

# THE UNIFORM SOYBEAN TESTS

## NORTHERN REGION

2024



Guohong Cai and Adam Brock

UNITED STATES DEPARTMENT OF AGRICULTURE  
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COOPERATING WITH  
STATE AGRICULTURAL EXPERIMENT STATIONS NORTHERN STATES



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## 2024 UNIFORM SOYBEAN TESTS NORTHERN REGION

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The Uniform Soybean Tests are conducted and managed as a component of a CRIS project on Enhancing Resistance to Root Rot Pathogens of Soybeans in the USDA-ARS Crop Production and Pest Control Unit at West Lafayette, Indiana.

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## Introduction

The purpose of The Uniform Soybean Tests is to critically evaluate the best of the experimental soybean lines developed by federal and state research personnel in the U.S. and Canada, for their potential release as new varieties.

A test is established for each of ten maturity groups. Uniform Test 00 includes maturity Group 00 strains adapted to production in the northern fringe of the present area of soybean production. Uniform Tests 0 through IV include later maturing strains adapted to locations progressively further south in the North Central States and areas of similar latitude. Each year new selections are added and others that have been sufficiently tested are dropped from the tests. The summary of performance of strains in Uniform Tests 00 through IV in the northern region is included in this report. The USDA-ARS Soybean Production Research Unit, P.O. BOX 345, STONEVILLE, MS 38776, issues the report on Uniform Tests IVS through VIII in the southern states.

Data from the Uniform Soybean Tests are the basis for decisions on the regional release of soybean varieties. Preliminary Tests are grown at a limited number of locations throughout the region to evaluate the experimental strains for one year before they are dropped or advanced in the Uniform Tests. Uniform Tests are grown at more locations with more replications than Preliminary Tests.

The Uniform Soybean Test Report is a progress report containing statements, which may or may not be verified by subsequent experiments. Statements or data in the report, therefore, should not be published unless those concerned have obtained permission previously.

The USDA-Agricultural Research Service does not vouch for the authenticity of either the parentage or ancestry of entries in the Uniform Soybean Tests. This agency is not responsible for the accuracy of data submitted to and included in The Uniform Test Report.

Germplasm exchange among breeding programs is the foundation of breeding progress. The purpose of the Uniform Soybean Test is to facilitate the free exchange of germplasm to maximize genetic diversity and provide well-adapted, stable breeding lines and varieties in the pursuit of breeding progress. Participants are encouraged to exchange germplasm within the legal guidelines pertaining to transgenic strains.

## Introduction

### NORTHERN REGION UT – POLICY ON EVALUATION AND RELEASE OF STRAINS

#### Qualifications for inclusion in the Uniform Tests:

- 1) Participants must be willing and able to conduct separate tests for conventional strains and strains containing proprietary and/or transgenic traits. However, all participants are not required to evaluate both; and, placement of proprietary entries depends on whether transgenic or non-transgenic.
- 2) Participants are individually responsible to ensure that any proprietary and/or transgenic strains that they submit are approved for human consumption and are cleared for sale as commodity seed.
- 3) Participants must disclose pedigrees to the Uniform Test Coordinator for publication with performance data in Uniform Soybean Test Report unless contract arrangements prohibit disclosure of information.
- 4) It is recommended that breeders obtain written permission for the use of privately developed varieties or strains that are used as parents in the development of lines included in the Uniform Tests.

#### Use of Uniform Test entries in soybean breeding and research:

- 1) Seed of Uniform Test entries is for evaluation in the Uniform Tests only and may not be distributed to non-participants in these tests without prior approval by the originator of the entry.
- 2) Uniform Test participants must obtain written approval before using any entry, other than their own, as a recurrent parent in backcrossing, in any breeding or genetic studies, or for any other research.
- 3) Experimental strains entered in the Uniform Tests should be labeled “Experimental Strain” and should not be identified by strain designation when grown in demonstration plots or when the Uniform Tests are shown on field days or farm tours.
- 4) Seed of any transgenic entry must not be used for further evaluation without written permission from the originator of the entry and must be discarded at the end of the season, except for crossing purposes, subject to the restrictions outlined in the preceding sections two and three.

#### Release of Uniform Test entries:

Entries in the Uniform Tests are released according to the policy of the originating institution (USDA-Agricultural Research Service and State Agricultural Experiment Station or Canadian government).

## Strain Designations

Experimental (i.e., unreleased) strains are identified by a number with a state or province code letter prefix. The code letters have been agreed upon in meetings of experiment station agronomists with the U.S. Department of Agriculture. Additional code letters may be used to designate the individual within a state or province that developed the strain.

A	Iowa A.E.S. (A=W. Fehr/A.K. Singh, AR=S. Cianzio)
Ar	Arizona A.E.S.
Au	Alabama A.E.S.
B	California
C	Purdue (Indiana) A.R.P. (C=J.R. Wilcox, CL=A. LeRoy, CR=K. Rainey)
CM	Canada Dept. of Agriculture, Morden, Manitoba
D	Mississippi A.E.S.
DSN	Indiana (K. Rainey - Diers/Specht-developed NAM strains)
E	Michigan A.E.S.
F	Florida A.E.S.
FC	Forage and Range Research Branch, USDA
Ga	Georgia A.E.S.
H	Ohio A.R.D.C. (HC=R.L. Cooper, HF=R. Fioritto, HS=S.K. St. Martin/L. McHale) (HM=L. McHale)
K	Kansas A.E.S.
Ky	Kentucky A.E.S.
L	Illinois A.E.S. (LD=B. Diers, LG=R.L. Nelson/Adam Mahan, LN=C.D. Nickell, LW=D. Walker)
La	Louisiana A.E.S.
LS	Southern Illinois University (LS=M. Schmidt)
M	Minnesota A.E.S.
Md	Maryland A.E.S.
Me	Maine A.E.S.
N	North Carolina A.E.S.
ND	North Dakota A.E.S.
OAC	University of Guelph, Guelph, Ontario
OK	Oklahoma Agricultural Experiment Station
ORC	Ridgetown, Ontario
OT	Central Experimental Farm, Ottawa, Ontario
OX	Research Station, Harrow, Ontario
PI	Plant Inventory
R	Arkansas A.E.S.
RJ	Arkansas State University, Jonesboro
S	Missouri A.E.S. (SS=D. Sleper, SA=A.Scaboo)
SC	South Carolina A.E.S.
SD	South Dakota A.E.S.
T	Soybean Genetic Type Collection, USDA, Urbana, IL
Ts	Texas A.E.S.
U	Soybean Genetic Type Collection, USDA, Urbana, IL
U, NEX	Nebraska A.E.S.
UD	Delaware A.E.S.
UM	University of Manitoba, Winnipeg, Manitoba
UT	Tennessee A.E.S.
V	Virginia A.E.S.
W	Wisconsin A.E.S.
X(Y)	Two or more states cooperatively, e.g. ND(M) North Dakota and Minnesota distribution has not been made previously.

