

# Park District of Oak Park

## Selective Use of Glyphosate Fact Sheet

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### Summary

The Park District of Oak Park (PDOP) spends substantial staff time and dollars each year in weed control in our parks, especially along fence lines and at building perimeters. The PDOP is committed to the thorough removal of invasive species to ensure the survival of native plants, to ensure the bio-diversity of all of our plant material, to eliminate potential allergens and for the aesthetic appeal of our parks. Integrated Pest Management (IPM) recommends that mechanical and cultural methods for weed control be used first and chemical methods used only where the first two prove insufficient to eradicate the weeds. The Park District has used and will continue to use hand weeding, bark mulches and plastic barriers as our first choice for weed control but there are situations, such as brick paver walkways and fence lines in particular, where these mechanical and cultural methods are not effective. It is in these situations that the Park District proposes to use the systemic herbicide glyphosate sold under the trade names “Roundup”, “Rodeo”, “Tumbleweed” and others.

### About Glyphosate

Glyphosate is a broad-spectrum, systemic herbicide used to kill weeds, especially perennials, on both food and non-food crops as well as on non-crop areas such as roadsides. It is effective in killing a wide variety of plants, including grasses and broadleaf and woody plants. Glyphosate is typically sprayed and absorbed through the leaves, injected into the trunk, or applied to the stump of a tree. It is absorbed through foliage and translocated to growing points. Because of this mode of action, it is only effective on actively growing plants; it is not effective as a pre-emergent herbicide.

Glyphosate, by volume, is one of the most widely used herbicides. It is less toxic than a number of other herbicides and pesticides, such as those from the organochlorine family. The most commonly used glyphosate formulation sells under the brand name Roundup. Roundup has a United States Environmental Protection Agency Toxicity Class of III (out of a range of IV, with I being most toxic) for oral and inhalation exposure with some more recent studies suggesting that IV is appropriate for oral, dermal, and inhalation exposure. It has been rated as class I (severe) for eye irritation.

The US EPA Toxicity Classes are:

Category I	DANGER (Most Toxic)
Category II	WARNING
Category III	CAUTION
Category IV	None required but if used means Caution – least toxic

Greenpeace states that the acute human toxicity of glyphosate is very low, but notes that other added chemicals (particularly surfactants, which help droplets of herbicide spray spread evenly over leaf surfaces) can be more toxic than glyphosate itself. These surfactants have a higher toxicity to fish and invertebrates resulting in some formulations for glyphosate not being registered for use in aquatic applications.

When Glyphosate comes into contact with the soil, it rapidly binds to soil particles and is de-activated. Unbound glyphosate is degraded by bacteria. This product becomes inactive, in general, within 4 hours. Low activity, because of binding to soil particles, suggests that glyphosate's effects on soil flora are limited. It tends to adhere to sediments when released to water and does not tend to accumulate in aquatic life. The United States Environmental Protection Agency (EPA), the European Commission Health and Consumer Protection Directorate, and the United Nations World Health Organization have all concluded that pure glyphosate is not carcinogenic.

## **Methods and Uses**

The Park District of Oak Park proposes to limit use of glyphosate only to areas where other methods of weed control have proven to the District to be ineffective or cost prohibitive. Glyphosate is to be sprayed, not broadcast, along fence lines, tennis court cracks, on brick paver walkways, within shrub borders and in other limited situations. It will be used to keep infields clear of weeds but not routinely applied to grass or lawn areas. Application will be made by a licensed pesticide applicator who is regulated by the Illinois EPA, with direct Park District supervision and only under appropriate wind conditions to minimize drift. Any application by subcontractors will be pre-authorized by the Superintendent of Buildings and Grounds.

People and animals must be kept away from sprayed areas until they dry, which generally occurs within 4 hours, depending on weather conditions. Signs will be posted for 24 hours to notify the public that spraying has occurred.

## **Timeline**

Applications began in spring 2010.