

# CASE SUMMARY

Case #2011/1446

**Complainant:** Billy Northup  
507 Bolton Drive  
Lafayette, IN 47909

**Applicator:** Kevin Potts  
Caddyshack Lawn Care  
7936 S County Road 250 E  
Lafayette, IN 47909  
765-404-6307

Certified Applicator  
Licensed Business

1. On August 5, 2011, I, Agent Beth Carter 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 possibly resulting from exposure to the herbicide Imprelis. A Notice of Inspection was issued to Kevin Potts. Mr. Potts requested he be able to accompany me on the complaint. I observed the following symptoms on approximately one spruce tree during my on-site investigation:
  - a) Browning and distorting of needle tips (see figure 1 & 2).
  - b) Curling at the top and curling at the needle tips (see figure 2 & 3).
2. I took the following photos depicting injured/damaged vegetation:



Figure 1



Figure 2



Figure 3

3. I collected a sample from a visibly impacted spruce tree as described in paragraph #1 for examination by the Purdue Plant Pest Diagnostic Laboratory (PPDL).
4. The report from the PPDL stated the following:  
*“There was no evidence of significant mite or insect injury or disease on the samples submitted.”*

*Our PPDL diagnosis of the possibility of potential damage from herbicide injury is based on visual assessment of samples and images submitted and whether the symptoms observed on non-target plants are typical of injury that could be caused by exposure or uptake of the herbicides purportedly applied to the area.*

*The samples and pictures submitted show symptoms of 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; dieback of shoot tips; leaf cupping which can be upward or downward, and in extreme cases, new leaves can be irregular in color, size and shape (usually smaller than normal) and have abnormal leaf margins. When injury results in new shoot dieback in conifers, there will be no re-growth this season.*

*The prospects for recovery from herbicide damage depend on the dose and the extent of the damage. Don't give up on herbicide damaged trees and shrubs too quickly. The following are suggestions provided by horticulture specialists for managing stressed trees:*

- *Make sure the tree has sufficient water this summer: an inch of water each week from rain and/or irrigation. This will reduce stress on the tree.*
- *Don't prune dead wood until you know the extent of the dieback (possibly up to a year). Early pruning can stimulate new growth and increase stress. The exception to this is to remove dead branches that might be a hazard if they fall.*
- *Don't fertilize affected trees for a minimum of one growing season. Stimulating new top growth too soon will add stress to the tree.*

*Abiotic factors, including environmental and site stress can also contribute to dieback of conifers, as discussed in the following Factsheet:*

*<http://www.ppdل.purdue.edu/PPDL/pubs/briefs/Conifer-Dieback.pdf>*

5. According to the application information collected from Mr. Potts, Imprelis Herbicide (EPA Reg. No. 352-793) was applied on May 4, 2011, at the rate of 4.5 fluid ounces per acre with a ride on sprayer.



Elizabeth C. Carter  
Pesticide Investigator

Date: September 12, 2011

**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

Final Date: September 20, 2011