## Methods

Uniform tests are planted in multiple-row plots with two or three replications, and the center rows are harvested for yield and seed quality determinations. Preliminary Tests are multiple-row plots with two replications. Usually 15 to 20 feet of row are planted and 12 to 16 feet harvested, to eliminate end-of-row effects. Coefficients of variability are included with all replicated test data.

Discretion is used in including data with high CVs in the regional means. If the CV is greater than 15, participants should include the reason, such as disease or environmental conditions. Lines may be heterogeneous for morphological traits the first year in the Uniform Tests but must be pure lines the second year of testing. It is the responsibility of the breeder to purify heterogeneous lines.

Generation Compositing is the generation after the final single-plant selection, when seeds from plants or rows are composited.

Previous Testing is the number of previous years in the same Uniform Test or, in the case of new entries, a reference to the previous year's test, abbreviated to PT IIA for Preliminary Test IIA, for example.

Yield is measured after the seeds have been dried to uniform moisture content and is recorded in bushels (60 pounds) per acre. To convert to kilograms/hectare multiply by 67.25.

Maturity is the date when 95% of the pods have ripened, as indicated by their mature pod color. Delayed leaf drop and green stems are not considered in assigning maturity. Maturity is expressed as days earlier (-) or later (+) than the average date of the reference variety. To aid in maturity group classification, one earlier (E) and one later (L) check variety are given in the maturity column for each test, or a maturity check from an earlier or later maturity group is included. Current reference and check varieties and the maturity group limits relative to the reference varieties are:

Group	Reference:	Range	Early check	Late check
00	MN0083			MN0095
0	ND Dickey		MN0095	MN1511CN (SCN)
I	MN1511CN (SCN)		ND Dickey	MN1905CN (SCN)
II	IA2102		MN1905CN (SCN)	U14-910097 (SCN)
III	LD11-2170		U14-910097 (SCN)	LD07-3395bf (SCN)
IV	LD15-3818		LD07-3395bf (SCN)	LD00-2817
00TM	MN0083			AG03XF2
0TM	ND Dickey		AG03XF2	MN1511CN (SCN)
ITM	MN1511CN (SCN)		AG11XF2	MN1905CN (SCN)
IITM	IA2102		AG17XF2	U14-910097 (SCN)
IIITM	LD11-2170		AG25XF3	AG37XF1
IVTM	LD15-3818		LD07-3395bf (SCN)	AG42XF4

These maturity group ranges are based on long-term means over many locations. When using data from other environments, the interval between reference varieties may vary, and the division between maturity groups should be estimated in proportion to the above figures. Additional check varieties may be included in specific tests such as U11-917032 (SCN) for resistance to the soybean cyst nematode in UT I.

Lodging is rated at maturity according to the following scores:

1 = Almost all plants erect

2 = All plants leaning slightly or a few plants down.

3 = All plants leaning moderately (45 degrees), or 25% to 50% of the plants down.

4 = All plants leaning considerably, or 50% to 80% of the plants down.

5 = Almost all plants down.

## Methods

Height is the average length in inches of mature plants from the ground to the tip of the main stem. To convert to centimeters, multiply by 2.54.

Seed Size (i.e. weight per seed) is recorded in grams per 100 seeds based on a 100 - or 200 - seed sample. To convert to seeds per pound, divide this into 45,359.

Seed Quality is rated according to the following scores considering the amount and degree of wrinkling, defective seed coat (growth cracks), greenishness, and moldy or other pigment. Ratings for seed quality are:

1	-- Very good	2	-- Good	3	-- Fair	4	-- Poor	5	-- Very poor
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Descriptive Code: 1 2 3 4 5 6 7 abbreviated as underlined below.

1 = Flower color: Purple, White

2 = Pubescence color: Tawny, Gray, Light tawny

3 = Pod color: Brown, Tan, Black

4 = Seed coat luster: Dull, Shiny, Intermediate

5 = Seed coat color = Yellow, Gray, Light gray, Green, Black

6 = Hilum color: Black, Imperfect black, Brown, Buff, Gray, Yellow, Prefixes indicate:

Light or Dark shades, e.g. Lbf = light buff, Dib = dark imperfect black. H indicates heterogeneous for hilum color.

7 = Stem termination: Determinate, Indeterminate, Semi-Determinate.

Green Stem is a rating of delayed green stem at time of plant maturity (R8 = 95% of the pods have reached their mature pod color). The condition is rated according to the following scores.

1 = almost all plant stems yellowing or have ripened, as indicated by their mature stem color.

2 = 1 - 10% plants with green stems

3 = 11 - 25% plants with green stems

4 = 26 - 50% plants with green stems

5 = > - 50% plants with green stems

Shattering is scored at a specified time after maturity and is based on estimates of the percent of open pods as follows:

1 = No shattering

2 = 1 - 10% shattered

3 = 10 - 25% shattered

4 = 25 - 50% shattered

5 = > - 50% shattered

Iron Chlorosis is rated from 1, no chlorosis to 5, severe chlorosis at the University of Minnesota. Scores are the combined values from all disease nurseries, with 2 replications for each entry and 2 observation dates at a location.

Emergence score is related to hypocotyl elongation and is measured at Ames, Iowa by germination at 25 C (a critical temperature for differentiating strains). Four replications of 25 seeds/entry are planted in a 5-inch plastic pot at a 4.5-inch depth in sand. Seedlings that have emerged by 12 days after planting are counted and emergence score in relation to percent of seeds that germinate and emerge are as follows:

1 > 95%

2 = 91 - 95%

3 = 85 - 90%

4 = 76 - 84%

5 < 76%

## Methods

Oil and Protein. Oil and protein percentages were determined from representative locations of the uniform and preliminary tests. A 50-gram composite sample from all replications of a strain in trial was sent to the USDA-ARS, National Center for Agricultural Utilization Research, Bio-Oils Research Unit at Peoria, Illinois for analysis. One 20-gram sample of whole seed was analyzed for protein and oil composition by near infrared transmittance analysis (NIT) using an IM 9500 Grain Analyzer (Pertin Instruments AB, Sweden). Analysis of the seed was conducted on an 'as is' basis and then mathematically converted to a 13% moisture basis (13%) beginning in 2015. Prior to 2015 protein and oil percentages were reported on a dry weight basis (DWB). The conversion factor is 1.1494252 to convert from 13% to DW. The conversion factor is 0.87 to convert DW to 13%.

