

● GLYPHOSATE (R O U N D U P)

RESPONDING TO A CHEMICAL GOLIATH

The immensely profitable herbicide glyphosate is heavily marketed as environmentally and toxicologically benign. NCAP has compiled research that shows the opposite, the hazards of glyphosate products. NCAP's work has been vigorously discredited by glyphosate's manufacturer.

Here, NCAP provides responses to three common criticisms of our work about glyphosate: 1) Although the *Journal of Pesticide Reform* is not "peer-reviewed" as are scientific journals, most of the research we cite is from peer-reviewed journals, government documents, or manufacturers' publications; 2) While glyphosate has received favorable evaluations from federal and international agencies, the rest of us should be able to study the underlying data and disagree where appropriate; 3) NCAP is proud to make available information about the hazards of glyphosate, as most of the information easily available to the public discusses only its favorable properties. This focus does not make our work bad science.

Please see the article on pages 3-16 for details about glyphosate's hazards.

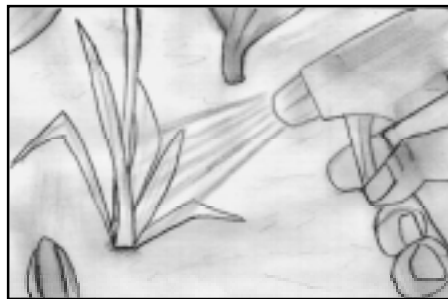
BY CAROLINE COX

The herbicide glyphosate is the pesticide industry's "first billion dollar product,"¹ with predictions of three billion dollars in annual sales by 2000.² Although the price of glyphosate has been reduced about 50 percent in the last two decades, profit margins on the sale of glyphosate herbicides are over 40 percent, quadruple the industry average. Glyphosate accounts for less than a quarter of revenues for its manufacturer, Monsanto Company, but half of its corporate profits.² Small wonder, then, that Monsanto over the last decade has repeatedly criticized NCAP's information about glyphosate's hazards. The company has called it "inaccurate and intentionally misleading" and accused NCAP of a "deliberate intent to disparage."³

There is an enormous amount of research about this widely used herbicide, and its manufacturer heavily markets it as environmentally and toxicologically benign. Therefore, NCAP is devoting a large proportion of this issue to glyphosate's hazards (see pp. 3-16). In this short introduction, however, we answer some of the general points that are frequently raised in debates about glyphosate use.



Caroline Cox is JPR's editor.



Beith Coddington

Industry's claim: The *Journal of Pesticide Reform* is not peer reviewed.

NCAP's Response: Prior to publication, scientific research is typically evaluated by independent researchers. This process is called "peer review" and is designed to improve the quality of published research. JPR does not publish original research, and so it is not peer reviewed. However virtually all of the studies which we cite in our glyphosate factsheet are either peer-reviewed research articles, government documents, or publications from pesticide manufacturers.

Industry's claim: Federal and international agencies have favorably evaluated glyphosate. There's no need for further evaluation.

NCAP's Response: It has been fifty years since pesticide use became widespread. During that time, there has been a series of problems caused by pesticides even though these chemicals had been favorably evaluated by government agen-

cies. People should be encouraged to look at the data that are the foundation of these evaluations and independently decide if they agree with the conclusions.

Industry's claim: NCAP does bad science, ignoring favorable research and focusing on research that documents problems.

NCAP's Response: Pesticide research is typically conducted or paid for by pesticide manufacturers. These manufacturers have the resources to widely publicize these studies. NCAP is a nonprofit organization providing people with information about pesticide hazards to which they otherwise would not have access. Scientific research is not a popularity contest, with the winner getting the most "votes": all identified hazards need to be seriously considered.

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When Rachel Carson published *Silent Spring* in 1962, the pesticide industry responded by branding her an unscientific alarmist. We are humbly honored to be following in her footsteps.

References

1. Franz, J.E., M.K. Mao, and J.A. Sikorski. 1997. Glyphosate: A unique global herbicide. ACS Monograph 189. Washington, D.C.: American Chemical Society.
2. Fritsch, P. 1996. Top-selling Monsanto herbicide won't die on the vine. Wall Street Journal (Jan 2): A13.
3. Monsanto Co. Undated. Letter from Dan Holman, communications manager.