Forest Herbicide Effectiveness on Mississippi Tree and Shrub Species

Regarding forest herbicide efficacy, one of the most common concerns is how well an herbicide controls a specific tree or shrub species. Obviously, if you purchase herbicide and spend the time required to apply it, you want effective control of the targeted stems. While individual herbicide labels contain some species-specific information, the list of woody species and their tolerance to that particular herbicide is typically limited.

The table on the next page provides a list of commonly used forest herbicides and their associated effectiveness in controlling certain species. Susceptibility level is shown for each herbicide and each woody species specifically. These levels of susceptibility were established using the references below, herbicide labels, and personal field research experience. These ratings are not absolute, as herbicide efficacy depends on multiple factors. However, these assessments provide expected effectiveness of listed herbicides under normal application conditions and proper application procedures.

Control is categorized as susceptible (S), intermediate (I), or tolerant (T). A susceptible ranking means that at least 80 percent control of species in that particular genus is expected. A ranking of intermediate means that 40–80 percent control can be expected. If you use an intermediate-ranked herbicide, an additional herbicide application will likely be needed. A ranking of tolerant means that herbicide will not provide control and should not be considered. If there is no ranking for a particular herbicide under a species grouping, there is not enough information available to offer an assessment.

References

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Effectiveness of forest herbicides by woody species group.

Herbicide	Maple	Alder	Serviceberry	Birch	Hornbeam	Hickory/Pecan	Hackberry/Sugarberry	Redbud	Dogwood	Hawthorn	Persimmon	Beech	Ash	Honeylocust	Walnut	Juniper	Sweetgum	Poplar	Osage orange	Mulberry	Blackgum	Hophornbeam	Sourwood	Pine	Sycamore	Cottonwood	Prunus species	Oak	Sumac	Black locust	Willow	Sassafras	Chinese tallow	Elm
Aminopyralid	S	S	•	•	•	S	S	S	•	•	•	•	•	S	•	S	•	•	•	•	•	•	•	I	•	S	S	S	•	S	•	•	•	S
Clethodim	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T
Clopyralid	T	T	T	T	T	T	T	S	T	T	T	T	T	S	T	•	T	T	•	•	T	T	T	T	T	T	T	T	•	S	•	T	•	T
Dicamba	I	S	S	S	S	S	•	•	S	S	T	•	S	•	•	•	T	•	•	•	•	•	I	S	•	S	I	I	S	•	S	•	•	S
Fosamine	T	S	•	S	•	T	•	•	•	T	S	•	S	•	•	•	S	T	•	•	•	•	T	S	S	S	I	S	S	S	T	T	S	I
Glyphosate	I	S	I	S	I	I	I	T	I	S	I	S	I	I	I	•	S	S	T	I	I	I	I	S	S	S	I	S	I	I	I	I	I	I
Hexazinone	I	•	•	S	•	I	•	•	I	S	T	•	I	•	•	•	S	T	•	•	T	•	T	T	•	S	I	S	I	•	S	T	•	S
Imazapyr	S	S	S	S	I	S	I	T	S	S	S	S	S	T	S	•	S	S	T	S	S	I	S	T*	S	S	S	S	S	T	S	S	S	T
Metsulfuron	S	S	•	•	•	•	•	•	•	S	•	•	S	•	•	S	•	I	•	S	•	•	•	T**	•	S	S	S	•	S	S	•	•	S
Oxyflourfen	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T
Picloram	S	S	S	S	S	S	S	S	I	S	S	S	I	S	S	S	I	S	S	S	S	S	•	I	S	S	S	S	S	S	S	S	•	I
Picloram + 2,4-D	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	S	I	S	S	S	S	S	S	I	S	S	S	S	S	S	S	S	•	S
Sulfometuron	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	T	S	T	T	I	T	T	T	T	T
Triclopyr (amine)	S	S	•	S	S	I	S	S	S	S	I	S	S	I	S	T	S	S	S	S	S	S	I	I	S	S	I	I	I	S	S	S	S	I
Triclopyr (ester)	I	S	•	S	S	I	S	S	S	I	I	S	I	I	S	I	S	S	S	S	S	S	I	I	S	S	I	I	I	S	S	S	S	S
2, 4-D	I	I	•	I	T	I	I	•	S	I	I	I	T	S	I	•	•	•	I	I	S	T	•	•	•	I	S	I	S	I	I	I	I	I

S = susceptible, I = intermediate, T = tolerant, • = information too limited for susceptibility assessment

*Susceptible to Chopper® Gen2

**Will kill longleaf pine

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By **A. Brady Self**, PhD, Associate Extension Professor, Forestry.