Amino Acids. Seed amino acid percentages were determined for strains expected to have modified amino acid percentages and normal checks from representative locations of the uniform and preliminary tests. A composite sample from all replications of a strain in a trial was sent to the University of Missouri Experiment Station Chemical Laboratories (ESCL) for analysis of crude protein and amino acids using the "Cysteine, Methionine, Lysine +9" analysis.

Fatty Acids. Fatty acid analysis of strains expected to have oleic acid levels over 75% and normal checks were determined from representative locations of the uniform and preliminary tests. Percent palmitic, stearic, oleic, linoleic and linolenic acid content in the oil were determined. A 30-gram composite seed sample of all replications of a strain in a trial was sent to Dr. Feng Lin, University of Missouri, Delta Center, Portageville, MO for analysis.

Destiny Hunt at University of Missouri – Delta Center conducted the fatty acid analysis using a five-seed sample placed in an envelope and manually crushed with a hammer. Crushed seeds were extracted in 5mL chloroform: hexane: methanol (8:5:2, v/v/v) overnight. Derivatization was done by transferring 100  $\mu$ L of extract to vial and adding 75  $\mu$ L of methylating reagent (0.25 M methanolic sodium methoxide: petroleum ether: ethyl ether, 1:5:2 v/v/v). Hexane was added to dilute samples to approximately 1 mL. An Agilent (Palo Alto, CA) series 7890 capillary gas chromatograph fitted with a flame ionization detector (275°C) was used with an AT-Silar capillary column (Alltech Associates, Deerfield, IL). Standard fatty acid mixtures (Animal and Vegetable Oil Reference Mixture 6, AOACS) were used as calibration reference standards.

Oligosaccharides (Sugars). Seed sugar percentages were determined for strains known to have a modified sugar profile and normal checks from representative locations of the uniform and preliminary tests. Composite seed samples of all replications of a strain in a trial were sent to Dr. Bo Zhang, Virginia Polytechnic Institute and State University for analysis. A 10-gram sample was used for High Performance Liquid Chromatography (HPLC).

Sugar is extracted from ground samples using a micro-sugar sample extraction protocol optimized for our HPLC instrument. In brief, 0.1 g of ground sample and 1 mL of HPLC-grade water were vortexed in a 2-mL centrifuge tubes and samples were put on a rocker shaker for 15 min. at 400 strokes per min. Following extraction, samples were centrifuged for 15 min. at 13.2 rpm, and 0.5 mL of resulting supernatant was transferred to a separate 2.0 mL centrifuge tube containing 0.7 mL HPLC-grade acetonitrile (ACN) bringing samples to 1.2 mL total volume and 58% ACN. The tubes were inverted several times and left to sit at room temperature for 1 hr. Samples were then centrifuged at 12.3 rpm for 15 min., and 100  $\mu$ L of resulting supernatant was then mixed with 900  $\mu$ L of 65% ACN and filtered into 2 mL HPLC vials for analysis using 0.2  $\mu$ m membranes. The moisture content of ground samples was determined by oven dry method using a representative sample of the calibration set.

The HPLC instrumentation for the analysis includes an Agilent 1260 Infinity series (Agilent Technologies, Santa Clara, CA) equipped with an apHera™ NH<sub>2</sub> Polymer, 5  $\mu$ m analytical column and a 1260 Infinity ELSD detector (Agilent Technologies, Santa Clara, CA). The elution solvent was acetonitrile:water (65:35, v/v) with a flow rate of 1.0 mL/min. Final concentrations for sucrose, raffinose, and stachyose were reported in percent g per 100g seed on a dry weight basis.

## Disease Methods

Disease reactions are listed according to “Soybean Disease Survey Standards”, March 1960, unless otherwise specified. Disease reaction is scored from 1 (no disease) to 5 (very severe), or in some cases as percent infected or simply as + (present) or 0 (absent). Purple seed stain and seed mottling follow the disease severity class rating:

Disease severity class rating:	1	2	3	4	5
Percent of diseased seed in sample:	0%	1-3%	4-8%	9-19%	20-100%

An additional classification to describe the extent of seed coat mottling as M (mild), E (extensive), or S (severe), is included. Pod and stem blight is rated as percent of infected seed on a four-week delayed (“d”) harvest sample. The location where the test was made is identified in the column heading, and the letter “a” or “n” signifies artificial or natural infection. Clear-cut and consistent reactions are given by letter instead of number: R = resistant, S = susceptible, I = intermediate, and H = heterogeneous. Natural infection ratings are from agronomic tests in some instances and from special disease plantings in others. Absence of symptoms under natural infection does not necessarily mean high resistance.

Abbreviation	Disease	Pathogen
BB	Bacterial blight	<u><i>Pseudomonas syringa</i> pv. <i>glycinea</i></u>
BBV	Bud blight	Tobacco ringspot virus
BP	Bacterial pustule	<u><i>Xanthomonas campestris</i> pv. <i>phaseoli</i></u>
BS	Brown spot	<u><i>Septoria glycines</i></u>
BSR	Brown stem rot	<u><i>Phialophora gregata</i></u>
BTS	Bacterial tan spot	<u><i>Corynebacterium flaccumfaciens</i></u>
CN	Cyst nematode	<u><i>Heterodera glycines</i></u>
CR	Charcoal rot	<u><i>Macrophomina phaseolina</i></u>
DM	Downy mildew	<u><i>Peronospora manshurica</i></u>
FE	Frogeye leafspot	<u><i>Cercospora sojina</i></u>
NSC	Northern Stem canker	<u><i>Diaporthe phaseolorum</i> var. <i>caulivora</i></u>
PM	Powdery mildew	<u><i>Microsphaera diffusa</i></u>
PR	Phytophthora rot	<u><i>Phytophthora sojae</i></u>
PS	Purple stain	<u><i>Cercospora kikuchii</i></u>
P&SB	Pod & stem blight	<u><i>Phomopsis</i> spp.</u>
Pyd	Pythium root rot	<u><i>Pythium debaryanum</i></u>
Pyu	Pythium root rot	<u><i>Pythium ultimum</i></u>
RK	Root knot nematode	<u><i>Meloidogyne</i> spp.</u>
RP	Rhizoctonia root rot	<u><i>Rhizoctonia solani</i></u>
SB	Sclerotial blight	<u><i>Sclerotium rolfsii</i></u>
SCL	Sclerotinia stem rot	<u><i>Sclerotinia sclerotiorum</i></u>
SDS	Sudden death syndrome	<u><i>Fusarium virguliforme</i>, (<i>F. solani</i> f.sp.</u>
SMV	Soybean mosaic virus	Soybean mosaic virus
TS	Target spot	<u><i>Corynespora cassiicola</i></u>
YMV	Yellow mosaic virus	Yellow mosaic virus

## Disease Methods

Rating for BB, BP, DM, FE, and PM are based on leaf symptoms; those for BSR on percent of plants with stem browning, or percent of stem length browned.

