRIATE BUFFER ZONES MUST BE MAINTAINED.**

Use the following guidelines when aerial applications are made near crops or desirable perennial vegetation after bud break and before total leaf drop, and/or near other desirable vegetation or annual crops.

1. Do not apply within 100 feet of all desirable vegetation or crop(s).
2. If wind up to 5 miles per hour is blowing toward desirable vegetation or crop(s), do not apply within 500 feet of the desirable vegetation or crop(s).
3. Winds blowing from 5 to 10 miles per hour toward desirable vegetation or crop(s) may require buffer zones in excess of 500 feet.
4. Do not apply when winds are in excess of 10 miles per hour or when inversion conditions exist.

**FOR AERIAL APPLICATION IN FRESNO COUNTY, CALIFORNIA ONLY**

From February 15 through March 31 only. For aerial application outside of these dates, refer to the "FOR AERIAL APPLICATION IN CALIFORNIA ONLY" section printed above.

**APPLICABLE AREA**

This supplement only applies to the area contained inside the following boundaries within Fresno County, California only.

North: Fresno County line  
South: Fresno County line  
East: State Highway 99  
West: Fresno County line

**BOOM EQUIPMENT**

For control of weed or brush species listed in this label using conventional boom equipment - Use the specified rates of this product and surfactant in 3 to 30 gallons of water per acre as a broadcast spray, unless otherwise specified. See the "WEEDS CONTROLLED" section of this label for specific rates. As density of vegetation increases, spray volume should be increased within the specified range to ensure complete coverage. Carefully select correct nozzle to avoid spraying a fine mist. For best results with ground application equipment, use flat fan nozzles. Check for even distribution of spray droplets.

**HAND-HELD AND HIGH-VOLUME EQUIPMENT**

Use Coarse Sprays Only

**For control of weeds listed in this label using knapsack sprayers or high-volume spraying equipment utilizing handguns or other suitable nozzle arrangements** - Prepare a 0.75 to 2 percent solution of this product in water, add a nonionic surfactant and apply to foliage of vegetation to be controlled. For specific rates of application and instructions for control of various annual and perennial weeds, see the "WEEDS CONTROLLED" section in this label.

Applications should be made on a spray-to-wet basis. Spray coverage should be uniform and complete. Do not spray to point of runoff.

This product may be used as a 5 to 8 percent solution plus 0.5 to 1 fluid ounce non-ionic surfactant per gallon spray solution for low-volume directed sprays for spot treatment of trees and brush. It is most effective in areas where there is a low density of undesirable trees or brush. If a straight stream nozzle is used, start the application at the top of the targeted vegetation and spray from top to bottom in a lateral zig-zag motion. Ensure that at least 50 percent of the leaves are contacted by the spray solution. For flat fan and cone nozzles and with hand-directed mist blowers, mist the application over the foliage of the targeted vegetation. Small, open-branched trees need only be treated from one side. If the foliage is thick or there are multiple root sprouts, applications must be made from several sides to ensure adequate spray coverage.

For use in knapsack sprayers, it is suggested that the specified amount of this product be mixed with water in a large container. Fill sprayer with the mixed solution and add the correct amount of surfactant.

Prepare the desired volume of spray solution by mixing the amount of this product in water as shown in the following table:

#### SPRAY SOLUTION

DESIRED VOLUME	AMOUNT OF PRODUCT					
	0.75%	1.0%	1.25%	1.5%	5.0%	8.0%
1 Gallon	1.0 fl. oz.	1.33 fl. oz.	1.66 fl. oz.	2.0 fl. oz.	6.0 fl. oz.	10.25 fl. oz.
25 Gallons	1.5 pts.	1.0 qt.	1.25 qts.	1.5 qts.	5.0 qts.	2.0 gals.
100 Gallons	3.0 qts.	1.0 gal.	1.25 gals.	1.5 gals.	5.0 gals.	8.0 gals.

2 Tablespoons = 1 fluid ounce

#### SELECTIVE EQUIPMENT

For terrestrial application, this product may be applied through a shielded applicator, or a wiper applicator after dilution and thorough mixing with water to listed weeds growing in any non-crop site specified on this label.

- A shielded applicator directs the herbicide solution onto weeds, while shielding desirable vegetation from the herbicide.
- A wiper applicator applies the herbicide solution onto weeds by rubbing the weed with an absorbent material containing the herbicide solution.

AVOID CONTACT WITH DESIRABLE VEGETATION.

This section summarizes the general weed control spectrum and rates of application for this herbicide. Additional information specific to individual use patterns is detailed in following sections.

#### SPRAY DRIFT MANAGEMENT

Avoiding spray drift at the application site is the responsibility of the applicator. The interaction of many equipment and weather related factors determine the potential for spray drift. The applicator and the grower are responsible for considering all these factors when making decisions. The following drift management requirements must be followed to avoid off-target drift movement from aerial applications. These requirements do not apply to forestry applications, public health uses or to applications using dry formulations.

1. The distance of the outer most operating nozzles on the boom must not exceed 3/4 the length of the rotor.
2. Nozzles must always point backward parallel with the air stream and never be pointed downward more than 45 degrees. Where states have more stringent regulations, they must be observed.

The applicator should be familiar with and take into account the information covered in the [Aerial Drift Reduction Advisory Information](#).

##### Importance of Droplet Size

The most effective way to reduce drift potential is to apply large droplets. The best drift management strategy is to apply the largest droplets that provide sufficient coverage and control. Applying larger droplets reduces drift potential, but will not prevent drift if applications are made improperly, or under unfavorable environmental conditions (see Wind, Temperature and Humidity, and Temperature Inversions sections of this label).

##### Controlling Droplet Size

- **Volume** - Use high flow rate nozzles to apply the highest practical spray volume. Nozzles with higher rated flows produce larger droplets.
- **Pressure** - Do not exceed the nozzle manufacturer's specified pressures. For many nozzle types, lower pressure produces larger droplets. When higher flow rates are needed, use higher flow rate nozzles instead of increasing pressure. Higher pressure reduces droplet size and does not improve canopy protection.
- **Number of Nozzles** - Use the minimum number of nozzles that provide uniform coverage.
- **Nozzle Orientation** - Orienting nozzles so that the spray is released backwards, parallel to the air stream produces larger droplets than other orientations. Significant deflection from horizontal will reduce droplet size and increase drift potential.
- **Nozzle Type** - Use a nozzle type that is designed for the intended application. With most nozzle types, narrower spray angles produce larger droplets. Consider using low-drift nozzles. Solid stream nozzles oriented straight back produce the largest droplets and the lowest drift.
- **Boom Length** - For some use patterns, reducing the effective boom length to less than 3/4 of the wingspan or rotor length may further reduce drift without reducing swath width.
- **Application Height** - Applications must not be made at a height greater than 10 feet above the top of the largest plants unless a greater height is required for aircraft safety. Making applications at the lowest height that is safe reduces exposure of droplets to evaporation and wind.

##### Swath Adjustment

When applications are made with a crosswind, the swath will be displaced downwind. Therefore, on the up and downwind edges of the field, the applicator must compensate for this displacement by adjusting the path of the aircraft upwind. Swath adjustment distance should increase, with increasing drift potential (higher wind, smaller drops, etc.).



## Wind

Drift potential is lowest between wind speeds of 2-10 mph. However, many factors, including droplet size and equipment type, determine drift potential at any given speed. Application should be avoided below 2 mph due to variable wind direction and high inversion potential. Note: Local terrain can influence wind patterns. Every applicator should be familiar with local wind patterns and how they affect spray drift.

## Temperature and Humidity

When making applications in low relative humidity, set up equipment to produce larger droplets to compensate for evaporation. Droplet evaporation is most severe when conditions are both hot and dry.

## Temperature Inversions

Applications must not occur during a local, low level temperature inversion because drift potential is high. Temperature inversions restrict vertical air mixing, which causes small suspended droplets to remain in a concentrated cloud. This cloud can move in unpredictable directions due to the light variable winds common during inversions. Temperature inversions are characterized by increasing temperatures with altitude and are common on nights with limited cloud cover and light to no wind. They begin to form as the sun sets and often continue into the morning. Their presence can be indicated by ground fog; however, if fog is not present, inversions can also be identified by the movement of the smoke from a ground source or an aircraft smoke generator. Smoke that layers and moves laterally in a concentrated cloud (under low wind conditions) indicates an inversion, while smoke that moves upward and rapidly dissipates indicates good vertical air mixing.

## Sensitive Areas

The pesticide should only be applied when the potential for drift to adjacent sensitive areas (e.g., residential areas, bodies of water, known habitat for threatened or endangered species, non-target crops) is minimal (e.g. when wind is blowing away from the sensitive areas).

# WEEDS CONTROLLED

## ANNUAL WEEDS

Apply to actively growing annual grasses and broadleaf weeds.

Allow at least 3 days after application before disturbing treated vegetation. After this period the weeds may be mowed, tilled or burned. See "DIRECTIONS FOR USE", "PRODUCT INFORMATION" and "MIXING AND APPLICATION INSTRUCTIONS" for labeled uses and specific application instructions.

