## **CASE SUMMARY**

Case #2011/1132

**Complainant:** Judy Dochrman

221 Willowgate Lane Indianapolis, IN 46260

317-843-2411

**Applicator:** Bob Andrews

The Greenskeeper, Inc.

P.O. Box 575 Carmel, IN 46082 317-846-7131 Certified Applicator Licensed Business

- 1. On July 7, 2001, I, Agent Jay Kelley of the Office of Indiana State Chemist (OISC), performed an investigation at the complainant's property in response to a claim of injury/damage to non-target trees and shrubs possibly resulting from exposure to the herbicide Imprelis. A Notice of Inspection was issued to Judy Dochrman. I observed the following during my on-site investigation:
  - a) Spruce trees have brown needles randomly in sections from bottom to top (see figure #1).
  - b) Needles are brown distorted and yellowing (see figure #2).
- 2. I took the following photos depicting injured/damaged vegetation:



Figure #1



Figure #2

- 3. I collected the following vegetation samples from visibly impacted non-target vegetation as described in paragraph #1 for examination by the Purdue Plant Pest Diagnostic Laboratory (PPDL):
  - a) Spruce
- 4. I collected the following environmental samples for chemical analysis by the OISC Residue Laboratory:
  - a) Composite vegetation sample.
  - b) Composite soil sample from yard.
  - c) Composite soil sample from drip line

- 5. According to a report from the PPDL, "No infectious disease or insect pest was found to be associated with the chlorosis, dieback and distortion observed on the spruce sample submitted. The sample submitted showed symptoms that are associated with injury that can be caused by synthetic auxin (growth regulator type) herbicides. Typical symptoms caused by these herbicides can include epinasty (twisting and curving) of the leaves or needles, shoot and shoot tip; leaf cupping which can be upward or downward, and in extreme cases, new leaves can be irregular in size and shape (usually smaller than normal) and have abnormal leaf margins."
- 6. According to the report from the OISC Residue Lab the following levels of aminocyclopyrachlor (active ingredient in Imprelis Herbicide) were found in the samples referenced in item #4:

a) Composite vegetation sample
 b) Composite soil sample from yard
 c) Composite soil sample from drip line

 PPB=Parts Per Billion
 BDL=Below Detection Limits

7. According to the application information collected from the applicator Imprelis Herbicide (EPA Reg. No. 352-793) was applied on April 13<sup>th</sup>, 2011, at the rate of 4.5oz /acre using hand held ground spray equipment; no application was made to the soil within the drip line of any of the trees or ornamentals; no application was made directly to any exposed roots of any trees or ornamentals.

Date: August 9, 2011

Final Date: September 19, 2011

Paul J. Kelley

Pesticide Investigator

**Disposition:** No violation of the Indiana Pesticide Use and Application Law was documented against the pesticide applicator. Effective September 15, 2011, the Indiana registration for Imprelis Herbicide, EPA Reg. #352-793, was cancelled because it was determined by OISC that the product is "misbranded" (it bears label directions that are inadequate to prevent unreasonable adverse effects to non-target vegetation).

George N. Saxton

Compliance Officer