WATER CONDITIONERS, PH, AND WATER HARDNESS. Fred Whitford and Bill Johnson, Coordinator, Purdue Pesticide Programs and Professor, Department of Botany and Plant Pathology, Purdue University, West Lafayette, IN 47907-1155.

Effective pesticide applications require attention to factors that influence product performance: product selection, label instructions, equipment calibration, and application timing. However, one factor that doesn't get much attention is the quality of the water used to spray the product. Water often compromises ninety-five percent (or more) of the spray solution. What affect might it have on product performance?

Since water normally is used to deliver the chemical to the target pest, it should be considered the foundation for the application process. This presentation will discuss the pH and hardness of water and what influences these and other factors may have on product performance. Correcting the pH or solving hardness problems depends on the particular pesticide label restrictions or requirements as well as the target species. Specific guidelines will be provided as to when the use of water conditioners may be appropriate.

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