Phytophthora Screening. A hypocotyl inoculation technique was used to screen each soybean entry against a Race 1 *Phytophthora sojae* isolate. Additionally, those entries with expected or suspected *Rps* gene resistance were screened against Race 3, 4, 7, 17, and 25 *P. sojae* isolates. Fourteen soybean differential lines carrying one of 14 *Rps* genes (1a, 1b, 1c, 1d, 1k, 2, 3a, 3b, 3c, 4, 5, 6, 7, 8) and the susceptible line Williams were included in each experiment as controls. All screening was performed at the USDA-ARS West Lafayette, IN location.

Inoculum was prepared by transferring plugs of active-growing *P. sojae* isolate mycelium from a lima bean agar (LBA) plate (150 g steamed lima beans, 20 g agar per liter) to half strength lima bean agar (1/2 LBA) plates (50 g steamed lima beans, 12 g agar per liter) and incubated for 10-21 days in a dark 25°C incubator. Ten to twelve seeds of each soybean line were planted in vermiculite in the greenhouse until germination, and then moved to an indoor light rack and maintained at 24-27°C.

Inoculum was macerated into a slurry by forcing the mycelium-covered agar through a 30 ml syringe without a needle into a second 10 ml syringe fitted with an 18 or 21 gauge needle. Using the needle, a slit was made in the stem of each seedling about 1 cm below the cotyledons and 0.2-0.4 ml of inoculum slurry was ejected into the slit. Trays were covered with humidity domes for 24 hours out of the light, to prevent drying of the inoculum, then uncovered and moved back under the lights.

After 7 days, dead and dying plants were counted and the percentage dead was calculated. Dead and dying were defined as a plant that had a spreading dark lesion originating from the inoculation site, as well as wilting.

Soybean Cyst Nematode (SCN) Screening. Soybean cyst nematode resistance bioassays were conducted in a greenhouse at the University of Missouri. Seeds for each test line along with susceptible controls and indicator lines were germinated in a 27°C incubator. Seedlings were transplanted into pots (100 cm<sup>3</sup>) of steam pasteurized sandy loam soil and inoculated with 1,000 eggs. Each soybean line had five replicates and were organized in a randomized complete block design. Experiments were conducted in temperature-controlled water tanks to maintain 27°C soil temperature.

Twenty-eight days after inoculation each root was soaked in water and the females were collected by rinsing the root with high pressure water. The females from each sample were counted using a stereo microscope and the mean number from each line was obtained. Female index (FI) values were determined by dividing the mean number of females from the test line by the mean number of females from the susceptible control and multiplying by 100. Coefficient of variation (CV) was calculated for lines with FI 25 or greater.

Lines were rated according to the Illinois resistance scale as: highly resistant (FI < 10), resistant (FI = 10-24), moderately resistant (FI = 25-39), low resistance (FI = 40-59), or no effective resistance (FI ≥ 60). Ratings were not determined if CV values were greater than 35, if there were fewer than 3 data points from a test line, or if resistant and susceptible individuals were present within a line yet fell below the FI or CV thresholds.

## Procedure for Testing and Release of Strains

Public soybean breeders have agreed upon this policy on testing and release of soybean strains evaluated in the Uniform Soybean Tests Northern Region. The policy was developed to assist breeders in preparing schedules for seed increases and to assist individuals and committees responsible for approving releases. The policy will aid private breeders in the U.S. and foreign countries to understand how releases will be made that may affect their programs.

Many public institutions carry out development and release of soybean strains. The programs at these institutions operate independently until strains are available for advanced testing in the Uniform Soybean Tests. The USDA-Agricultural Research Service coordinates the Uniform Soybean Tests. The tests are divided into those in the Northern Region, for strains in maturity groups 00 to IV, and those in the Southern States, for strains in maturity groups IVS to VIII. Group IV maturity strains are divided into an IVN test for the northern region and an IVS test for the southern region. Public soybean breeders are encouraged to enter superior strains they develop into the Uniform Soybean Tests.

Strains are evaluated for one year in the Preliminary Tests (PT), which are conducted at eight or more locations in several states. When the tests are completed, each public breeder is given the opportunity to review the results and to decide which strains merit further testing. In instances where there is little consensus among the breeders on the merits of a strain, the originator of the strain generally makes the final decision.

Strains that merit further testing are evaluated in the Uniform Tests (UT) conducted at more locations than Preliminary Tests and with two or three replications. Lines developed by four or more backcrosses to a released cultivar may be entered directly into the UT without prior evaluation in PT. Strains evaluated in Regional Cyst Nematode (SCN) tests may also be entered directly into the UT.

Strains may be considered for release after they have been evaluated for two years in the UT. Exceptions to this are special purpose strains or strains derived from four or more backcrosses to a released cultivar; these may be considered for release after one year in the UT. Any institution or breeder participating in the Uniform Soybean Tests may request consideration for release of any strains in the UT, however the institution that developed the strain usually initiates it.

A strain should be released only if it is distinctly superior to existing varieties in one or more characteristics important for the crop, or it is superior in overall performance in areas where adapted. A single major production hazard, which a new cultivar can overcome, e.g., a highly destructive disease, may be the overriding consideration in releasing a variety. Strains with a very limited range in adaptation should not be released unless performance in that limited range is outstandingly superior, or the strain possesses important use values not otherwise available, including diversification of the germplasm base for the species.

When a decision has been made to multiply a strain for release, the originating institution will inform other UT participants of the decision by February 15. This will give each UT participant the opportunity to participate in the multiplication and release of the strains.

By March 15 all institutions intending to participate in the multiplication of the strain must notify the originating institution of their intent. A final decision to participate in the release of the strain may be delayed until an additional year's data are available for review. By April 1 the originating institution should notify all UT participants what states will be participating in the multiplication and are considering participating in the release of the strain. Breeder's seed is distributed to foundation seed organizations in participating states for production during the summer. Now, if a final decision to release has been made, a sample of seed may be distributed to non-participants in the UT, including private soybean breeders, in accordance with a State's Experiment Station policy. This distribution is made only by the originating institution.

