2021 Annual Report
for the
Saskatchewan Ministry of Agriculture's
Agricultural Demonstration of Practices & Technologies (ADOPT) Program
Project Title: Controlling flax volunteers in Canary seed
Project # ADOPT20200501

Principal Applicants: Brianne McInnes[1] and Kevin Hursh[2]

[1]Northeast Agriculture Research Foundation, PO Box 1240, Melfort, SK, S0E 1A0
[2]Canary Seed Development Commission of Saskatchewan, Bay 6A-3602 Taylor Street E, Saskatoon, SK, S7H 5H9

Collaborators: Bryan Nybo[3], Don Sluth[3], Amber Wall[3], Mike Hall[4], and Heather Sorestad[4]

[3]Wheatland Conservation Area, Swift Current, SK
[4]East Central Research Foundation, Yorkton, SK

Correspondence: neag.agro@gmail.com or (306) 920-9393

Project Identification

1. **Project Title:** Controlling flax volunteers in Canary seed
2. **Project Number:** ADOPT20200501
3. **Producer Group Sponsoring the Project:** Canary seed Development Commission of Saskatchewan
4. **Project Location(s):** Melfort (RM #428 of Star City), Yorkton (RM #244), and Swift Current (RM #137)
5. **Project Start and End Dates (Month & Year):** April 2021 to February 1, 2022
6. **Project Contact Person & Contact Details:**

Primary Contacts:
Brianne McInnes, Operations Manager
Northeast Agriculture Research Foundation (NARF)
PO Box 1240, Melfort, SK, S0E 1A0
Work: (306) 920-9393; Cell: (306) 231-8900; Email: neag.agro@gmail.com

Kevin Hursh, Executive Director
Canary seed Development Commission of Saskatchewan
Bay 6A-3602 Taylor Street E, Saskatoon, SK, S7H 5H9
Phone: (306) 933-0138; Email: kevin@hursh.ca

Collaborators:
Bryan Nybo, Manager
Wheatland Conservation Area (WCA)
PO Box 2015, Swift Current, SK, S9H 4M7
Phone: (306) 773-4775; Email: wcanybo@sasktel.net

Mike Hall, Research Coordinator
East Central Research Foundation (ECRF)
PO Box 1939, Yorkton, SK, S3N 3X3
Phone: (306) 621-6032; Email: m.hall@parklandcollege.ca

Objectives and Rationale

7. **Project Objectives:**
The project objective was to demonstrate the control of flax volunteers in Canary seed using multiple registered herbicides.

8. **Project Rationale:**
Saskatchewan has become the world's leading exporter as well as producer of Canary seed, and accounts for 95% of the acreage in Canada according to the Canary seed Development Commission of Saskatchewan. The majority of sold seed enters the market for bird seed to be sold in feed mixtures for wild and caged birds. In 2016, approval was given for de-hulled glabrous varieties to enter the human food market (About Canary Seed, 2022). Canary seed is gluten free, which when ground into a flour may provide an alternative to wheat flour, and this may present improved economic opportunities with the growing attraction of gluten free diets. Because canary seed acres are expected to increase in

Saskatchewan as the crop is adopted for human food, being able to include it in multiple crop rotations is of interest to producers. Currently, Canary seed is not recommended to be grown following a flax crop as flax is very difficult to separate from harvested canary seed. The two crops are hard to separate as both have a similar seed size and shape. This creates limitations in crop rotations as cereals are generally grown following oilseed crops in an ideal 3-year crop rotation. In 2020, according to the Government of Saskatchewan the amount of seeded flax acres increased by 5.4% and Canary seed increased by 1.3%. Due to the increase in seeded flax acres, and the current recommendation to avoid seeding Canary seed following flax, the potential for reduced Canary seed acres in subsequent years is likely. Proper control of flax volunteers is needed for producers to be able to confidently seed Canary seed following a flax crop.

There are multiple herbicides that are registered for control or suppression of flax in Canary seed, however many are only registered under the minor use program. Bill May from AAFC Indian Head, SK has completed a variety of research involving Canary seed (Barker, 2016). His research has investigated multiple different herbicide applications in Canary seed; however, his research has not been specifically designed to demonstrate flax control. There are multiple different registered herbicides for flax control in Canary seed, however the Government of Saskatchewan and the Canary Seed Development Commission of Saskatchewan both do not recommend seeding Canary seed following a flax crop; therefore, a demonstration was set-up in 2021 to demonstrate flax control in canary seed using multiple registered herbicides with volunteer flax control.

