

Flax Fiber Photos

The following photos show an assortment of flax fiber trials in Saskatchewan with both Fiber Flax grown specifically for fiber and with Oilseed Flax where we were able to improve both the quality and yield of flax grown for oilseed production after harvesting the seed.

Contact Alvin Ulrich, Biolin Research Inc.

Cell and text: 306.280.1701

aulrich@biolin.sk.ca

with your questions and comments.



Figure 1 - Planting research plots - Initially we grew European fiber flax varieties and Canadian oil seed flax varieties and treated them both like the Europeans do to see if we could produce high quality flax fiber from both types of flax



Figure 2 - Counting the number of plants in a square meter (target of $2,000/m^2$)



Figure 3 - Plot trials comparing Canadian oilseed flax with European fiber flax



Figure 4 - Flax pulled out of fiber and oilseed variety plots in preparation for field retting



Figure 5 - Rolled up retted flax straw from research plots



Figure 6 - Extracting long flax fiber from long retted flax straw using home-made lab scale blade decorticator machine



Figure 7 – Some department stores in China had a whole floor devoted to linen (flax) clothing



Figure 8 – A lot of linen clothing in China is knitted by using the best quality fiber and adding a tiny filament of spandex to the yarn making it easy to care for, no wrinkles and cooler than cotton



Figure 9 - Seed packing trials (preparing for field scale planting)

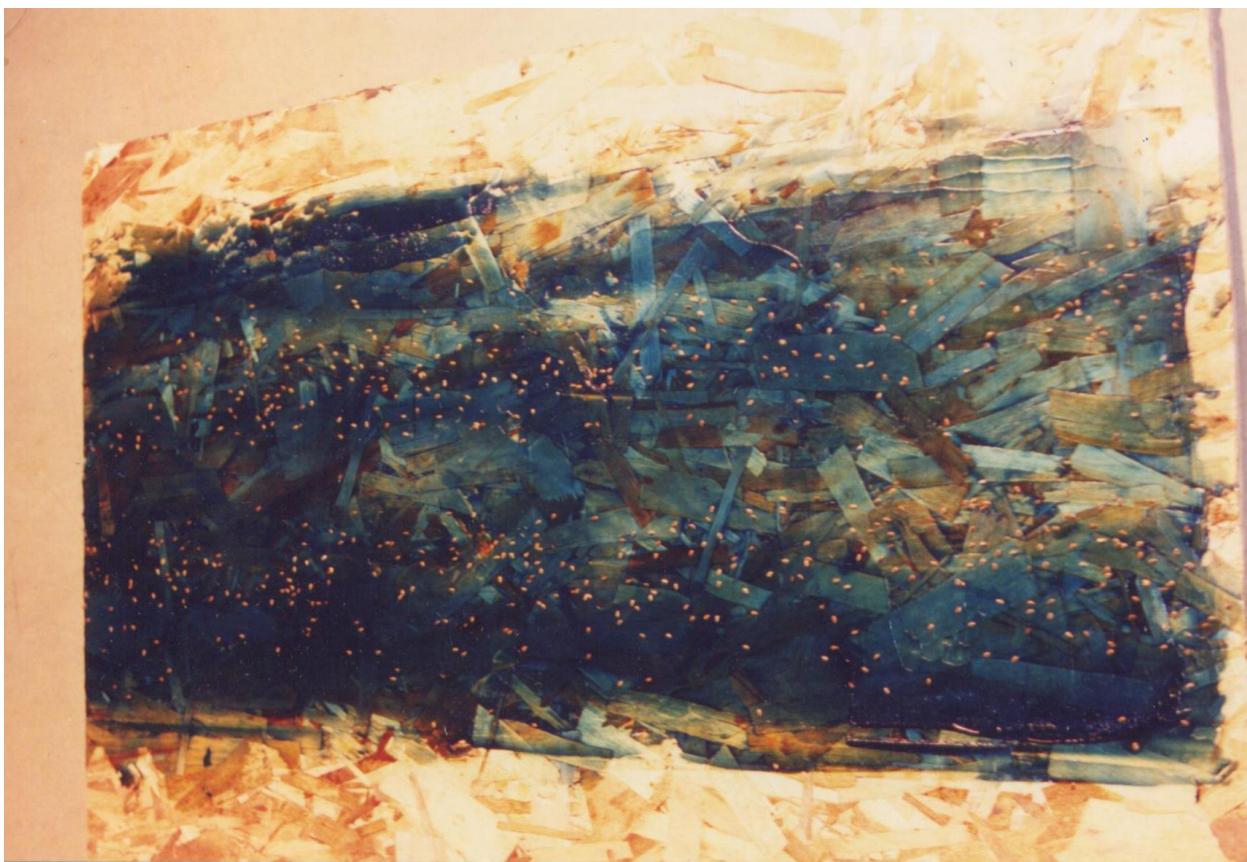


Figure 10 - Seed spread trials to find ways to get high percentage of seedbed utilization combined with a high seeding rate to maximize fiber yield and quality



Figure 11 - Seeding for field scale trial to improve fiber yield and quality



Figure 12 - Successful trial with high yield of high quality flax plants



Figure 13 - Using a flax pulling machine to pull Saskatchewan grown fiber flax to copy what Europeans do to get high quality fiber



Figure 14 - "Pulled" fiber flax waiting to ret (copying European system to learn the principles of producing high quality fiber)



Figure 15 - Research into alternatives to "pulling" flax straw (using a stripper header on a combine to only harvest the seeds and leave the straw standing)



Figure 16 - Research into alternatives to "pulling" flax straw (here we are doing a cutting trial of straw already stripped of seed)



Figure 17 - Research into alternatives to "pulling" flax straw (here we are using a land roller to knock down the standing flax)



Figure 18 - Rolled or cut flax straw retting in late fall



Figure 19 - Rolled or cut oilseed straw in a thin layer touching the ground, easily retted by spring



Figure 20 - Raking up of retted straw in early spring (we now use much bigger rakes) or leave straw stand over winter and cut with a swather in the spring and then bale



Figure 21 - In Europe, shives are often sold as premium horse bedding



Figure 22 - Raking retted oilseed flax straw in the spring using a v-rake



Figure 23 - Baling retted oilseed straw in late fall or early spring



Figure 24 - Round bales of retted or “weathered” oilseed flax straw (note grayish color)



Figure 25 – Making small bales of retted oilseed flax in spring for processing trials



Figure 26 - Bottom fiber bales were produced from retted oilseed flax bales like the top bale



Figure 27 - Insulation made from retted or weathered flax fiber



Figure 28 – Seat cover, insole, insulation samples, yarn, board and bowl made from flax fiber, shive or straw



Figure 29 - Plastic parts containing flax shive (for a “filler”) or flax fiber (for strength)



Figure 30 – Flax shive used as landscape mulch



Figure 31 – Three trial sizes of shive packaging for the landscape mulch market



Figure 32 – The bale entry point of the Biolin Research flax straw and tow processing line