**Broadcast Application** - Use 1-1/2 pints of this product per acre plus 2 or more quarts of a nonionic surfactant per 100 gallons of spray solution, if weeds are less than 6 inches tall. If weeds are greater than 6 inches tall, use 2-1/2 pints of this product per acre plus 2 or more quarts of an approved nonionic surfactant per 100 gallons of spray solution.

**Hand-Held, High-Volume Application** - Use a 3/4 percent solution of this product in water plus 2 or more quarts of a nonionic surfactant per 100 gallons of spray solution and apply to foliage of vegetation to be controlled.

When applied as directed under the conditions described in this label, this product plus nonionic surfactant WILL CONTROL the following ANNUAL WEEDS:

### Balsamapple\*\*

*Momordica charantia*

### Barley

*Hordeum vulgare*

### Barnyardgrass

*Echinochloa crus-galli*

### Bassia, fivehook

*Bassia hyssopifolia*

### Bluegrass, annual

*Poa annua*

### Bluegrass, bulbous

*Poa bulbosa*

### Brome\*

*Bromus* spp.

### Buttercup

*Ranunculus* spp.

### Cheat

*Bromus secalinus*

### Chickweed, mouseear

*Cerastium vulgatum*

### Cocklebur

*Xanthium strumarium*

### Corn, volunteer

*Zea mays*

### Crabgrass

*Digitaria* spp.

### Dwarf dandelion

*Krigia cespitosa*

### False dandelion

*Krigia cespitosa*

### Falseflax, smallseed

*Camelina microcarpa*

### Fiddleneck\*

*Amsinckia* spp.

### Flax leaf fleabane\*

*Conyza bonariensis*

### Fleabane

*Erigeron* spp.

### Foxtail

*Setaria* spp.

### Foxtail, Carolina

*Alopecurus carolinianus*

### Groundsel, common

*Senecio vulgaris*

### Horseweed/Marestail

*Conyza canadensis*

### Kochia\*

*Kochia scoparia*

### Lambsquarters, common

*Chenopodium album*

### Lettuce, prickly\*

*Lactuca serriola*

### Morningglory

*Ipomoea* spp.

### Mustard, blue

*Chorispora tenella*

### Mustard, tansy

*Descurainia pinnata*

### Mustard, tumble

*Sisymbrium altissimum*

### Mustard, wild

*Sinapis arvensis*

### Oats, wild

*Avena fatua*

### Panicum\*

*Panicum* spp.

(continued)

**Pennycress, field**  
*Thlaspi arvense*  
**Pigweed, redroot**  
*Amaranthus retroflexus*  
**Pigweed, smooth**  
*Amaranthus hybridus*  
**Ragweed, common\***  
*Ambrosia artemisiifolia*  
**Ragweed, giant\***  
*Ambrosia trifida*  
**Rocket, London**  
*Sisymbrium irio*  
**Rye**  
*Secale cereale*  
**Ryegrass, Italian\***  
*Lolium multiflorum*

**Sandbur, field**  
*Cenchrus* spp.  
**Shattercane**  
*Sorghum bicolor*  
**Shepherd's-purse**  
*Capsella bursa-pastoris*  
**Signalgrass, broadleaf**  
*Brachiaria platyphylla*  
**Smartweed, Pennsylvania**  
*Polygonum pensylvanicum*  
**Sowthistle, annual\***  
*Sonchus oleraceus*  
**Spanishneedles\***  
*Bidens bipinnata*  
**Spurry, umbrella**  
*Holosteum umbellatum*

**Stinkgrass**  
*Eragrostis ciliaris*  
**Sunflower\***  
*Helianthus annuus*  
**Thistle, Russian**  
*Salsola kali*  
**Velvetleaf\***  
*Abutilon theophrasti*  
**Wheat**  
*Triticum aestivum*  
**Witchgrass**  
*Panicum capillare*

\*Apply 3 pints of this product per acre.

\*\*Apply with hand-held equipment only.

Annual weeds will generally continue to germinate from seed throughout the growing season. Repeat treatments will be necessary to control later germinating weeds.

#### PERENNIAL WEEDS

Apply this product as follows to control or destroy most vigorously growing perennial weeds. Unless otherwise directed, allow at least 7 days after application before disturbing vegetation.

See individual control instructions for specific weeds following the table. For other perennials listed on this label, apply 4-1/2 to 7-1/2 pints of product per acre as a broadcast spray or as a 3/4 to 1-1/2 percent solution with hand-held equipment. Apply when target plants are actively growing and most have reached early head or early bud stage of growth.

Add 2 or more quarts of a nonionic surfactant per 100 gallons of spray solution to the rates of this product given in this list. See the "PRODUCT INFORMATION", "DIRECTIONS FOR USE" and "MIXING AND APPLICATION" sections in this label for specific uses and application instructions.

NOTE: If weeds have been mowed or tilled, do not treat until regrowth has reached the recommended stages. Fall treatments must be applied before a killing frost.

Repeat treatments may be necessary to control weeds regenerating from underground parts or seed.

When applied as specified under the conditions described, this product plus surfactant WILL CONTROL the following PERENNIAL WEEDS:

**Alfalfa**  
*Medicago sativa*  
**Alligatorweed\***  
*Alternanthera philoxeroides*  
**Anise/Fennel**  
*Foeniculum vulgare*  
**Artichoke, Jerusalem**  
*Helianthus tuberosus*  
**Bahiagrass**  
*Paspalum notatum*  
**Bermudagrass**  
*Cynodon dactylon*  
**Bindweed, field**  
*Convolvulus arvensis*  
**Bluegrass, Kentucky**  
*Poa pratensis*  
**Blueweed, Texas**  
*Helianthus ciliaris*  
**Brackenfern**  
*Pteridium* spp.  
**Bromegrass, smooth**  
*Bromus inermis*

**Canarygrass, reed**  
*Phalaris arundinacea*  
**Cattail**  
*Typha* spp.  
**Clover, red**  
*Trifolium pratense*  
**Clover, white**  
*Trifolium repens*  
**Cogongrass**  
*Imperata cylindrica*  
**Cordgrass**  
*Spartina* spp.  
**Cutgrass, giant\***  
*Zizaniopsis miliacea*  
**Dallisgrass**  
*Paspalum dilatatum*  
**Dandelion**  
*Taraxacum officinale*  
**Dock, curly**  
*Rumex crispus*  
**Dogbane, hemp**  
*Apocynum cannabinum*

**Fescue**  
*Festuca* spp.  
**Fescue, tall**  
*Festuca arundinacea*  
**Guineagrass**  
*Panicum maximum*  
**Hemlock, poison**  
*Conium maculatum*  
**Horsenettle**  
*Solanum carolinense*  
**Horseradish**  
*Armoracia rusticana*  
**Ice Plant**  
*Mesembryanthemum crystallinum*  
**Johnsongrass**  
*Sorghum halepense*  
**Kikuyugrass**  
*Pennisetum clandestinum*  
**Knapweed**  
*Centaurea repens*  
**Lantana**  
*Lantana camara*

(continued)



**Lespedeza: common, services**

*Lespedeza striata*  
*Lespedeza cuneata*

**Loosestrife, purple**

*Lythrum salicaria*

**Lotus, American**

*Nelumbo lutea*

**Maidencane**

*Panicum hematomon*

**Milkweed**

*Asclepias* spp.

**Muhly, wirestem**

*Muhlenbergia frondosa*

**Mullein, common**

*Verbascum thapsus*

**Napiergrass**

*Pennisetum purpureum*

**Nightshade, silverleaf**

*Solanum elaeagnifolium*

**Nutsedge: purple, yellow**

*Cyperus rotundus*  
*Cyperus esculentus*

**Orchardgrass**

*Dactylis glomerata*

**Pampas grass**

*Cortaderia jubata*

**Paragrass**

*Brachiaria mutica*

**Phragmites\*\***

*Phragmites* spp.

**Quackgrass**

*Agropyron repens*

**Reed, giant**

*Arundo donax*

**Ryegrass, perennial**

*Lolium perenne*

**Smartweed, swamp**

*Polygonum coccineum*

**Spatterdock**

*Nuphar luteum*

**Starthistle, yellow**

*Centaurea solstitialis*

**Sweet potato, wild\***

*Ipomoea pandurata*

**Thistle, artichoke**

*Cynara cardunculus*

**Thistle, Canada**

*Cirsium arvense*

**Timothy**

*Phleum pratense*

**Torpedograss\***

*Panicum repens*

**Tules, common**

*Scirpus acutus*

**Vaseygrass**

*Paspalum urvillei*

**Velvetgrass**

*Holcus* spp.

**Waterhyacinth**

*Eichornia crassipes*

**Waterlettuce**

*Pistia stratiotes*

**Waterprimrose**

*Ludwigia* spp.

**Wheatgrass, western**

*Agropyron smithii*

\*Partial control.

\*\*Partial control in southeastern states. See specific instructions below.