Works Cited

About Canary Seed. 2022. Canary seed Development Commission of Saskatchewan. Online. Available: Canary Seed Development Commission of Saskatchewan: About Canary Seed. Accessed January 18, 2022.

Barker, B. 2016. Canary seed Weed Control. Top Crop Manager. Online. Available: Canaryseed weed control - Top Crop ManagerTop Crop Manager. Accessed January 18, 2022.

Government of Saskatchewan. 2020. Crop Production: By Seeded Area. Online. Available: Saskatchewan's Dashboard - Crop Production. Accessed January 18, 2022.

Methodology and Results

9. **Methodology:**

The demonstration was conducted at three locations including Melfort, Yorkton, and Swift Current, SK in 2021. The treatments consisted of a weedy check, a weed free treatment, and four different registered herbicides for flax control in Canary seed (Table 1). The weed free treatment was kept free of weeds by hand weeding throughout the season at all sites. Plot size varied by site, however the treatments were arranged in a randomized block design with four replications at every site. A commonly grown, glabrous Canary seed variety was used at each site, at the current recommended seeding rate of 34 kg/ha. All sites were soil sampled prior to seeding in the spring of 2021, and N, P, K, and S were all supplied as per soil sample recommendations to be non-limiting. Soil residuals from every site were included in Table 8 of the Appendices. All herbicide applications were applied as per the recommended rate on the herbicide labels for Canary seed and at the recommended crop stage (Table 1).

Table 1. Treatments used in Controlling flax volunteers in Canary seed in Melfort, Yorkton, and Swift Current, SK in 2021.

Treatment #	Product	Rate[x]	Timing[y]
1	Weedy Check	--	--
2	Weed Free	--	--
3	Facet L (quinclorac)	280mL/ac of Facet L	3-5 leaf
4	Trophy (fluroxypyr+MCPA)	240mL/ac of fluroxypyr+380mL/ac MCPA 600 ester	3 leaf- full flag leaf emergence
5	Prestige XL (clopyralid+MCPA+fluroxypyr)	710mL/ac of Prestige XL	3 leaf- prior to flag
6	Enforcer M (bromoxynil+MCPA+fluroxypyr)	510mL/ac of Enforcer M	3-5 leaf

[x]All products will be applied at recommended rates for flax control in Canary seed

[y]Recommended crop stages for Canary seed for each product provided in the 2020 Saskatchewan Crop Protection Guide.

Agronomic information and dates of operation at each site was included in Table 7 of the Appendices. The Canary seed was established on canola stubble at Yorkton and Melfort and on barley stubble at Swift Current. Seeding dates were very comparable at all sites, with Melfort and Swift Current seeding on May 12, and Yorkton on May 14. Plot size and seeding equipment varied by site, with row spacing being 30.5cm at Melfort and Yorkton and 21cm at Swift Current. The variety of Canary seed used at Yorkton and Melfort was CDC Cibo, whereas CDC Bastia was the variety selected at Swift Current. Flax was broadcast at all sites prior to seeding. The broadcasted rate of flax varied by site, however each site targeted 100 plants/m^2, while correcting for low survivability and each sources respective seed weight. Each site used registered crop protection productions at their own discretion for pre-emergent weed control, crop disease, insect control, and for crop desiccation. Plots were harvested at every site using a plot combine when the plants were deemed mature. The plots were straight combined on August 30 at both Yorkton and Swift Current, and on September 8 at Melfort.

Data collection at each site consisted of environmental data, plant density, % flax control, seed yields, and % dockage. Environmental data throughout the growing season at each site was retrieved from the nearest Environment Canada Weather Station. Plant densities at each site were determined by counting 2 1-meter crop rows per plot, and converting the plants counted into a plants/m^2 equivalent. To determine % flax control, the number of flax seedlings in 1m^2 per plot were counted prior to the herbicide treatments being applied. The number of flax plants present in 1m^2 per plot were then counted again in every plot approximately 1 month after treatments were applied. The change in plants/m^2 of flax per plot after treatment applications was then converted into a percentage to demonstrate % flax control. Flax counts prior to and following treatment applications at Melfort and Swift current were included in Table 9 of the Appendices. At Yorkton flax counts were done prior to herbicide applications (AVG=60 plants/m^2), however flax counts were not completed following treatment applications, and rather a % rating was completed based on visual observations. Seed yields were determined by weighing every harvested plot sample and converting grams/plot to kg/ha, while correcting to a 13% seed moisture content. % Dockage was determined by retrieving a subsample from the full harvested plot sample, separating out the flax seed, weighing the flax seed, and using the grams

of flax as compared to the full subsample weight to determine the percentage of the subsample that contained flax seed. Lastly, all sites were analyzed individually using Randomized Complete Block in Statistix 10 for statistical analyses and treatment means as presented in Tables 3-6.

