## Weed Control in Liberty Link Canola (1998)

Glufosinate-tolerant (Liberty) canola was seeded on May 12 at 700,000 plants per acre. Seed bed preparation was conventional with six-inch row spacing. Treatments consisted of both early (June 6) and late-post (June 15) applications. On June 6 canola was 2-leaf, wild oat was 3-leaf. On June 15 canola was 3-4 leaf, wild was 5-leaf.

| Treatment | Rate | 7-4 | 8-11 |  |
| :---: | :---: | :---: | :---: | :---: |
|  |  | Wioa | Wioa | Yield |
|  |  | ------\% Control----- |  | lb/A |
| Untreated |  | 0 | 0 | 385 |
| Liberty + AMS | $20 \mathrm{fl} \mathrm{oz} / \mathrm{A}+3 \mathrm{lb} / \mathrm{A}$ | 87 | 86 | 1169 |
| Liberty + AMS | $27 \mathrm{fl} \mathrm{oz} / \mathrm{A}+3 \mathrm{lb} / \mathrm{A}$ | 93 | 92 | 1413 |
| Liberty + AMS | $34 \mathrm{fl} \mathrm{oz/A}+3 \mathrm{lb} / \mathrm{A}$ | 91 | 92 | 1100 |
| Liberty + AMS (Post II) | $27 \mathrm{fl} \mathrm{oz} / \mathrm{A}+3 \mathrm{lb} / \mathrm{A}$ | 87 | 77 | 849 |
| Liberty + AMS (Post II) | $34 \mathrm{fl} \mathrm{oz/A}+3 \mathrm{lb} / \mathrm{A}$ | 87 | 84 | 1009 |
| Liberty + AMS / | $20 \mathrm{fl} \mathrm{oz} / \mathrm{A}+3 \mathrm{lb} / \mathrm{A} /$ | 95 | 96 | 1398 |
| Liberty + AMS (Post II) | $20 \mathrm{fl} \mathrm{oz} / \mathrm{A}+3 \mathrm{lb} / \mathrm{A}$ |  |  |  |
| Poast + Stinger + Dash | $1 \mathrm{pt} / \mathrm{A}+0.5 \mathrm{pt} / \mathrm{A}+2.5$ | 93 | 95 | 1216 |
| Poast + Stinger + Dash (Post II) | $1 \mathrm{pt} / \mathrm{A}+0.5 \mathrm{pt} / \mathrm{A}+2.5$ | 96 | 98 | 1084 |
| CV |  | 3 | 6 | 11 |
| LSD (0.05) |  | 4 | 9 | 210 |

Soil conditions were very dry for the first 30 d after seeding ( 0.5 inch precip). We received 8 inches of rainfall the remainder of the growing season. Flea beetle population was high during the dry period and damage was significant. The canola crop was not as competitive as normally expected early in the growing season due to the dry conditions and flea beetle damage.

No crop injury or maturity differences were observed with any herbicide treatment. All Liberty and Poast treatments provided good to excellent control of wild oat. However, control was 10$20 \%$ higher when Liberty was applied to 3-lf wild oat compared to 5 -lf wild oat. Wild oat control was slightly higher with the split application of Liberty compared to single applications. Control with Poast was excellent at either application date. Kochia was present in the experimental area, but populations were not uniform and therefore not rated; however, kochia was controlled in Liberty-treated plots, but not in Poast + Stinger plots.