**Alligatorweed** - Apply 6 pints of this product per acre as a broadcast spray or as a 1-1/4 percent solution with hand-held equipment to provide partial control of alligatorweed. Apply when most of the target plants are in bloom. Repeat applications will be required to maintain such control.

**Bermudagrass** - Apply 7-1/2 pints of this product per acre as a broadcast spray or as a 1-1/2 percent solution with hand-held equipment. Apply when target plants are actively growing and when seedheads appear.

**Bindweed, field/Silverleaf Nightshade/Texas Blueweed** - Apply 6 to 7-1/2 pints of this product per acre as a broadcast spray west of the Mississippi River and 4-1/2 to 6 pints of this product per acre east of the Mississippi River. With hand-held equipment, use a 1-1/2 percent solution. Apply when target plants are actively growing and are at or beyond full bloom. For silverleaf nightshade, best results can be obtained when application is made after berries are formed. Do not treat when weeds are under drought stress. New leaf development indicates active growth. For best results apply in late summer or fall.

**Brackenfern** - Apply 4-1/2 to 6 pints of this product per acre as a broadcast spray or as a 3/4 to 1 percent solution with hand-held equipment. Apply to fully expanded fronds which are at least 18 inches long.

**Cattail** - Apply 4-1/2 to 6 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment. Apply when target plants are actively growing and are at or beyond the early-to-full bloom stage of growth. Best results are achieved when application is made during the summer or fall months.

**Cogongrass** - Apply 4-1/2 to 7-1/2 pints of this product per acre as a broadcast spray. Apply when cogongrass is at least 18 inches tall and actively growing in late summer or fall. Allow 7 or more days after application before tillage or mowing. Due to uneven stages of growth and the dense nature of vegetation preventing good spray coverage, repeat treatments may be necessary to maintain control.

**Cordgrass** - Apply 4-1/2 to 7-1/2 pints of this product per acre as a broadcast spray or as a 1 to 2 percent solution with hand-held equipment. Schedule applications in order to allow 6 hours before treated plants are covered by tidewater. The presence of debris and silt on the cordgrass plants will reduce performance. It may be necessary to wash targeted plants prior to application to improve uptake of this product into the plant.

**Cutgrass, giant** - Apply 6 pints of this product per acre as a broadcast spray or as a 1 percent solution with hand-held equipment to provide partial control of giant cutgrass. Repeat applications will be required to maintain such control, especially where vegetation is partially submerged in water. Allow for substantial regrowth to the 7- to 10-leaf stage prior to retreatment.

**Dogbane, hemp/Knapweed/Horseradish** - Apply 6 pints of this product per acre as a broadcast spray or as a 1-1/2 percent solution with hand-held equipment. Apply when target plants are actively growing and most have reached the late bud-to-flower stage of growth. For best results, apply in late summer or fall.

**Fescue, tall** - Apply 4-1/2 pints of this product per acre as a broadcast spray or as a 1 percent solution with hand-held equipment. Apply when target plants are actively growing and most have reached the boot-to-head stage of growth. When applied prior to the boot stage, less desirable control may be obtained.

**Guineagrass** - Apply 4-1/2 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment. Apply when target plants are actively growing and when most have reached at least the 7-leaf stage of growth.



**Johnsongrass/Bluegrass, Kentucky/Bromegrass, smooth/Canarygrass, reed/Orchardgrass/Ryegrass, perennial/Timothy/Wheatgrass, western** - Apply 3 to 4-1/2 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment. Apply when target plants are actively growing and most have reached the boot-to-head stage of growth. When applied prior to the boot stage, less desirable control may be obtained. In the fall, apply before plants have turned brown.

**Lantana** - Apply this product as a 3/4 to 1 percent solution with hand-held equipment. Apply to actively growing Lantana at or beyond the bloom stage of growth. Use the higher application rate for plants that have reached the woody stage of growth.

**Loosestrife, purple** - Apply 4 pints of this product per acre as a broadcast spray or as a 1 to 1-1/2 percent solution using hand-held equipment. Treat when plants are actively growing at or beyond the bloom stage of growth. Best results are achieved when application is made during summer or fall months. Fall treatments must be applied before a killing frost.

**Lotus, American** - Apply 4 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment. Treat when plants are actively growing at or beyond the bloom stage of growth. Best results are achieved when application is made during summer or fall months. Fall treatments must be applied before a killing frost. Repeat treatment may be necessary to control regrowth from underground parts and seeds.

**Maidencane/Paragrass** - Apply 6 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment. Repeat treatments will be required, especially to vegetation partially submerged in water. Under these conditions, allow for regrowth to the 7- to 10-leaf stage prior to retreatment.

**Milkweed, common** - Apply 4-1/2 pints of this product per acre as a broadcast spray or as a 1-1/2 percent solution with hand-held equipment. Apply when target plants are actively growing and most have reached the late bud-to-flower stage of growth.

**Nutsedge: purple, yellow** - Apply 4-1/2 pints of this product per acre as a broadcast spray, or as a 3/4 percent solution with hand-held equipment to control existing nutsedge plants and immature nutlets attached to treated plants. Apply when target plants are in flower or when new nutlets can be found at rhizome tips. Nutlets which have not germinated will not be controlled and may germinate following treatment. Repeat treatments will be required for long-term control.

**Pampasgrass** - Apply a 1-1/2 percent solution of this product with hand-held equipment when plants are actively growing.

**Phragmites** - For partial control of phragmites in Florida and the counties of other states bordering the Gulf of Mexico, apply 7-1/2 pints per acre as a broadcast spray or apply a 1-1/2 percent solution with hand-held equipment. In other areas of the U.S., apply 4 to 6 pints per acre as a broadcast spray or apply a 3/4 percent solution with hand-held equipment for partial control. For best results, treat during late summer or fall months when plants are actively growing and in full bloom. Due to the dense nature of the vegetation, which may prevent good spray coverage and uneven stages of growth, repeat treatments may be necessary to maintain control. Visual control symptoms will be slow to develop.

**Quackgrass/Kikuyugrass/Muhly, wirestem** - Apply 3 to 4-1/2 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment when most quackgrass or wirestem muhly is at least 8 inches in height (3- to 4-leaf stage of growth) and actively growing. Allow 3 or more days after application before tillage.

**Reed, giant/ice plant** - For control of giant reed and ice plant, apply a 1-1/2 percent solution of this product with hand-held equipment when plants are actively growing. For giant reed, best results are obtained when applications are made in late summer to fall.

**Spatterdock** - Apply 6 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment. Apply when most plants are in full bloom. For best results, apply during the summer or fall months.

**Sweet potato, wild** - Apply this product as a 1-1/2 percent solution using hand-held equipment. Apply to actively growing weeds that are at or beyond the bloom stage of growth. Repeat applications will be required. Allow the plant to reach the recommended stage of growth before retreatment.

**Thistle: Canada, artichoke** - Apply 3 to 4-1/2 pints of this product per acre as a broadcast spray or as a 1-1/2 percent solution with hand-held equipment for Canada thistle. To control artichoke thistle, apply a 2 percent solution as a spray to wet application. Apply when target plants are actively growing and are at or beyond the bud stage of growth.

**Torpedograss** - Apply 6 to 7-1/2 pints of this product per acre as a broadcast spray or as a 3/4 to 1-1/2 percent solution with hand-held equipment to provide partial control of torpedograss. Use the lower rates under terrestrial conditions, and the higher rates under partially submerged or a floating mat condition. Repeat treatments will be required to maintain such control.

**Tules, common** - Apply this product as a 1-1/2 percent solution with hand-held equipment. Apply to actively growing plants at or beyond the seedhead stage of growth. After application, visual symptoms will be slow to appear and may not occur for 3 or more weeks.

**Waterhyacinth** - Apply 5 to 6 pints of this product per acre as a broadcast spray or apply a 3/4 to 1 percent solution with hand-held equipment. Apply when target plants are actively growing and at or beyond the early bloom stage of growth. After application, visual symptoms may require 3 or more weeks to appear with complete necrosis and decomposition usually occurring within 60 to 90 days. Use the higher rates when more rapid visual effects are desired.

**Waterlettuce** - For control, apply a 3/4 to 1 percent solution using hand-held equipment to actively growing plants. Use higher rates where infestations are heavy. Best results are obtained from mid-summer through winter applications. Spring applications may require retreatment.

**Waterprimrose** - Apply this product as a 3/4 percent solution using hand-held equipment. Apply to plants that are actively growing at or beyond the bloom stage of growth, but before fall color changes occur. Thorough coverage is necessary for best control.

**Other perennials listed on this label** - Apply 4-1/2 to 7-1/2 pints of this product per acre as a broadcast spray or as a 3/4 to 1-1/2 percent solution with hand-held equipment. Apply when target plants are actively growing and most have reached early head or early bud stage of growth.

