

Profile from the Field

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Evaluating and Demonstrating Weed Control Options for Direct Seeded Fall Vegetable Crops

Project Titles: Evaluating and Demonstrating Weed Control Options for Direct Seeded Fall Vegetable Crops

Coordinators: Tom Buller

Location: Lawrence, Kansas

SARE Grants: \$29,495

Duration: 2018-2019

To read the full project reports, go to www.sare.org/projects and search for project number **ONC18-038**.

Managing and controlling weeds is an ongoing challenge and frustration for many farmers, but it can be especially cumbersome for organic producers, whose options for herbicides are limited. For these organic producers, no-till and conservation tillage systems can help conserve soil and can be used for weed control.

Tom Buller, a vegetable grower and extension agent with Kansas State University in Douglas County, knew that farmers in his area were struggling with pigweed. Buller was interested in trying some minimal tillage techniques to manage weeds using occultation, a power harrow, and flame weeding to create a stale seedbed. He received an NCR-SARE Partnership grant for \$29,495 to work with three nearby farmers to learn more about controlling pigweed in their fall-grown, direct-seeded spinach, beets, and carrots.

The project is on-going, and was impacted by drought in 2018, but so far, Buller and the team have conducted multiple bed trials. Buller reported that the flame weeder worked well for small pigweed, but he speculates that a combination of the methods would be more effective.



Tom Buller (far right) and this team of vegetable growers are working on reduced-tillage weed control in fall-seeded vegetable crops in Lawrence, Kansas.

“Overall using these methods alone seemed to show poor results with high weed pressure in test beds, however I suspect that using them together would more effective than using them by themselves,” said Buller.

For more information on Buller’s NCR-SARE Partnership grant project, visit the SARE project reporting website. Simply search by the project number, ONC18-038, at <https://projects.sare.org/>, or contact the NCR-SARE office.