10. **Results:**

Environmental Conditions:

At all sites 2021 was a much warmer and drier growing season as compared to the long-term average (Table 2). Similar trends occurred at all sites for monthly temperature averages where June, July and August were all warmer than the long-term average. May was the only month where all sites experienced a decrease in average temperatures ranging from a 1.1-1.5°C decrease as compared to the long-term average. Swift Current had the greatest average increase in growing season temperature with a 1.4°C increase, Yorkton with a 1.3°C increase, and Melfort with a 1°C increase. Total growing season precipitation was also reduced at every site, ranging from 54-75% of the total growing season accumulation as compared to the long-term averages (Table 2). Yorkton had the greatest reduction in precipitation with 124mm less or 54% of the long-term average. Melfort had a more moderate reduction in comparison with an 87.8mm reduction in total precipitation or 62% of the long-term average. Although this reduction from the long-term average was less than Yorkton, Melfort received the lowest precipitation amount as compared to all other sites at 138 mm. Lastly, Swift Current had a 54.4mm reduction in total precipitation or 75% of the long-term average.

Table 2. Mean temperatures and precipitation collected from the Environment Canada Weather Station at Melfort, Yorkton, and Swift Current, SK for May to October 2021.

	May	June	July	August	Average/Total
--Temperature(°C)--					
Yorkton 2021	8.9	19.1	21.0	17.3	16.5
Long-Term[x]	10.4	15.5	17.9	17.1	15.2
Swift Current 2021	9.5	18.4	21.7	18.0	16.9
Long-Term[x]	10.9	15.3	18.2	17.6	15.5
Melfort 2021	9.6	18.2	20.1	16.9	16.2
Long-term[x]	10.7	15.9	17.5	16.8	15.2
--Precipitation(mm)--					
Yorkton 2021	24.6	18.1	35.2	69.7	147.6 (54%)
Long-Term[x]	51.0	80.0	78.0	62.0	272
Swift Current 2021	35.0	29.6	38.9	55.8	159.3 (75%)
Long-Term[x]	44.1	74.5	51.9	43.2	213.7
Melfort 2021	31.4	37.6	0.2	69.3	138.5 (62%)
Long-term[x]	42.9	54.3	76.7	52.4	226.3

[x] Long-Term Climate Normal from Melfort Environment Canada Weather Station (1981-2010)

Plant Density

Plant density was not significantly different between treatments at any of the sites, however average plant stands did vary by location (Table 3). Overall, Yorkton had the greatest average plant densities at 270 plants/m^2. Swift Current had lower plant densities, but they were still greater than Melfort at 125.8

plants/m^2. Melfort had the lowest average plant densities at 104.6 plants/m^2. It is uncertain why plant densities were so low at Melfort in comparison to Yorkton, however as seeding operations varied by site, it is likely that different agronomic inputs or soil conditions at seeding caused large variance in plant emergence at each site. Lastly, treatment applications were made after plant emergence, so no treatment responses to plant emergence were anticipated.

Table 3. Statistical analyses and treatment means for plant density (plants/m^2) for Controlling flax volunteers in Canary seed in 2021. Means within a column followed by the same letter do not significantly differ (Tukey-Kramer, P ≤ 0.05).

Source /Treatment	Yorkton	Melfort	Swift Current
Plant Density (plants/m^2)			
P-value	0.2392	0.1115	0.9962
Grand Mean	270.0	104.6	125.8
CV	14.01	10.37	22.11
Treatment			
Weedy Check	271.1a	107.0a	123.5a
Weed Free	286.8a	96.8a	129.4a
Facet L (Quinclorac)	230.6a	102.5a	122.6a
Trophy (Fluroxypyr+MCPA)	255.0a	104.2a	128.3a
Prestige XL (Fluroxypyr+Copyralid+MCPA)	286.0a	98.0a	129.4a
Enforcer M (Fluroxypyr+Bromoxynil+MCPA)	290.5a	118.9a	121.7a

% Flax Control

% Flax control was only significantly different between treatments at Yorkton and Swift Current (Table 4).