## WOODY BRUSH AND TREES

See individual control instructions for specific woody brush and trees to be controlled in the following table. For partial control of other woody brush and trees listed in the table, apply 1.5 to 7.5 quarts of this product per acre as a broadcast spray or as a 0.75 to 10 percent solution with hand-held equipment.

Apply the specified rate of this product plus 2 or more quarts of a nonionic surfactant per 100 gallons of spray solution when plants are actively growing and, unless otherwise directed, after full-leaf expansion. Use the higher rate for larger plants and/or dense areas of growth. On vines, use the higher rate for plants that have reached the woody stage of growth. Best results are obtained when application is made in late Summer or Fall after fruit formation.

Applied as a 5 to 8 percent solution as a directed application as described in the "HAND-HELD AND HIGH-VOLUME EQUIPMENT" section, this product will control or partially control all species listed in this section of the label. Use the higher rate of application for dense stands and larger woody brush and trees.

In arid areas, best results are obtained when application is made in the Spring or early Summer when brush species are at high moisture content and are flowering. Ensure thorough coverage when using hand-held equipment. Symptoms may not appear prior to frost or senescence with Fall treatment.

Allow 7 or more days after application before mowing or removal. Repeat treatments may be necessary to control plants regenerating from underground parts or seed. Some autumn colors on undesirable deciduous species are acceptable provided no major leaf drop has occurred. Reduced performance may result if Fall treatments are made following a frost.

### Application Rates<sup>1</sup>

METHOD OF APPLICATION	APPLICATION RATE	SPRAY VOLUME (Gallons/Acre)
<b>Broadcast</b> Aerial Ground	1.5 to 7.5 qts./ acre 1.5 to 7.5 qts./ acre	5 to 30 10 to 60
<b>Spray-to-Wet</b> Handgun, Backpack, Mistblower	0.75% to 2.0% by volume	Spray-to-Wet
<b>Low Volume Directed Spray<sup>2</sup></b> Handgun, Backpack, Mistblower	5.0% to 10.0% by volume	Partial Coverage

<sup>1</sup> Where repeat applications are necessary do not exceed 8.0 quarts per acre per year.

<sup>2</sup> For low volume directed spray applications, coverage should be uniform with at least 50 percent of the foliage contacted. For best results, coverage of the top one-half of the plant is important.

NOTE: If brush has been mowed or tilled or trees have been cut, do not treat until regrowth has reached the recommended stage of growth.

When applied as specified under the conditions described, this product plus surfactant CONTROLS or PARTIALLY CONTROLS the following woody brush plants and trees:

#### Alder

*Alnus* spp.

#### Ash\*

*Fraxinus* spp.

#### Aspen, quaking

*Populus tremuloides*

#### Bearclover, Bearmat

*Chamaebatia foliolosa*

#### Birch

*Betula* spp.

#### Blackberry

*Rubus* spp.

#### Broom:

##### French

*Cytisus monspessulanus*

##### Scotch

*Cytisus scoparius*

#### Buckwheat, California\*

*Eriogonum fasciculatum*

#### Cascara\*

*Rhamnus purshiana*

#### Catsclaw\*

*Acacia greggi*

#### Ceanothus

*Ceanothus* spp.

#### Chamise

*Adenostoma fasciculatum*

#### Cherry:

##### Bitter

*Prunus emarginata*

##### Black

*Prunus serotina*

##### Pin

*Prunus pensylvanica*

#### Coyote brush

*Baccharis consanguinea*

#### Creeper, Virginia\*

*Parthenocissus quinquefolia*

#### Dewberry

*Rubus trivialis*

#### Dogwood

*Cornus* spp.

#### Elderberry

*Sambucus* spp.

#### Elm\*

*Ulmus* spp.

#### Eucalyptus, bluegum

*Eucalyptus globules*

#### Hasardia\*

*Haplopappus squamosus*

#### Hawthorn

*Crataegus* spp.

#### Hazel

*Corylus* spp.

#### Hickory

*Carya* spp.

#### Holly, Florida; Brazilian Peppertree

*Schinus terebinthifolius*

#### Honeysuckle

*Lonicera* spp.

#### Hornbeam, American

*Carpinus caroliniana*



**Kudzu***Pueraria lobata***Locust, black\****Robinia pseudoacacia***Manzanita***Arctostaphylos* spp.**Maple:****Red\*\****Acer rubrum***Sugar***Acer saccharum***Vine\****Acer circinatum***Monkey Flower\****Mimulus guttatus***Oak:****Black\****Quercus velutina***Northern pine***Quercus palustris***Post***Quercus stellata***Red***Quercus rubra***Southern red***Quercus falcata***White\****Quercus alba***Persimmon\****Diospyros* spp.**Poison Ivy***Rhus radicans***Poison Oak***Rhus toxicodendron***Poplar, yellow\****Liriodendron tulipifera***Prunus***Prunus* spp.**Raspberry***Rubus* spp.**Redbud, eastern***Cercis canadensis***Rose, multiflora***Rosa multiflora***Russian-olive***Elaeagnus angustifolia***Sage: black, white***Salvia* spp.**Sagebrush, California***Artemisia californica***Salmonberry***Rubus spectabilis***Salt cedar\****Tamarix* spp.**Saltbush, Sea myrtle***Baccharis halimifolia***Sassafras***Sassafras albidum***Sourwood\****Oxydendrum arboreum***Sumac:****Poison\****Rhus vernix***Smooth\****Rhus glabra***Winged\****Rhus copallina***Sweet gum***Liquidambar styraciflua***Swordfern\****Polystichum munitum***Tallowtree, Chinese***Sapium sebiferum***Thimbleberry***Rubus parviflorus***Tobacco, tree\****Nicotiana glauca***Trumpet creeper***Campsis radicans***Waxmyrtle, southern\****Myrica cerifera***Willow***Salix* spp.

\*Partial control

\*\*See below for control or partial control instruction.

See the "DIRECTIONS FOR USE" and "MIXING AND APPLICATION INSTRUCTIONS" sections in this label for labeled use and specific application instructions.

Apply the product as follows to control or partially control the following woody brush and trees.

**Alder/Blackberry/Dewberry/Honeysuckle/Oak, Post/Raspberry** - For control, apply 4-1/2 to 6 pints per acre as a broadcast spray or as a 3/4 to 1-1/4 percent solution with hand-held equipment.

**Aspen, Quaking/Hawthorn/Trumpet creeper** - For control, apply 3 to 4-1/4 pints of this product per acre as a broadcast spray or as a 3/4 to 1-1/4 percent solution with hand-held equipment.

**Birch/Elderberry/Hazel/Salmonberry/Thimbleberry** - For control, apply 3 pints per acre of this product as a broadcast spray or as a 3/4 percent solution with hand-held equipment.

**Broom: French, Scotch** - For control, apply a 1-1/4 to 1-1/2 percent solution with hand-held equipment.

**Buckwheat, California/Hasardia/Monkey Flower/Tobacco, Tree** - For partial control of these species apply a 3/4 to 1-1/2 percent solution of this product as a foliar spray with hand-held equipment. Thorough coverage of foliage is necessary for best results.

**Catsclaw** - For partial control, apply a 1-1/4 to 1-1/2 percent solution with hand-held equipment when at least 50 percent of the new leaves are fully developed.

**Cherry: Bitter, Black, Pin/Oak, Southern Red/Sweet Gum/Prunus** - For control, apply 3 to 7-1/2 pints of this product per acre as a broadcast spray or as a 1 to 1-1/2 percent solution with hand-held equipment.

**Coyote brush** - For control, apply a 1-1/4 to 1-1/2 percent solution with hand-held equipment when at least 50 percent of the new leaves are fully developed.

**Dogwood/Hickory/Salt cedar** - For partial control, apply a 1 to 2 percent solution of this product with hand-held equipment or 6 to 7-1/2 pints per acre as a broadcast spray.

**Eucalyptus, bluegum** - For control of eucalyptus resprouts, apply a 1-1/2 percent solution of this product with hand-held equipment when resprouts are 6- to 12-feet tall. Ensure complete coverage. Apply when plants are actively growing. Avoid application to drought-stressed plants.

**Holly, Florida/Waxmyrtle, southern** - For partial control, apply this product as a 1-1/2 percent solution with hand-held equipment.

**Kudzu** - For control, apply 6 pints of this product per acre as a broadcast spray or as a 1-1/2 percent solution with hand-held equipment. Repeat applications will be required to maintain control.

**Maple, Red** - For control, apply as a 3/4 to 1-1/4 percent solution with hand-held equipment when leaves are fully developed. For partial control, apply 2 to 7-1/2 pints of this product per acre as a broadcast spray.

**Maple, Sugar/Oak: Northern Pine, Red** - For control, apply as a 3/4 to 1-1/4 percent solution with hand-held equipment when at least 50 percent of the new leaves are fully developed.

**Poison Ivy/Poison Oak** - For control, apply 6 to 7-1/2 pints of this product per acre as a broadcast spray or as a 1-1/2 percent solution with hand-held equipment. Repeat applications may be required to maintain control. Fall treatments must be applied before leaves lose green color.