## Procedure for Testing and Release of Strains

The originating institutions prepare a release notice to soybean seed producers listing all institutions participating in the release of the cultivar. This notice is circulated for signature by all participating institutions. Assistance in the preparation and circulation of this release notice may be obtained by Dr. Kay Simmons, Deputy Administrator for Crop Production and Protection, Office of National Programs, USDA, ARS, 5601 Sunnyside Avenue, Beltsville, MD 20705, phone 301-504-6252. The office for clearance of proposed names of new soybean cultivars is: Dr. Richard Payne, Chief, Seed Regulatory & Testing Branch, Crossing Place, Suite C, Gastonia, North Carolina 28054-2193, phone 704-810-8870, Fax: 704-852-4189 (Lab). The date for simultaneous publicity release on new soybean cultivars by participating states is determined by the originating state and is usually in August but may be delayed until the following April if additional UT data are being reviewed and a final decision to release has not been made.

If an additional year of UT data is being reviewed prior to a final decision on release, states producing foundation seed must notify the originating state by February 15 of their intent to participate in the release of the cultivar. The release notice to soybean seed producers should be distributed for signature by the participating institutions by April 1.

Foundation seed under the name of the new cultivar is distributed to qualified-certified seed producers in states releasing the new cultivar by April 1. At this time, a sample of seed may be distributed to non-participants in the UT, including private plant breeders, for testing and crossing if this distribution has not been made previously.

### Disease, Shattering, and Descriptive Data, 2024

State/ Province	Location	Tests Conducted By:	Tests	UT	PT	UTTM
IN	West Lafayette	G. Cai / T. Fleury	PR Evaluations	00-IV	II-IV	0-IV
IN	West Lafayette	G. Cai / A. Brock	Descriptive Data	00-IV	II-IV	0-IV
MN	Crookston & Climax	A. Lorenz	Fe Chlorosis (IDC)	00-I		00-I
MO	Columbia	A. Scaboo / C. Meinhardt	SCN	0-IV		0-IV
QUE	St. Mathieu de Beloeil	Louise O'Donoghue	Shattering & Green Stem	00-0		

## Uniform Test Strains Released or Licensed, 2024

Variety	Experimental Designation	Uniform Test Evaluations		Licensed Trait(s)
<b><i>IA 2024 - Iowa State University (Licensing Entity - ISU Research Foundataion)</i></b>				
IAS25HPHS1	A14019-28	2020 PT II TM	2021 - 2023 UT II TM	
IAS27C1	A15131-10	2021 PT II A	2022 - 2023 UT II	
IAS27HPHO1	A14056-75	2020 PT II TM	2021 - 2023 UT II TM	
<b><i>IL 2024 - University of Illinois (Licensing Entity - Baird Seed Company)</i></b>				
Illini 1832Na	LD18-4787F	2024 UT I		SCN, BSR, Rag2
Illini 2360N	LD20-0815	2023 PT II	2024 UT II	SCN, Rps1k, BSR
Illini 2427N	LD20-5172	2023 PT II	2024 UT II	SCN, Rps1k, BSR
Illini 2517N	LD20-11062	2023 PT II	2024 UT II	SCN, Rps1c, BSR
Illini 2856Np	LD20-4471	2024 UT II		SCN Rhg-1a, Rhg4
Illini 3168Np	LD20-5413	2024 UT III		SCN Rhg-1a, Rhg-4, Rps1c, BSR
Illini 3258N	LD20-1683	2023 PT III	2024 UT III	SCN, BSR
Illini 3488N	LD20-5433	2023 PT III	2024 UT III	SCN, Rps1k, BSR
Illini 3777N	LD20-11622	2022 PT IV	2023 - 2024 UT IV	SCN, BSR
Illini 3993Np	LD20-11748	2024 UT IV		H-Rhg-1b, H-Rhg-1a, Rhg-4, Rps1a
<b><i>MI 2024 - Michigan State University (Licensing Entity - Confidential Seed Company)</i></b>				
E15351	E15351	2017 PT II A	2018 - 2020 UT II	yield
E19314T	E19314T	2021 PT I	2022 UT II 2023 UT I	yield, protein
<b><i>MN 2024 - University of Minnesota (Licensing Entity - Not Provided)</i></b>				
M13-106022	M13-106022	2019 PT I	2020 - 2021 UT I	Yield, SCN Res
M13-262053	M13-262053	2022 UT I		Yield, aphid resistance
M14-151094	M14-151094	2020 PT I	2021 - 2023 UT I	Yield, SCN, aphid resistance
M14-152074	M14-152074	2020 PT I	2021 - 2023 UT I	Yield, SCN, aphid resistance
M15-105140	M15-105140	2022 UT 00	2023 - 2024 UT 0	Rag1+Rag2, aphid resistance
M16-110086	M16-110086	2022 - 2024 UT 00		Yield, early, Phyto
M16-456119	M16-456119	2022 - 2023 UT I		Yield and SCN Res.
M17-298045	M17-298045	2023 UT 0		Yield
MCH17-317025	MCH17-317025	2023 UT 00	2024 UT 0	Early and Aphid R.
MN1905CN	M14-122035	2024 UT I		Yield, SCN Res, Protein
<b><i>MO 2024 - University of Missouri (Licensing Entity - Not Provided)</i></b>				
SA18-12086	SA18-12086	2022 PT IV	2023 - 2024 UT IV	Conventional
SA19-10016	SA19-10016	2022 PT III A	2023 - 2024 UT III	Conventional
SA19-10772	SA19-10772	2022 PT IV	2023 - 2024 UT IV	Conventional
<b><i>SAS 2024 - University of Saskatchewan (Licensing Entity - SeCan)</i></b>				
CDC Cedar	X6110-10	2024 UT 00		

## Uniform Test Strains Released or Licensed, 2024

Variety	Experimental Designation	Uniform Test Evaluations		Licensed Trait(s)
<i>NE 2024 - University of Nebraska - Lincoln (Licensing Entity - Confidential Seed Company)</i>				
U18-247185	U18-247185	2021 PT II B	2022 UT III	
U19-204054	U19-204054	2023 PT II B	2024 UT II	
U19-208068	U19-208068	2023 PT II B		
U19-230043	U19-230043	2023 PT II B	2024 UT II	
U19-244132	U19-244132	2023 PT III A	2024 UT III	
U19-274107	U19-274107	2023 PT III A	2024 UT III	
U19-274119	U19-274119	2023 PT III A	2024 UT III	
U19-604203	U19-604203	2024 UT III		
U19-615127	U19-615127	2022 - 2023 UT III		
U19-923091	U19-923091	2022 - 2023 UT II		
U20-304290	U20-304290	2024 PT III A		
U20-306316	U20-306316	2024 PT III A		
U20-602081	U20-602081	2023 PT II B		
U20-613095	U20-613095	2023 PT III A		
U20-908101	U20-908101	2022 PT II B	2023 - 2024 UT II	
U20-910082	U20-910082	2022 PT II B	2023 - 2024 UT II	
U20-917147	U20-917147	2023 PT II B	2024 UT II	
U20-928077	U20-928077	2023 PT II B	2024 UT II	
U21-920106	U21-920106	2024 PT III A		