The lack of significance at Melfort was likely attributed to the low flax populations prior to treatment applications as well as the high variation between replications for every treatment (CV=71.89). Both Yorkton and Swift Current demonstrated similar trends for % flax control, where the Facet L treatment demonstrated comparable flax control to the weedy check. In contrast, at Swift Current the Facet L treatment and the weedy check both had significantly reduced % flax control as compared to all other treatments, whereas at Yorkton the Facet L treatment had significantly reduced control as compared to the weed free treatment, however Facet L was still statistically comparable in % flax control as compared to all other herbicide treatments. Furthermore, because herbicide efficacy may be dependent on many different factors it is hard to determine why % flax control may have varied by treatment and by site. Overall, the coefficient of variation (CV) was quite high at every site, indicating that there was a high level of variability for each treatment at each site and between replications, most notably at Melfort.

Table 4. Statistical analyses and treatment means for % flax control for Controlling flax volunteers in Canary seed in 2021. Means within a column followed by the same letter do not significantly differ (Tukey-Kramer, P ≤ 0.05).

Source /Treatment	Yorkton	Melfort	Swift Current
% Flax Control			
P-value	0.0006**	0.0976	<0.0001***

Grand Mean	53.8	54.4	69.8
CV	46.2	71.89	31.76
Treatment			
Weedy Check	3.8c	--	10.7b
Weed Free	97.8a	100.0a	87.6a
Facet L (Quinclorac)	18.8bc	70.8a	22.6b
Trophy (Fluroxypyr+MCPA)	58.8abc	75.0a	100.0a
Prestige XL (Fluroxypyr+Copyralid+MCPA)	74.8ab	59.4a	99.4a
Enforcer M (Fluroxypyr+Bromoxynil+MCPA)	68.8ab	66.7a	98.8a

Grain Yield

Grain yield was only significantly different between treatments at Yorkton (Table 5). Overall, average grain yields were greatest at Melfort (1361.5 kg/ha), moderate to low at Yorkton (721.6 kg/ha) and extremely low at Swift Current (191.4 kg/ha). At Swift Current, grain yields were greatly impacted by heavy kochia infestations, and thus only three replications were included in the treatment comparisons. Yields were greatest in the first two replications at Swift Current, however regardless of how many replications were included in the statistical analyses, the significance between treatments was unchanged. Overall, because yields were low and variable at this site there was little impact to grain yields from treatment applications. At Melfort, grain yields averaged from 1169.2-1482.2kg/ha. The lowest average yields were from the Facet L treatment, and the highest average yield from the weedy check (Table 4). This was surprising as weed competition in the weedy check would have been anticipated to negatively impact grain yields. Overall, weed pressure was low at Melfort due to dry conditions, which was likely the cause of the lack of significance between treatments for grain yields. At Yorkton, the lowest grain yields occurred in the weedy check, however this treatment was statistically comparable to the Facet L treatment. All other herbicide applications as well as the weed free treatment demonstrated significantly increased grain yields as compared to the weedy check.

Table 5. Statistical analyses and treatment means for Grain Yield (kg/ha) for Controlling flax volunteers in Canary seed in 2021. Means within a column followed by the same letter do not significantly differ (Tukey-Kramer, P ≤ 0.05).

Source /Treatment	Yorkton	Melfort	Swift Current
Grain Yield (kg/ha)			
P-value	0.0021*	0.0797	0.7277
Grand Mean	721.6	1361.5	191.4
CV	14.46	10.75	38.23
Treatment			
Weed Check	490.7b	1482.2a	182.0a
Weed Free	805.0a	1280.9a	223.5a
Facet L (Quinclorac)	651.1ab	1169.2a	193.2a
Trophy (Fluroxypyr+MCPA)	753.7a	1418.9a	145.4a
Prestige XL (Fluroxypyr+Copyralid+MCPA)	863.0a	1424.3a	174.3a
Enforcer M (Fluroxypyr+Bromoxynil+MCPA)	766.3a	1393.3a	229.9a

% Dockage

% Dockage was determined to be statistically significant between treatments at Yorkton and Swift Current (Table 6), however no dockage was determined at Melfort. At Yorkton, % dockage followed similar trends as compared to % flax control. At this site all herbicide applications had dockage comparable to the weed free treatment, however all treatments aside from the Facet L application had significantly less dockage as compared to the weedy check. This demonstrates that the Facet L treatment was able to provide greater flax control as compared to the unsprayed treatment, however the level of control was reduced numerically as compared the other herbicide treatments at this site. Furthermore, at Yorkton dockage only accounted for flax seed in the subsample, whereas at Swift Current % dockage included all weed seeds, which was mostly comprised of kochia. Therefore, the significance at this site was not indicative of flax control, but rather that the weed free treatment had less dockage, as all other treatment applications did not provide adequate control of the kochia infestation throughout the trial area.