**Rose, multiflora** - For control, apply 3 pints of this product per acre as a broadcast spray or as a 3/4 to 1-1/2 percent solution with handheld equipment. Treatments should be made prior to leaf deterioration by leaf-feeding insects.

**Sage, black/Sagebrush, California/Chamise/Tallowtree, Chinese** - For control of these species, apply a 3/4 percent solution with hand-held equipment. Thorough coverage of foliage is necessary for best results.

**Saltbush, Sea myrtle** - For control, apply this product as a 1 percent solution with hand-held equipment.

**Willow** - For control, apply 4-1/2 pints of this product per acre as a broadcast spray or as a 3/4 percent solution with hand-held equipment.

**Other woody brush and trees listed in this label** - For partial control, apply 3 to 7-1/2 pints of this product per acre as a broadcast spray or as a 3/4 to 1-1/2 percent solution with hand-held equipment.

## NON-CROP USES

See "PRODUCT INFORMATION" and "MIXING AND APPLICATION INSTRUCTIONS" sections of this label for essential product performance information and the following "NON-CROP" sections for specific uses.

EXTREME CARE MUST BE EXERCISED TO AVOID CONTACT OR SPRAY WITH FOLIAGE, GREEN STEMS, EXPOSED NON-WOODY ROOTS OR FRUIT OF CROPS, DESIRABLE TURFGRASSES, TREES, SHRUBS OR OTHER DESIRABLE VEGETATION SINCE SEVERE DAMAGE OR DESTRUCTION MAY RESULT.

Repeat treatments may be necessary to control weeds regenerating from underground parts or seeds. Where repeat applications are necessary, do not exceed 8 quarts of this product per acre per year.

This product does not provide residual weed control. For subsequent weed control, follow a label-approved herbicide program.

Read and carefully observe the cautionary statements and all other information appearing on the labels of all herbicides used.

## INDUSTRIAL, RECREATIONAL AND PUBLIC AREAS

When applied as directed for "NON-CROP USES", under conditions described, this product may be used to control the listed weeds.

**Non-Crop Sites** - This product may be used to control the listed weeds in terrestrial noncrop sites and/or in aquatic sites within these areas:

airfields; airports; alleys, lanes, trails & access roads; around commercial or industrial structures or outbuildings; around farm and ranch structures and outbuildings; around ornamental gardens; around ornamental trees & shrubs; bare ground; beaches; campgrounds; construction sites; ditch banks; drive-in theaters; driveways & ramps; dry ditches & canals; fences & fencerows; firebreaks; golf courses; gravel yards; habitat restoration & management areas; highways & roadsides (including aprons, medians, guardrails & right of ways); industrial plant sites; industrial areas; lumber yards; mulched areas; natural areas; paths and trails; parking areas; parks; paved areas; petroleum & other tank farms; pumping installations; pipeline, power, telephone & utility rights-of-way; power stations; preplant to turf & ornamental plants; railroad rights-of way; recreation areas; refineries; resorts; schools; sidewalks; sports areas; storage areas; substations; tennis courts; uncropped farmstead areas; uncultivated non-agricultural areas; vacant lots; walkways; wastelands; & wildlife habitat areas

When applied as directed for "NON-CROP USES", under conditions described, this product may be used to control the listed weeds in terrestrial non-crop sites within these areas: Habitat Restoration & Management Area, Pipeline, Power, Telephone & Utility Rights-of-Way and Pumping Installations.

This product is a non-selective herbicide that is diluted and applied to the foliage of actively growing weeds as a spot or broadcast application. It is absorbed by the leaves and moves throughout the stem and roots to control the entire plant. Visible symptoms may require a week or more to appear, with burndown usually occurring in 2 to 4 weeks. Symptoms are a gradual wilting and yellowing of the sprayed plant followed by deterioration of both shoots and roots. This product has no herbicide activity in the soil and will not wash or leach to affect nearby vegetation. Any ornamental species may be planted in treated areas 7 days or more after application. For most effective results, delay mowing, clipping, planting or sodding of treated areas for at least 7 days after application. This allows time for this product to move within the plant.

For specific rates of application and instructions for control of particular annual weeds, perennial weeds, woody brush and trees, see the "WEEDS CONTROLLED" section of this label. These applications may be made to large affected areas or as spot treatments. For general use in small areas, see alternative instructions below under "Small Area Treatment With Hand-held Sprayers".

Unless the "Agriculture Use Requirements" on this label are observed, the following restrictions apply:

Not for use on plants being grown for sale or other commercial use, or for commercial seed production, or for research purposes. For use on plants intended for aesthetic purposes or climactic modification and being grown in ornamental gardens or parks, or on golf courses or lawns and grounds.



AVOID SPRAY DRIFT CONTACT WITH DESIRABLE LAWN GRASSES, FLOWERS, VEGETABLES, SHRUBS OR TREES. DO NOT CONTACT GREEN BARK OF TREES OR SHRUBS. IF DESIRABLE VEGETATION IS CONTACTED, WASH IMMEDIATELY WITH WATER.

Depending on the type of non-crop application, this product may be applied with boom equipment, high-volume spray equipment and hand-held sprayers as described in the respective portions of the "APPLICATION EQUIPMENT AND TECHNIQUES" section of the label. Additionally, the product may be applied with recirculating sprayers, shielded applicators, or wiper applicators in any non-crop site specified on this label. See the "Selective Equipment" part of "APPLICATION EQUIPMENT AND TECHNIQUES" section of this label for information on proper use and calibration of this equipment.

#### **Small Area Treatment With Hand-held Sprayers**

Add 2.25 to 4.5 fluid ounces of this product plus 0.5 to 1 fluid ounce of nonionic surfactant to 1 gallon of clean water. Use the low rate for many grasses and annual weeds. Use the higher specified rate for control of perennials and brush. Use pump-up sprayer, backpack sprayer or other sprayer suitable for small areas. Adjust equipment to deliver a coarse spray pattern. USE OF HOSE-END SPRAYERS OR SPRINKLER-TYPE DEVICES MAY NOT BE USED.

#### **TANK MIXTURES FOR NON-CROP SITES**

When applied as a tank mixture, this product provides control of the emerged annual weeds and partial control of the emerged perennial weeds listed in this label. When applied as a tank mixture, the following residual herbicides will provide preemergence control of the weeds listed in the individual product labels.

**This product PLUS Diuron**  
**This product PLUS Krovar® I**  
**This product PLUS Princep®, Caliber®90, Simazine 4L, 80W or 90DF**  
**This product PLUS Surflan®75W, Surflan AS**  
**This product PLUS Ronstar®50WP**  
**This product PLUS Spyder or Spyder Extra**  
**This product PLUS ProClipse**  
**This product PLUS Polaris AC Complete**

When tank mixing with residual herbicides, add a nonionic surfactant at 0.5 to 1 percent by volume of spray solution. See the "APPLICATION EQUIPMENT AND TECHNIQUES" section of this label before preparing these tank mixtures.

Read and carefully observe the label claims, precautionary statements, specified use rate and all other information on the labels of all products used in these tank mixtures.

Use according to the most restrictive label directions for each product in the mixture.

#### **CONTROL OF EMERGED WEEDS**

Note: For backpack sprayer and handgun applications, see the "HAND-HELD AND HIGH VOLUME EQUIPMENT" section for specified rates.

##### **Annual Weeds**

Apply 1.5 pints per acre of this product in these tank mixtures when weeds are less than 6 inches tall and 2.25 pints per acre when weeds are more than 6 inches tall.

##### **Perennial Weeds**

For partial control of perennial weeds using these tank mixtures, apply 1.5 to 7.5 pints per acre of this product. Follow the recommendations in the "WEEDS CONTROLLED" section of this label for stage of growth and rate of application for specific perennial weeds.

#### **PREEMERGENCE WEED CONTROL**

For preemergence weed control, refer to the individual product labels for specific non-crop sites, rates, carrier volumes and precautionary statements.

Mix only the quantity of spray solution which can be used during the same day. Do not allow these tank mixtures to stand overnight as this may result in reduced weed control.

#### **BROADCAST APPLICATION FOR WEED CONTROL IN CHRISTMAS TREE PLANTATIONS**

NOTE: IF THIS PRODUCT IS IMPROPERLY APPLIED, IT HAS THE POTENTIAL TO CAUSE SEVERE INJURY TO CHRISTMAS TREES. FOLLOW ALL LABELED DIRECTIONS.

This product may be applied as a broadcast spray over established Christmas trees. To prevent drift onto nearby desirable crops or vegetation, ensure that adequate buffers are maintained.

The following Christmas tree species are approved for this application:

- Douglas Fir (*Pseudotsuga menziesii*)
- Fir species (*Abies* spp.)
- Spruce species (*Picea* spp.)

Do not apply this product until trees have completed at least a full growing season since planting or transplanting. Do not apply within 1 full year prior to tree harvest.



In the fall, applications may only be made after the formation of final conifer resting buds. Final resting buds must be in the dormant stage and fully hardened. If applications are made at any other time, unacceptable Christmas tree injury may occur.