### Additional previously tested MN lines released/licensed for breeding purposes in 2024:

M13-250046 (MN1614CN-P)	SCN UT (2019 - 2022)	Yield, Peking SCN Resistance
M13-250056 (MN0812CN-P)	SCN UT (2019 - 2022)	Yield, Peking SCN Resistance
M13-250056 (MN0812CN-P)	SCN UT (2019 - 2022)	Yield, Peking SCN Resistance
M13-250056 (MN0812CN-P)	SCN UT (2019 - 2022)	Yield, Peking SCN Resistance
M13-250056 (MN0812CN-P)	SCN UT (2019 - 2022)	Yield, Peking SCN Resistance
M13-251003	SCN UT (2019 - 2022)	Yield, SCN Res, Protein
M14-122031	SCN UT (2020 - 2023)	Yield and SCN Res.
M16-214187	SCN UT (2022 - 2024)	Yield and SCN Res.

### Additional previously tested NE lines released/licensed to seed companies in 2024:

U18-613247	U19-238031	U20-118362
U19-054037	U19-607156	U20-122362
U19-074079	U19-613113	U20-923006
U19-220012	U19-618131	U21-933088

**2024 Uniform Trial SCN Screening (HG Type 7, All SCN Entries)**

Female Index (FI) = (mean number of females on test cultivar) ÷ (mean number of females on control) x 100

**Rating scale**

- FI < 10 = Highly Resistant; HR
- FI 10 to 24 = Resistant; R
- FI 25 to 39 = Moderately Resistant; MR
- FI 40 to 59 = Low Resistance; LR
- FI > 60 = No Resistance; NR
- FI > 25, CV = Not Determined; \*\*

(\*)=small root, (.)=missing sample, (\*\*)=rep data too variable to rate

inoc rate = 1000 eggs	HG Type 7						mean	FI
	rep1	rep2	rep3	rep4	rep5			
Williams 82						199		
Lee 74	223	218	202	209	194	209		
PI 548402	5	7	3	4	4	5	2	
PI 88788	21	15	16	11	19	16	8	
PI 90763	3	1	0	0	0	0	0	
PI 437654	0	0	0	0	0	0	0	
PI 209332	17	15	22	19	20	19	9	
PI 89772	1	0	0	3	0	1	0	
PI 548316	42	71	58	55	63	58	<b>28</b>	
Pickett	9	7	7	10	14	9	4	

Test	Entry	Strain	SCN Source	HG Type 7							FI	rating
				rep1	rep2	rep3	rep4	rep5	mean	cv		
UT 0	3	MN0507CN (SCN)	Rhg1-b	38	21	49	21	9	28		14	R
UT 0	4	MN1511CN (SCN)	Rhg1-b, H-Rhg4	24	9	19	17	6	15		8	HR
UT 0	6	M17-191003	Rhg1-b	17	20	15	17	23	18		9	HR
UT 0	10	MCH17-317025	H-Rhg1-b	24	25	13	59	54	35		18	R
UT 0	11	MCH17-317065	Rhg1-b	46	57	53	48	55	52	9	26	MR
UT 0	13	ND20-14884	Rhg1-b	10	11	7*	17	12	13		6	HR
UT I	3	MN1905CN (SCN)	Rhg1-b	14	17	20	7	20	16		8	HR
UT I	4	E15338 (SCN)	Rhg1-b	19	29	11	20	15	19		9	HR
UT I	12	E21100	Rhg1-b	14	27	27	20	22	22		11	R
UT I	27	ORC 5822	Rhg1-b	59	25	31	39	24	36		18	R
UT II	1	IA2102 (II)	Rhg1-b	30	25	12	19	30	23		12	R
UT II	2	LD17-2558 (SCN)	Rhg1-b	3	11	6	7	1	6		3	HR
UT II	4	U14-910097 (SCN)	Rhg1-a, Rhg4	4	4	6	2	5	4		2	HR
UT II	8	A17112-19	Rhg1-a, Rhg4	10	12	11	20	19	14		7	HR
UT II	9	A17112-34	Rhg1-a, Rhg4	10	10	9	7	17	11		5	HR
UT II	10	A17112-72	Rhg1-a, Rhg4	7	0*	5	8	4	6		3	HR
UT II	11	A17112-202	Rhg1-a, Rhg4	13	17	6	12	10	12		6	HR
UT II	15	CR190377	H-Rhg1-b	125	102	14	125	20	77	72	39	**
UT II	16	CR193835	Rhg1a, Rhg4	6	4	11	14	9	9		4	HR
UT II	18	CR20-5419	Rhg1-b	10	12	15	14	11	12		6	HR
UT II	22	E21107	Rhg1-b, Rhg4	4	13	18	6	15	11		6	HR
UT II	23	E21109	Rhg1-b	4	18	18	12	19	14		7	HR
UT II	24	E21118	Rhg1-b	9	14	20	14	18	15		8	HR
UT II	30	LD20-0815	Rhg1-b	43	21	12	24	13	23		11	R
UT II	31	LD20-11062	Rhg1-b	11	18	18	14	24	17		9	HR
UT II	32	LD20-4471	Rhg1-a, Rhg4	67	23	37	32	26	37		19	R
UT II	34	LD20-5172	Rhg1-b	6	11	20	11	16	13		6	HR
UT II	35	U19-204054										
UT III	1	LD11-2170 (SCN)	Rhg1-b, H-Rhg4	26	24	23	24	23	24		12	R
UT III	2	LD18-6596 (SCN)	Rhg1-b	19	39	20	17	33	26		13	R
UT III	3	LD07-3395bf (SCN)	Rhg1-a, Rhg4	9	21	6	12	5	11		5	HR
UT III	5	A17102-209	Rhg1-a, Rhg4	4	7	6	7	7	6		3	HR
UT III	6	A17111-146	Rhg1-b	12	13	22	13	9*	15		8	HR
UT III	7	A17112-133	Rhg1-a, Rhg4	7	6	9	2	1	5		3	HR

