

Ask a FARM FAMILY



The Schweitzers – Amy, Mike, Eli and Warren – farm in rural Esmond. They grow corn, soybeans, sweet corn and peas and raise 4-H animals. Mike is a sixth generation farmer.

Q: Why do farmers spray chemicals on crops?

A: Pesticides are safe and effective in controlling weeds/pests and we use the least amount possible to get the job done.

As a farmer there are a few topics that we receive push back on from time to time. Usually it is not a criticism that we face firsthand but rather a criticism of the food that we produce. People often ask, ‘Why do farmers have to spray all of those chemicals on our food?’

Pesticides have faced a reputation problem for as long as I can remember.

When I began farming with my dad fifteen years ago I was surprised at the efficacy of a spraying job well done. I know this because my first year of spraying it was apparent that I had room for improvement with my application. It was plain to see precisely the spots that I had missed. The thing that impressed me the most though was how little amount of pesticide it actually took to stop the weeds from growing.

If you have ever had a garden or a flower bed and used Preen to keep the weeds from taking over then you have used a pre-emerge herbicide just like we use on our farm to prevent weeds from growing in our fields.

The main difference is that we are applying the least possible amount of pesticide possible to still get the job done. It is in our best economic interest to do so.

To ensure a good application job that uses the least amount of pesticide as possible we also dilute the pesticides into a large amount of water. This ensures that we spray the pesticides evenly on the plants or soil. Some spray solutions are less than one percent pesticide and then we still only spray fifteen gallons of that mix on an acre, which is roughly the size of a football field.

We also take meticulous care of our sprayer using the state-of-the-art spray tips developed to stop drift and GPS monitors to shut off sections of the sprayer to prevent overlap.

Another advantage to using these pesticides has been a large decrease in the amount of tillage necessary to raise a good crop.

This may seem like a small thing in the grand scheme of things but in actuality it is one of the most advantageous things for the environment. Plowing, disking, field cultivating, and ripping are all terms for “working the ground.” The use of pesticides to do this instead has a two-fold environmentally positive effect.

First it takes a lot of horsepower and a lot of fuel to till a field. This contributes to a direct release of greenhouse gases into the atmosphere whereas spraying to achieve the same weed control

is nearly negligible. The second advantage to spraying is that tillage degrades the soil quality causing loss of organic matter and erosion which steals the soil off of our fields.

Farmers are also trained and have to pass a Private Applicators test prior to even purchasing the restricted-use pesticides we use. We are trained on reading the pesticide labels, mixing and applying all pesticides, and ensuring safety. The EPA monitors this process and help to train us to use the right methods and techniques to not only do what is right for our farms, but also what is right for the community as well.

The amount of pesticides we use to control the weeds and insects is literally the least amount that we could possibly spray and still be effective. The EPA tests the products we use to make sure that they are not hazardous to the people and animals that consume the food that we grow.

Is the food we produce safe? Yes. It is not only the food that we are producing for the consumer but our families as well.

We have spent generations developing the pesticides and techniques we use to grow the safest, most affordable food in the world. Through scientific research, on-farm trials, innovation, and perseverance we have closed the gap on producing the most we can, while effectively improving the soil, and dramatically curbing our emissions all by spraying the least amount to get the job done. ■

Mike Schweitzer