Avoid spray pattern overlap, as injury may result.

Apply 24 fluid ounces of this product per acre in 5 to 30 gallons of water per acre.

NOTE: ADDING SURFACTANTS, ADDITIVES CONTAINING SURFACTANTS, OR ANY OTHER ADDITIVES TO THIS PRODUCT MAY RESULT IN SEVERE CHRISTMAS TREE INJURY.

In some areas, this product may be used at rates from 24 to 48 fluid ounces per acre. Consult your local Nufarm representative for specific instructions if you require rates that exceed 24 fluid ounces per acre.

Do not use drift control additives as they may increase Christmas tree injury. Do not use other herbicides in a tank mix with this product as Christmas trees could be severely injured.

### **SILVICULTURAL SITES AND RIGHTS-OF-WAY**

NOTE: DO NOT USE AS AN OVER-THE-TOP BROADCAST SPRAY IN SILVICULTURAL NURSERIES.

When applied as directed for "NON-CROP USES" under conditions described this product controls undesirable vegetation listed on this label. This product also suppresses or controls undesirable vegetation listed on this label when applied at specified rates for release of established coniferous species listed on this label.

For specific rates of application and instructions for control of various brush, annual and perennial weeds, see the "WEEDS CONTROLLED" section of this label. For specific rates of application for release of listed coniferous species, see the "CONIFER RELEASE" part of this section of the label.

Where repeat applications are necessary, do not exceed 8 quarts of this product per acre per year.

#### **Aerial Application**

This product may be applied using aerial spray equipment for silvicultural site preparation, conifer release and rights-of-way treatments. See the "APPLICATION EQUIPMENT and TECHNIQUES" part of the "MIXING AND APPLICATION INSTRUCTIONS APPLICATION EQUIPMENT AND TECHNIQUES" section of this label for information on how to apply this product by air.

DO NOT APPLY THIS PRODUCT BY AIR TO RIGHTS-OF-WAY SITES IN THE STATE OF CALIFORNIA.

#### **SITE PREPARATION**

Following preplant applications of this product, any silvicultural species may be planted.

#### **POST DIRECTED SPRAY**

In established silvicultural sites, use as a spray on the foliage of undesirable vegetation. Care must be exercised to avoid contact of spray, drift or mist with foliage or green bark of desirable species.

### **CONIFER RELEASE**

For release, apply at the end of the first growing season, except in California. Vegetation of target weeds or trees should not be disturbed prior to treatment or until visual symptoms appear after treatment. Symptoms of treatment are slow to appear, especially in woody species treated in late Fall. **Injury may occur to conifers treated for release, especially where spray patterns overlap or the higher rates are applied or when applications are made during periods of active conifer growth.**

Applications must be made after formation of final conifer resting buds in the fall or prior to initial bud swelling in spring. Some autumn colors on undesirable deciduous species are acceptable provided no major leaf drop has occurred. Use the following rates for conifer release to control or partially control the weeds listed in the "WEEDS CONTROLLED" section of this label.

**For release of the following conifer species:**

<b>Douglas Fir</b> <i>Pseudotsuga menziesii</i>	<b>Fir</b> <i>Abies</i> spp.	<b>Hemlock</b> <i>Tsuga</i> spp.	<b>Pines*</b> <i>Pinus</i> spp.	<b>Spruce</b> <i>Picea</i> spp.
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\*Includes all species except eastern white pine, loblolly pine or slash pine.

Apply 2.25 to 3 pints of this product per acre except in Washington and Oregon, west of the crest of the Cascade Mountains. For Spring treatments west of the crest of the Cascade Mountains, apply 1 quart of this product per acre before conifer bud swell for control of annual weeds. For Fall treatments in Washington and Oregon, west of the crest of the Cascade Mountains, apply 1.5 to 2.25 pints of this product per acre before any major leaf drop of deciduous species. Add 10 fluid ounces nonionic surfactant per 2 pints of this product. In Maine, up to 4.5 pints per acre may be used for the control of difficult weeds.

Note for Douglas fir release: Ensure that surfactant has been adequately tested for Douglas fir safety and follow manufacturer's specifications for rate of application.

For release of Western hemlock, apply 1 quart of this product per acre.

**For release of the following conifer species:**

<b>Loblolly Pine</b> <i>Pinus taeda</i>	<b>Eastern white pine</b> <i>Pinus strobus</i>	<b>Slash pine</b> <i>Pinus elliotii</i>
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**Late Season Application** - Apply 2-1/4 to 3 pints of this product in a minimum of 5 gallons of spray solution per acre during early autumn. Nufarm does not recommend the use of a crop oil concentrate or MSO (methylated seed oil) based surfactant for use in southern conifer species release with this product. The addition of a tested and approved southern conifer release surfactant is recommended. Applications made prior to September 1 or when conditions are conducive to rapid growth of conifers will create the potential for increased injury in the form of tip and/or needle burn. Injury may decrease with later applications. Some autumn colors are acceptable at time of application. Apply prior to frost or leaf drop of undesirable plants.

**Applications made according to label directions will release loblolly pine, eastern white pine and slash pine by reducing competition from the following species:**

<b>Ash</b> <i>Fraxinus</i> spp.	<b>Hawthorn</b> <i>Crataegus</i> spp.	<b>Oak, Post</b> <i>Quercus stellata</i>	<b>Poplar, yellow</b> <i>Liriodendron tulipifera</i>	<b>Sumac, Smooth</b> <i>Rhus glabra</i>
<b>Cherry, Black</b> <i>Prunus serotina</i>	<b>Locust, Black</b> <i>Robinia pseudoacacia</i>	<b>Oak, Southern Red</b> <i>Quercus falcata</i>	<b>Sassafras</b> <i>Sassafras albidum</i>	<b>Sumac, Winged</b> <i>Rhus copallina</i>
<b>Cherry, Pin</b> <i>Prunus pensylvanica</i>	<b>Maple, Red</b> <i>Acer rubra</i>	<b>Oak, White</b> <i>Quercus alba</i>	<b>Sourwood</b> <i>Oxydendrum arboreum</i>	<b>Sweetgum</b> <i>Liquidambar styraciflua</i>
<b>Elm</b> <i>Ulmus</i> spp.	<b>Oak, Black</b> <i>Quercus velutina</i>	<b>Persimmon</b> <i>Diospyros</i> spp.	<b>Sumac, Poison</b> <i>Rhus vernix</i>	

Apply only to those sites where woody brush and trees listed in this label constitute the majority of the undesirable species.

## THIS PRODUCT PLUS SPYDER TANK MIXTURES FOR CONIFER RELEASE FROM HERBACEOUS WEEDS

To release Loblolly pines, Slash, Red pine and Virginia pine from herbaceous weeds, tank mixtures of this product with Spyder will provide control of annual weeds listed in the "WEEDS CONTROLLED" section of this and the Spyder label, and partial control of the perennial weeds listed below.

Apply 12 to 18 fluid ounces of this product plus 2 to 4 fluid ounces of Spyder in 10 to 30 gallons of spray solution per acre. Nufarm does not recommend the use of a crop oil concentrate or MSO (methylated seed oil) based surfactant for use in southern conifer species release with this product. The addition of a tested and approved southern conifer release surfactant is recommended. Make application to actively growing weeds as a broadcast spray over the top of the young Loblolly pine, Red pine, Slash pine and Virginia pine.

This tank mixture may be applied using aerial equipment. When applying by air, use the specified rate in 5 to 15 gallons of spray solution per acre. This product plus Spyder tank mixtures may not be applied by air in California.

For control of annual weeds below 12 inches in height (or runner length on annual vines), use the lower rates of both products.

Use the higher rates of both products when annual weeds are in more advanced stages of growth and approaching flower or seed formation.

**Use the higher rates of both products for partial control of the following perennial weeds. Use the lower rates for suppression of growth.**

<b>Bahiagrass</b> <i>Paspalum notatum</i>	<b>Dock, curly</b> <i>Rumex crispus</i>	<b>Fescues, tall</b> <i>Festuca arundinacea</i>	<b>Poorjoe*</b> <i>Diodia teres</i>	<b>Vaseygrass</b> <i>Paspalum urvillei</i>
<b>Broomsedge</b> <i>Andropogon virginicus</i>	<b>Dogfennel</b> <i>Eupatorium capilliflorum</i>	<b>Johnsongrass*</b> <i>Sorghum halepense</i>	<b>Trumpetcreeper**</b> <i>Campsis radicans</i>	<b>Vervain, blue</b> <i>Verbena hastata</i>

\*Control at the higher rates

\*\*Suppression at the higher rates only.

Pine damage may occur or can be accentuated if treatment takes place when young trees are under stress from drought, flood water, insects or disease, or are in an active growth stage.

Read and observe the cautionary statements and all other information appearing on the labels of all herbicides used.

**Note To User:** This product must not be used in areas where adverse impact on federally designated endangered/threatened plant or aquatic species is likely. Prior to making applications, the user of this product must determine that no such species are located in or immediately adjacent to the area to be treated.

