



Western New York Partnership for Regional Invasive Species Management

Partnering to Protect Western New York from Invasive Species

ACCEPTED

April 27, 2018

New York State Department
of Environmental Conservation
Division of Materials Management
Pesticide Product Registration

Request for 2(ee) Special Registration Chemical Control Mugwort (*Artemisia vulgaris*)

Classified for
"RESTRICTED USE"
in New York State
under 6NYCRR Part 326

Doc id: 556791

Mugwort (*Artemisia vulgaris*) is an invasive species and terrestrial herbaceous plant that poses a significant risk to the natural areas of New York State, in particular to those areas currently being managed and restored. Mugwort has proven to be very difficult to eradicate, especially without effective chemical control. There are products registered in New York State that permit application to mugwort, however they have not demonstrated a high level of effectiveness (suppression only) and require ongoing management. Milestone Specialty Herbicide was recently accepted for registration by New York State. This herbicide has demonstrably superior efficacy in controlling mugwort, when compared with 2-4D and Glyphosate based products. Stinger (clopyralid) is a similar herbicide that was granted a 2(ee) for mugwort, but it has demonstrated less effectiveness than Milestone (aminopyralid). Milestone is currently labeled for use on wormwood (*Artemisia absinthium*) and Canada thistle (*Cirsium arvense*), both very similar to mugwort as they both spread primarily through robust rhizomes and have similar growth patterns.

This request is for the product Milestone, and the ability to apply it to mugwort which is not listed within the labeling. This request proposes 2(ee) special registration for the accepted use of Milestone on mugwort (*Artemisia vulgaris*).

Herbicide

Product Name	EPA Registration Number	Suggested Application Rate
Milestone (aminopyralid)	62719-519	5 to 7 fl oz/acre

Proposed Target Species

Common name	Scientific name	NYS Invasive Rank
Mugwort	<i>Artemisia vulgaris</i>	H – 79.31 (2009)

Species Information

Mugwort is a perennial herbaceous plant that establishes in both disturbed and undisturbed land, in a variety of soil types and habitats. Mugwort can reach 5 feet in height and become almost wood in character as they mature. Mugwort spreads primarily via rhizomes, but also produce hundreds of thousands of seeds per plant, annually. Seed viability in the eastern United States is low, therefore addressing the rhizome spread is of greater importance.



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Dense patches of mugwort outcompete and shade-out native plant communities, and allelopathic chemicals produced by the plant further inhibit native species from thriving. Mugwort leaves provide additional soil impacts as they release allelopathic chemicals as they decompose.

Mugwort will persist and continue to spread if not controlled. The powerful rhizomes of this plant make mechanical removal difficult and ineffective. In many cases manual and mechanical removal serves to further establish and spread the rhizomes. Using a more effective herbicide (Milestone) will improve the efficacy of management, decreasing cost and increasing the long-term success of control efforts.

Herbicide Recommendations and Sources

Virginia Cooperative Extension – Identification and Control of Mugwort (*Artemisia vulgaris* L.) in Virginia

https://pubs.ext.vt.edu/content/dam/pubs_ext_vt_edu/450/450-141/450-141_pdf.pdf

- Demonstrates the effectiveness of Stinger over other available herbicides (Milestone was not included in this study – additional resources will demonstrate effectiveness of Milestone over Stinger)

Mugwort Control in an Abandoned Nursery Using Herbicides that Mimic Indole-3-Acetic Acid

<http://horttech.ashspublications.org/content/21/5/558.full.pdf+html>

- Demonstrates effectiveness of aminopyralid over other active ingredients, with control >90% compared to 75% for picloram and 31% for clopyralid.