Table 6. Statistical analyses and treatment means for % Dockage for Controlling flax volunteers in Canary seed in 2021. Means within a column followed by the same letter do not significantly differ (Tukey-Kramer, P ≤ 0.05).

Source /Treatment	Yorkton	Swift Current
% Dockage		
P-value	**0.0005****	**0.0001****
Grand Mean	**4.4**	**48.8**
CV	**84.26**	**25.13**
Treatment		
Weedy Check	**14.2a**	**61.7a**
Weed Free	**0.8b**	**6.6b**
Facet L (Quinclorac)	**7.2ab**	**69.1a**
Trophy (Fluroxypyr+MCPA)	**2.2b**	**50.7a**
Prestige XL (Fluroxypyr+Copyralid+MCPA)	**0.0b**	**56.2a**
Enforcer M (Fluroxypyr+Bromoxynil+MCPA)	**2.0b**	**48.8a**

11. Conclusion and Recommendation:

The 2021 season was a very challenging season at all participating sites, with limited moisture and warmer than average temperatures throughout most of the growing season. With limited flax emergence at Melfort, treatment differences were rarely significant and all herbicide applications were comparable for flax control and grain yield. Both Yorkton and Swift Current had much better flax emergence, however heavy kochia presence at the Swift Current site resulted in very low and variable yields, along with high dockage in all treatments, but the hand weeded check. Yorkton demonstrated that greatest treatment responses, with significant treatment differences in % flax control, grain yields and % dockage. General treatment responses for this one-year demo were that when % flax control was significant the Facet L treatment had numerically reduced control as compared to the other herbicide applications, but was greater than when no weed control was provided. Overall, applying a herbicide that was approved for flax control in Canary seed did reduce flax presence in crop, however there was very rarely 100% control. Due to limited flax emergence at Melfort and kochia infestations at Swift

Current, it would be beneficial to repeat this demonstration to further evaluate each treatment, and their ability to provide volunteer flax control in a Canary seed crop.

Supporting Information:

12. **Acknowledgements:** The Canary seed Development Commission of Saskatchewan and the Northeast Agriculture Research Foundation would like to express our gratitude to the Saskatchewan Ministry of Agriculture's ADOPT program for funding this demonstration and for providing signage. Thank you to all participating sites including; the East Central Research Foundation, the Northeast Agriculture Research Foundation and the Wheatland Conservation Area staff for their hard work in completing this demonstration.

13. **Extension:** This demonstration was highlighted on the Wheatland Conservation Areas "Walk the Plots," in collaboration with the CKSW radio station in Swift Current in the spring of 2021. The demonstration will also be summarized in the Canary Seed News that will be released in the spring/summer of 2022. The final project report will also be made available on neag.ca this winter.