### WETLAND SITES

This product may be used in and around water (aquatic areas) and wetlands found in forestry and in power, telephone and pipeline rights-of-way sites including where these sites are adjacent to or surrounding domestic water supply reservoirs, supply streams, lakes and ponds. Read and observe the following before making applications in and around water.

Consult local public water control authorities before applying this product in and around public water. Permits may be required to treat in such areas.

There is no restriction on the use of treated water for irrigation, recreation or domestic purposes.

**Note:** Do not apply this product directly to water within 0.5 mile upstream of an active potable water intake in flowing water (i.e., river, stream, etc.) or within 0.5 mile of an active potable water intake in a standing body of water such as a lake, pond or reservoir. To make aquatic applications around and within 0.5 mile of active potable water intakes, the water intake must be turned off for a minimum period



of 48 hours after application. These aquatic applications may be made ONLY in those cases where there are alternative water sources or holding ponds which would permit the turning off of an active potable water intake for a minimum period of 48 hours after the application. This restriction does not apply to intermittent inadvertent overspray of water in terrestrial use sites.

Do not spray open bodies of water where woody brush, trees and herbaceous weeds do not exist. The maximum application rate of 3.75 quarts per acre must not be exceeded in a single over-water broadcast application except as follows, where any specified rate may be applied:

- Stream crossings in utility right-of-way.
- Where applications will result in less than 20 percent of the total water area being treated.

#### WILDLIFE HABITAT RESTORATION AND MANAGEMENT AREAS

This product is for the restoration and/or maintenance of native habitat and in wildlife management areas.

##### Habitat Restoration and Maintenance

When applied as directed, exotic and other undesirable vegetation may be controlled in habitat management areas. Applications may be made to allow recovery of native plant species, to open up water to attract waterfowl, and for similar broad-spectrum vegetation control requirements in habitat management areas. Spot treatments may be made to selectively remove unwanted plants for habitat enhancement. For spot treatments, care should be exercised to keep spray off of desirable plants.

##### Wildlife Food Plots

This product may be used as site preparation treatment prior to planting wildlife food plots. Apply as directed to control vegetation in the plot area. Any wildlife food species may be planted after applying this product, or native species may be allowed to re-infest the area. If tillage is needed to prepare a seedbed, wait 7 days after applying this product before tilling to allow for maximum effectiveness.

#### WIPER APPLICATIONS

For wick or wiper applications, mix 1 gallon of this product with 2 gallons of clean water to make a 33 percent solution. Addition of a nonionic surfactant at a rate of 10 percent by volume of total herbicide solution is recommended.

Wiper applications can be used to control or suppress annual and perennial weeds listed on this label. In heavy weed stands, a double application in opposite directions may improve results. See the "WEEDS CONTROLLED" section in this label for specified timing, growth stage and other instructions for achieving optimum results.

#### CUT STUMP APPLICATION

Woody vegetation may be controlled by treating freshly cut stumps of trees and resprouts with this product. Apply this product using suitable equipment to ensure coverage of the entire cambium. Cut vegetation close to the soil surface. **Apply a 50 to 100 percent solution of this product to the freshly-cut surface immediately after cutting.** Delay in application may result in reduced performance. For best results, applications should be made during periods of active growth and full leaf expansion.

**When used according to directions for cut stump application, this product will control, partially control or suppress many types of woody brush and tree species, some of which are listed below:**

<b>Alder</b> <i>Alnus</i> spp.	<b>Eucalyptus</b> <i>Eucalyptus</i> spp.	<b>Maple*</b> <i>Acer</i> spp.	<b>Reed, Giant</b> <i>Arundo donax</i>	<b>Sycamore</b> <i>Platanus occidentalis</i>
<b>Coyote Brush*</b> <i>Baccharis consanguinea</i>	<b>Hickory*</b> <i>Carya</i> spp.	<b>Oak</b> <i>Quercus</i> spp.	<b>Salt cedar</b> <i>Tamarix</i> spp.	
<b>Dogwood*</b> <i>Cornus</i> spp.	<b>Madrone</b> <i>Arbutus menziesii</i>	<b>Poplar</b> <i>Populus</i> spp.	<b>Sweet gum</b> <i>Liquidambar styraciflua</i>	

\*This product is not approved for this use on this species in the state of California.

#### INJECTION AND FRILL APPLICATIONS

Woody vegetation may be controlled by injection or frill application of this product. Apply this product using suitable equipment which must penetrate into living tissue. Apply the equivalent of 1 ml of this product per 2 to 3 inches of trunk diameter. This is best achieved by applying 25 to 100 percent concentration of this product either to a continuous frill around the tree or as cuts evenly spaced around the tree below all branches. As tree diameter increases in size, better results are achieved by applying dilute material to a continuous frill or more closely spaced cuttings. Avoid application techniques that allow runoff to occur from frill or cut areas in species that exude sap freely after frills or cutting. In species such as these, make frill or cut at an oblique angle so as to produce a cupping effect and use undiluted material. For best results, applications should be made during periods of active growth and full leaf expansion.

Control		Suppression	
<b>Oak</b>	<i>Quercus</i> spp.	<b>Black Gum*</b>	<i>Nyssa sylvatica</i>
<b>Poplar</b>	<i>Populus</i> spp.	<b>Dogwood</b>	<i>Cornus</i> spp.
<b>Sweetgum</b>	<i>Liquidambar styraciflua</i>	<b>Hickory</b>	<i>Carya</i> spp.
<b>Sycamore</b>	<i>Platanus occidentalis</i>	<b>Maple, Red</b>	<i>Acer rubrum</i>

\*This product is not approved for this use on this species in the state of California.

## INJECTION METHOD FOR CONTROL OF JAPANESE KNOTWEED (*Polygonum cuspidatum*) & GIANT KNOTWEED (*Polygonum polystachyum*)

### DIRECTIONS FOR USE

It is a violation of Federal law to use this product in any manner inconsistent with its labeling.

This label must be in the possession of the user at the time of application.

All applicable directions and precautions in the AquaNeat Herbicide label booklet must be followed.

See the "PRODUCT INFORMATION" and "MIXING AND APPLICATION INSTRUCTIONS" sections of this product's label booklet for essential product performance information.

This product may be used for control of Japanese knotweed and giant knotweed using individual stem treatment. Individual knotweed stems may be treated by injecting up to 5 ml of this product, undiluted directly into the hollow stem just below a node. A hole suitable for injecting the herbicide should be made through both sides of the stem using an awl or other convenient pointed tool about 6 inches above the ground, just below a node. (Nodes are circular thickenings or scars surrounding the stem where leaves are or were previously attached.) The herbicide is then injected into this hole. Each stem of the knotweed plant must be treated.

This product can be injected using any injection device capable of delivering a 5 ml dose. For convenience and accuracy, a hand-operated injection device designed to deliver repeated pre-measured doses from a supply reservoir is recommended.

Commercially available dose measuring equipment may be adapted for this purpose. Calibrate the device to deliver a dose of 5 ml per injection cycle. A sharpened hollow probe for puncturing the stem and delivery of the herbicide can also be integrated into the delivery system.

Restriction: Do not apply more than 7.5 quarts of this product per acre. At 5 ml per stem, 7.5 quarts is sufficient to treat a maximum of 1,420 stems per acre.

### RELEASE OF BERMUDAGRASS OR BAHIAGRASS ON NONCROP SITES RELEASE OF DORMANT BERMUDAGRASS AND BAHIAGRASS

When applied as directed, this product will provide control or suppression of many winter annual weeds and tall fescue for effective release of dormant bermudagrass or bahiagrass. Make applications to dormant bermudagrass or bahiagrass.

For best results on winter annuals, treat when weeds are in an early growth stage (below 6 inches in height) after most have germinated. For best results on tall fescue, treat when fescue is in or beyond the 4- to 6-leaf stage.

### WEEDS CONTROLLED

Rate for control or suppression of winter annuals and tall fescue are listed below.

Apply the specified rates of this product in 10 to 25 gallons of water per acre, plus 2 quarts nonionic surfactant per 100 gallons of total spray volume.

### WEEDS CONTROLLED OR SUPPRESSED\*

**NOTE:** C = Control  
S = Suppression

WEED SPECIES	AQUANEAT AQUATIC HERBICIDE (FLUID OZ/ACRE)					
	6	9	12	18	24	48
<b>Barley, little</b> <i>Hordeum pusillum</i>	S	C	C	C	C	C
<b>Bedstraw, catchweed</b> <i>Galium aparine</i>	S	C	C	C	C	C
<b>Bluegrass, annual</b> <i>Poa annual</i>	S	C	C	C	C	C
<b>Chervil</b> <i>Chaerophyllum tainturieri</i>	S	C	C	C	C	C
<b>Chickweed, common</b> <i>Stellaria media</i>	S	C	C	C	C	C
<b>Clover, crimson</b> <i>Trifolium incarnatum</i>	.	S	S	C	C	C
<b>Clover, large hop</b> <i>Trifolium campestre</i>	.	S	S	C	C	C
<b>Speedwell, corn</b> <i>Veronica arvensis</i>	S	C	C	C	C	C
<b>Fescue, tall</b> <i>Festuca arundinacea</i>	.	.	.	.	S	S
<b>Geranium, Carolina</b> <i>Geranium carolinianum</i>	.	.	S	S	C	C
<b>Henbit</b> <i>Lamium amplexicaule</i>	.	S	C	C	C	C
<b>Ryegrass, Italian</b> <i>Lolium multiflorum</i>	.	.	S	C	C	C
<b>Vetch, common</b> <i>Vicia sativa</i>	.	.	S	C	C	C

\*These rates apply only to sites where an established competitive turf is present.