**2024 Uniform Trial SCN Screening (HG Type 7, All SCN Entries)**

Test	Entry	Strain	SCN Source	HG Type 7							FI	rating
				rep1	rep2	rep3	rep4	rep5	mean	cv		
UT III	8	A17112-226	Rhgl-a, Rhg4	6	6	5	4	5	5		<b>3</b>	<b>HR</b>
UT III	15	CR20-5111	Rhgl-b	19	10	10	90	21	30	113	<b>15</b>	<b>**</b>
UT III	16	CR20-5340	Rhgl-b	15	14	17	35	13	19		<b>9</b>	<b>HR</b>
UT III	17	CR20-5633	Rhgl-b	21	23	15	16	15	18		<b>9</b>	<b>HR</b>
UT III	18	CR20-5933	Rhgl-b	17	11	18	21	15	16		<b>8</b>	<b>HR</b>
UT III	19	LD20-0902	Rhgl-b	20	12	19	16	21	18		<b>9</b>	<b>HR</b>
UT III	21	LD20-11665	Rhgl-b	12	19	20	20	18	18		<b>9</b>	<b>HR</b>
UT III	22	LD20-1683	Rhgl-b	35	18	19	24	30	25		<b>13</b>	<b>R</b>
UT III	23	LD20-1791	Rhgl-b	15	15	12	17	25	17		<b>8</b>	<b>HR</b>
UT III	24	LD20-5413	Rhgl-a, Rhg4	12	14	17	23	18	17		<b>8</b>	<b>HR</b>
UT III	25	LD20-5433	Rhgl-b	30	31	15	20	37	27		<b>13</b>	<b>R</b>
UT III	27	LG19-5656	Rhgl-b	3	6	10	15	11	9		<b>5</b>	<b>HR</b>
UT III	29	SA19-10545	Rhgl-b	18	29	24	18	17	21		<b>11</b>	<b>R</b>
UT III	31	SA21-4164	Rhgl-b	15	4	20	11	12	12		<b>6</b>	<b>HR</b>
UT III	34	U19-274107	Rhgl-a, Rhg4	21	17	15	7	15	15		<b>8</b>	<b>HR</b>
UT III	35	U19-274119		70	83	80	74	114	84	21	<b>42</b>	<b>LR</b>
UT III	37	U19-604203	Rhgl-a, Rhg4	4	2	7	6	5	5		<b>2</b>	<b>HR</b>
UT IV	1	LD15-3818 (SCN)	Rhgl-b	26	17	14	15	18	18		<b>9</b>	<b>HR</b>
UT IV	2	LD00-2817P (SCN)	Rhgl-a, Rhg4	11	3	6	6	5	6		<b>3</b>	<b>HR</b>
UT IV	4	K18-1994	Rhgl-b	12	19	17	29	31	22		<b>11</b>	<b>R</b>
UT IV	9	CR20-4991	Rhgl-b	12	17	19	40	33	24		<b>12</b>	<b>R</b>
UT IV	10	CR20-5030	Rhgl-b	19	7	6	10	21	13		<b>6</b>	<b>HR</b>
UT IV	11	CR20-5469	Rhgl-b	14	8	10	38	7	15		<b>8</b>	<b>HR</b>
UT IV	12	CR20-5470	Rhgl-b	24	29	23	40	26	28		<b>14</b>	<b>R</b>
UT IV	18	LD20-1723	Rhgl-b	9	13	24	13	19	16		<b>8</b>	<b>HR</b>
UT IV	19	LD20-3559	Rhgl-b	19	17	19	18	16	18		<b>9</b>	<b>HR</b>
UT IV	20	LD20-6649	Rhgl-b	12	9	8	7	4	8		<b>4</b>	<b>HR</b>
UT IV	24	SA19-10687	Rhgl-b	60	44	57	49	60	54	13	<b>27</b>	<b>MR</b>
UT IV	25	SA19-10772	H-Rhgl-b	31	27	35	47	26	33		<b>17</b>	<b>R</b>
UT IV	27	SA19-5082	Rhgl-b	23	16	17	18	14	18		<b>9</b>	<b>HR</b>
UT IV	29	SA19-7754	Rhgl-b	24	17	18	20	14	19		<b>9</b>	<b>HR</b>
UT IV	30	SA20-2212	Rhgl-b	20	19	26	18	18	20		<b>10</b>	<b>R</b>
UT IV	31	SA20-2256	Rhgl-b	12	9	15	10	8	11		<b>5</b>	<b>HR</b>
UT IV	32	SA21-3590	Rhgl-b	11	20	21	19	11	16		<b>8</b>	<b>HR</b>
UT 0 TM	5	M05-363022HO-25	Rhgl-b	15	10	20	8	19	14		<b>7</b>	<b>HR</b>
UT 0 TM	7	M07-292111HOLL-3	Rhgl-b	12	12	12	8	11	11		<b>6</b>	<b>HR</b>
UT 0 TM	9	M17R-908-1094		118	25	16	116	139	83	70	<b>42</b>	<b>**</b>
UT 0 TM	20	ND20-17783(GT)	H-Rhgl-b	35	23*	105	47	26	53	67	<b>27</b>	<b>**</b>
UT I TM	8	M08-354011HOLL-35	Rhgl-b	76	13	5	9	8	22	136	<b>11</b>	<b>**</b>
UT I TM	9	M08-362051HOLL-4	H-Rhgl-b	5	10	6	3	5	6		<b>3</b>	<b>HR</b>
UT I TM	10	M08-362051HOLL-5	Rhgl-b	7	5	22	4	2*	10		<b>5</b>	<b>HR</b>
UT I TM	11	M08-362051HOLL-7	Rhgl-b	4	8	6	7	4	6		<b>3</b>	<b>HR</b>
UT I TM	12	M17-124036	H-Rhgl-b	52	36	55	39	50	46		<b>23</b>	<b>R</b>
UT II TM	13	E21062T	Rhgl-b	25	23	20	14	17	20		<b>10</b>	<b>HR</b>
UT II TM	24	LD20-12206	Rhgl-b	29	20	27	16	14	21		<b>11</b>	<b>R</b>
UT II TM	25	LD21-100211	Rhgl-b	19	11	26	28	25	22		<b>11</b>	<b>R</b>