14. Abstract and Summary:

The province of Saskatchewan accounts for 95% of the canary seed grown in Canada according to the Canary seed Development Commission of Saskatchewan. Canary seed is typically sold into the bird seed market, however with new hairless varieties approved for human consumption new market opportunities are likely to arise in coming years. With an increase in seeded flax acres in Saskatchewan in 2020, and the current recommendation to not grow Canary seed following a flax crop due to difficulty sorting out any harvested volunteer seed, Canary seed acres are likely to decrease. With many herbicide options registered for control of flax in Canary seed this recommendation suggests that adequate control of flax volunteers can not be achieved with an in-crop herbicide application. To demonstrate flax control in Canary seed a small-plot demonstration was developed and conducted near Melfort, Yorkton, and Swift Current, SK. The demonstration included six treatments which consisted of 4 registered herbicides in canary seed that control flax volunteers, a weedy check treatment, and a weed free treatment, which was weeded by hand. The four herbicides used included Facet L (Quinclorac), Trophy (Fluroxypyr + MCPA), Prestige XL (Fluroxypyr + Copyralid + MCPA) and Enforcer M (Fluroxypyr + Bromoxynil + MCPA). All herbicides selected were applied under the recommended rates and at the recommended crop stage for use in Canary seed. Data collection for the demonstration consisted of plant density, % flax control, grain yield, and % dockage. Plant densities did not significantly differ by treatment, however there were large average differences between sites. Yorkton had the greatest plant densities followed by Swift Current and then Melfort. % Flax control was significant at both Yorkton and Swift Current, with the weedy check and Facet L application demonstrating significantly reduced flax control as compared to all other treatments at Swift Current. At Yorkton the weedy check demonstrated significantly reduced control as compared to all other treatments, however the Facet L treatment was still statistically comparable to all other treatment applications. Grain yield differences between treatments were only significant at Yorkton where yields were significantly reduced for the weedy check. Yields were also numerically lower for the Facet L treatment, however yields were still statistically comparable for this treatment as compared to all other herbicide applications. % Dockage for flax was only significant between treatments at Yorkton, where the weedy check had significantly higher % flax in the harvested seed as compared to the weed free, Trophy, Enforcer M and Prestige XL treatments. The Facet L treatment was statistically comparable to all treatments, including the weedy check.

15. Appendices:

Table 7. Agronomic information and dates of operation for Controlling flax volunteers in Canary seed at Melfort, Yorkton, and Swift Current, SK in 2021.

Factor/Operation	Melfort	Swift Current	Yorkton
Previous Crop	Canola	Barley	Canola
Pre-Emergent Weed Control	Glyphosate540 @ 0.67L/ac May 14	Glyphosate540 @ 0.67L/ac May 3	Liquid Avadex (May 11)
Seeding Date	May 12	May 12	May 14
Variety	CDC Cibo	CDC Bastia	CDC Cibo
Seed Rate (kg/ha) of Canary	34	34	34
Broadcast rate of Flax (kg/ha)	11.1 (CDC Glas on May 12)	11.2 May 10	13.5 (May 3)
Row Spacing (cm)	30.5	21.0	30.5
Plot size	2m X 7m	2.1 X 9.1m	3.4m X 9.1m
Kg N-P_2O_5-K_2O-S/ha	56-22-45-0	39-10-0-8	67-34-27-0
Emergence Counts	June 4	June 8	June 6
In-Crop Herbicides Treatments	June 22	June 14	June 8
Flax counts (before trt apps)	June 8	June 11	June 6
Foliar Fungicide	None	None	None
Foliar Insecticide	None	None	None
% Flax Control after trt apps	July 26	June 25	July 23
Pre-harvest Application	None	Reglone (830mL/ac) August 6	None
Harvest Date	Sept 8	August 30	August 30

Table 8. Soil sample results for Controlling flax volunteers in Canary seed at Melfort, Yorkton, and Swift Current, SK in 2021.

Depth	NO3-N (kg/ha)	Olsen-P (ppm)	K (ppm)	S (kg/ha)	pH	Organic Matter (%)	Salts (mmho/cm)
Melfort							
0-15cm	38	10	511	13.5	5.7	8.8	0.35
15-30cm	31.5	--	--	11	6.0	--	0.39
Yorkton							
0-15cm	65	9	417	67	7.3	6.1	0.71
15-30cm	52	--	--	29	7.7	--	0.53
Swift Current							
0-15cm	31.5	4	278	135	7.9	2.9	2.93
15-60cm	37	--	--	360+	8.2	--	4.19

Table 9. Flax counts prior to herbicide applications and following herbicide applications in Controlling flax volunteers in Canary seed at Melfort and Swift Current in 2021. Means within a column followed by the same letter do not significantly differ (Tukey-Kramer, P ≤ 0.05).

Treatment	Flax counts prior to treatment applications (Plants/m2)		Flax counts after treatment applications (plants/m2)	
	Melfort	Swift Current	Melfort	Swift Current
Weedy Check	--	15.5a	--	12.8a
Weed Free	0.0a	15.0a	0.0a	1.5ab
Facet L (Quinclorac)	5.75a	10.8a	7.25a	9.3ab
Trophy (Fluroxypyr+MCPA)	2.5a	7.3a	0.5a	0.0b
Prestige XL (Fluroxypyr+Copyralid+MCPA)	7.5a	22.3a	1.5a	0.5ab
Enforcer M (Fluroxypyr+Bromoxynil+MCPA)	3.0a	21.9	1.0a	0.3b