### RELEASE OF ACTIVELY GROWING BERMUDAGRASS

NOTE: USE ONLY ON SITES WHERE BAHAGRASS OR BERMUDAGRASS ARE DESIRED FOR GROUND COVER AND SOME TEMPORARY INJURY OR YELLOWING OF THE GRASSES CAN BE TOLERATED.

When applied as directed, this product will aid in the release of bermudagrass by providing control of annual species listed in the "WEEDS CONTROLLED" section in this label, and suppression or partial control of certain perennial weeds.

For control or suppression of those annual species listed in this label, use 3/4 to 2-1/4 pints of this product as a broadcast spray in 10 to 25 gallons of spray solution per acre, plus 2 quarts of a nonionic surfactant per 100 gallons of total spray volume. Use the lower rate when treating annual weeds below 6 inches in height (or length of runner in annual vines). Use the higher rate as size of plants increases or as they approach flower or seedhead formation.

Use the higher rate for partial control or longer-term suppression of the following perennial species. Use lower rates for shorter-term suppression of growth.

Bahiagrass Johnsongrass\*\*  
Dallisgrass Trumpet creeper\*  
Fescue (tall) Vaseygrass

\*Suppression at the higher rate only.

\*\*Johnsongrass is controlled at the higher rate.

Use only on well-established bermudagrass. Bermudagrass injury may result from the treatment but regrowth will occur under moist conditions. Repeat applications in the same season are not recommended, since severe injury may result.

### BAHAGRASS SEEDHEAD AND VEGETATIVE SUPPRESSION

When applied as directed in the "NONCROP SITES" section in this label, this product will provide significant inhibition of seedhead emergence and will suppress vegetative growth for a period of approximately 45 days with single applications and approximately 120 days with sequential applications.

Apply this product 1 to 2 weeks after full green-up of bahiagrass or after the bahiagrass has been mowed to a uniform height of 3 to 4 inches. Applications must be made prior to seedhead emergence. Apply 5 fluid ounces per acre of this product, plus 2 quarts of an approved nonionic surfactant per 100 gallons of total spray volume in 10 to 25 gallons of water per acre.

Sequential applications of this product plus nonionic surfactant may be made at approximately 45-day intervals to extend the period of seedhead and vegetative growth suppression. For continued vegetative growth suppression, sequential applications must be made prior to seedhead emergence.

Apply no more than 2 sequential applications per year. As a first sequential application, apply 3 fluid ounces of this product per acre plus nonionic surfactant. A second sequential application of 2 to 3 fluid ounces per acre plus nonionic surfactant may be made approximately 45 days after the last application.

### ANNUAL GRASS GROWTH SUPPRESSION

For growth suppression of some annual grasses, such as annual ryegrass, wild barley and wild oats growing in coarse turf on roadsides or other industrial areas, apply 3 to 4 ounces of this product in 10 to 40 gallons of spray solution per acre. Mix 2 quarts of a nonionic surfactant per 100 gallons of spray solution. Applications should be made when annual grasses are actively growing and before the seedheads are in the boot stage of development. Treatments made after seedhead emergence may cause injury to the desired grasses.

### AQUATIC SITES

When applied as directed and under the conditions described in the "WEEDS CONTROLLED" section in this label, this product will control or partially control the labeled weeds growing in aquatic sites.

**Aquatic Sites** - This product may be applied to emerged weeds in all bodies of fresh and brackish water which may be flowing, non-flowing or transient. This includes lakes, rivers, streams, ponds, estuaries, rice levees, seeps, irrigation and drainage ditches, canals, reservoirs, wastewater treatment facilities, wildlife habitat restoration and management areas, and similar sites.

If aquatic sites are present in the noncrop area and are part of the intended treatment, read and observe the following directions:

**This product does not control plants which are completely submerged or have a majority of their foliage under water.**

There is no restriction on the use of treated water for irrigation, recreation or domestic purposes.

Consult local state fish and game agency and water control authorities before applying this product to public water. Permits may be required to treat such water.

**NOTE:** Do not apply this product directly to water within 1/2 mile up-stream of an active potable water intake in flowing water (i.e., river, stream, etc.) or within 1/2 mile of an active potable water intake in a standing body of water such as lake, pond or reservoir. To make aquatic applications around and within 1/2 mile of active potable water intakes, the water intake must be turned off for a minimum period of 48 hours after the application. The water intake may be turned on prior to 48 hours if the glyphosate level in the intake water is below 0.7 parts per million as determined by laboratory analysis. These aquatic applications may be made ONLY in those cases where there are alternative water sources or holding ponds which would permit the turning off of an active potable water intake for a minimum period of 48 hours after the applications. This restriction does not apply to intermittent inadvertent overspray of water in terrestrial use sites.

For treatments after drawdown of water or in dry ditches, allow 7 or more days after treatment before reintroduction of water to achieve maximum weed control. Apply this product within 1 day after drawdown to ensure application to actively growing weeds. Floating Mats of vegetation may require retreatment. Avoid wash-off of sprayed foliage by spray boat or recreational boat backwash or by rainfall within 6 hours of application. Do not re-treat within 24 hours following the initial treatment.

Applications made to moving bodies of water must be made while traveling upstream to prevent concentration of this herbicide in water. When making any bankside applications, do not overlap more than 1 foot into open water. Do not spray in bodies of water where weeds do not exist. The maximum application rate of 7-1/2 pints per acre must not be exceeded in any single broadcast application that is being made over water.

When emerged infestations require treatment of the total surface area of impounded water, treating the area in strips may avoid oxygen depletion due to decaying vegetation. Oxygen depletion may result in fish kill.

## STORAGE AND DISPOSAL

Do not contaminate water, food or feed by storage or disposal.

**PESTICIDE STORAGE:** Do not store below 32°F or above 100°F. Store in original container in a well-ventilated area separately from fertilizer, feed, and food stuffs. Avoid cross-contamination with other pesticides.

**PESTICIDE DISPOSAL:** Pesticide wastes are toxic. Wastes resulting from this product may be disposed of on site or at an approved waste disposal facility. Improper disposal of excess pesticide, spray mix, or rinsate is a violation of federal law. If these wastes cannot be disposed of according to label instructions, contact the state agency responsible for pesticide regulation or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

### CONTAINER DISPOSAL [HANDLING]:

**NOTE:** This product is available in multiple containers. Refer to the Net Contents section of this products labeling for the applicable "Nonrefillable" or "Refillable" designation. Follow the container disposal [handling] instructions below that apply to your container type / size.

**Nonrefillable Containers 5 Gallons or Less:** Nonrefillable container. Do not reuse or refill this container. Triple rinse container (or equivalent) promptly after emptying. **Triple rinse as follows:** Empty the remaining contents into application equipment or a mix tank and drain for 10 seconds after the flow begins to drip. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times. Then offer for recycling or reconditioning, or puncture and dispose of in a sanitary landfill, or by other procedures approved by State and local authorities. Plastic containers are also disposable by incineration, or, if allowed by State and local authorities, by burning. If burned stay out of smoke.

**Nonrefillable containers larger than 5 gallons:** Nonrefillable container. Do not reuse or refill this container. Offer for recycling if available. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. **Triple rinse as follows:** Empty the remaining contents into application equipment or a mix tank. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Turn the container over onto its other end and tip it back and forth several times. Empty the rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Repeat this procedure two more times. **Pressure rinse as follows:** Empty the remaining contents into application equipment or a mix tank and continue to drain for 10 seconds after the flow begins to drip. Hold container upside down over application equipment or mix tank and continue to drain for 10 seconds after the flow begins to drip. Hold container upside down over application equipment or mix tank or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container, and rinse at about 40 psi for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

**Refillable containers larger than 5 gallons:** Refillable container. Refill this container with pesticide only. Do not reuse this container for any other purpose. Cleaning the container before final disposal is the responsibility of the person disposing of the container. Cleaning before refilling is the responsibility of the refiller. To clean the container before final disposal, empty the remaining contents from this container into application equipment or a mix tank. Fill the container about 10% full with water and, if possible, spray all sides while adding water. If practical, agitate vigorously or recirculate water with the pump for two minutes. Pour or pump rinsate into application equipment or rinsate collection system. Repeat this rinsing procedure two more times.



## **WARRANTY DISCLAIMER**

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