**2024 Uniform Trial SCN Screening (HG Type 7, All SCN Entries)**

Test	Entry	Strain	SCN Source	HG Type 7							FI	rating
				rep1	rep2	rep3	rep4	rep5	mean	cv		
UT III TM	6	LD19-22127	Rhg1-b	5	15	6	6	7	8		<b>4</b>	<b>HR</b>
UT III TM	11	LD21-100207	Rhg1-b	19	19	36	25	11	22		<b>11</b>	<b>R</b>
UT III TM	20	SA19-23535	Rhg1-b	27	24	21	15	34	24		<b>12</b>	<b>R</b>
UT III TM	21	SA21-11508	Rhg1-b	17	12	10	16	21	15		<b>8</b>	<b>HR</b>
UT III TM	22	U15-606207 (SCN)	Rhg1-a, Rhg4	3	4	5	6	2	4		<b>2</b>	<b>HR</b>
UT IV TM	7	LD20-3780	Rhg1-b	19	20	18	24	20	20		<b>10</b>	<b>R</b>
UT IV TM	13	SA21-10247	Rhg1-b	17	30	23	31	23	25		<b>12</b>	<b>R</b>

**2024 Uniform Trial SCN Screening (HG Type 2.5.7, Entries with Sources other than PI88788)**

Female Index (FI) = (mean number of females on test cultivar) ÷ (mean number of females on control) x 100

**Rating scale**

- FI < 10 = Highly Resistant; HR
- FI 10 to 24 = Resistant; R
- FI 25 to 39 = Moderately Resistant; MR
- FI 40 to 59 = Low Resistance; LR
- FI > 60 = No Resistance; NR
- FI > 25, CV = Not Determined; \*\*

(\*)=small root, (.)=missing sample, (\*\*)=rep data too variable to rate

inoc rate = 1000 eggs	HG Type 2.5.7						FI
	rep1	rep2	rep3	rep4	rep5	mean	
Williams 82						190	
Lee 74	197	215	185	203	217	203	
PI 548402	4	2	5	4	3	4	2
PI 88788	125	150	146	110	128	132	<b>65</b>
PI 90763	0	0	0	0	0	0	0
PI 437654	0	0	0	0	0	0	0
PI 209332	159	164	177	193	170	173	<b>85</b>
PI 89772	0	0	0	0	0	0	0
PI 548316	113	109	129	115	100	113	<b>56</b>
Pickett	13	6	12	16	9	11	6

Test	Entry	Strain	SCN Source	HG Type 2.5.7							FI	rating
				rep1	rep2	rep3	rep4	rep5	mean	cv		
UT II	4	U14-910097 (SCN)	Rhg1-a, Rhg4	1	0	2	1	4	2		<b>1</b>	<b>HR</b>
UT II	8	A17112-19	Rhg1-a, Rhg4	26	19	8	3	25	16		<b>9</b>	<b>HR</b>
UT II	9	A17112-34	Rhg1-a, Rhg4	29	31	39	20	50	34		<b>18</b>	<b>R</b>
UT II	10	A17112-72	Rhg1-a, Rhg4	3	5	2	2	1	3		<b>1</b>	<b>HR</b>
UT II	11	A17112-202	Rhg1-a, Rhg4	46	45	26	31	34	36		<b>19</b>	<b>R</b>
UT II	16	CR193835	Rhg1a, Rhg4	3	0	1	3	5	2		<b>1</b>	<b>HR</b>
UT II	32	LD20-4471	Rhg1-a, Rhg4	14	107	109	106	119	91	48	<b>48</b>	<b>**</b>
UT II	35	U19-204054		152	143	150	119	112	135	14	<b>71</b>	<b>NR</b>
UT III	3	LD07-3395bf (SCN)	Rhg1-a, Rhg4	22	6	20	14	1	13		<b>7</b>	<b>HR</b>
UT III	5	A17102-209	Rhg1-a, Rhg4	14	17	26	22	17	19		<b>10</b>	<b>R</b>
UT III	7	A17112-133	Rhg1-a, Rhg4	1	2	6	4	5	4		<b>2</b>	<b>HR</b>
UT III	8	A17112-226	Rhg1-a, Rhg4	0	3	1	0	2	1		<b>1</b>	<b>HR</b>
UT III	24	LD20-5413	Rhg1-a, Rhg4	34	41	30	34	29	34		<b>18</b>	<b>R</b>
UT III	34	U19-274107	Rhg1-a, Rhg4	122	84	131	91	103	106	19	<b>56</b>	<b>LR</b>
UT III	35	U19-274119		153	146	154	95	123	134	19	<b>71</b>	<b>NR</b>
UT III	37	U19-604203	Rhg1-a, Rhg4	1	0	1	0	1	1		<b>0</b>	<b>HR</b>
UT IV	2	LD00-2817P (SCN)	Rhg1-a, Rhg4	2	1	1	2	2	2		<b>1</b>	<b>HR</b>
UT III TM	22	U15-606207 (SCN)	Rhg1-a, Rhg4	4	1	1	3	14	5		<b>2</b>	<b>HR</b>

**2024 Uniform Trial SCN Screening (HG Type 1.2.5.7, Entries with Sources other than PI88788)**

Female Index (FI) = (mean number of females on test cultivar) ÷ (mean number of females on control) x 100

**Rating scale**

- FI < 10 = Highly Resistant; HR
- FI 10 to 24 = Resistant; R
- FI 25 to 39 = Moderately Resistant; MR
- FI 40 to 59 = Low Resistance; LR
- FI > 60 = No Resistance; NR
- FI > 25, CV = Not Determined; \*\*

(\*)=small root, (.)=missing sample, (\*\*)=rep data too variable to rate

inoc rate = 1000 eggs	HG Type 1.2.5.7						mean	FI
	rep1	rep2	rep3	rep4	rep5			
Williams 82						216		
Lee 74	249	219	215	223	205	222		
PI 548402	50	52	36	43	39	44	<b>20</b>	
PI 88788	140	147	158	164	137	149	<b>67</b>	
PI 90763	0	0	0	0	0	0	0	
PI 437654	0	0	0	0	0	0	0	
PI 209332	161	148	171	166	170	163	<b>73</b>	
PI 89772	0	0	0	0	0	0	0	
PI 548316	152	119	156	123	127	135	<b>61</b>	
Pickett	146	119	126	115	148	131	59	

Test	Entry	Strain	SCN Source	HG Type 1.2.5.7							FI	rating
				rep1	rep2	rep3	rep4	rep5	mean	cv		
UT II	4	U14-910097 (SCN)	Rhg1-a, Rhg4	64	63	42	49	41	52		<b>24</b>	<b>R</b>
UT II	8	A17112-19	Rhg1-a, Rhg4	139	135	149	136	172	146	11	<b>68</b>	<b>NR</b>
UT II	9	A17112-34	Rhg1-a, Rhg4	135	171	155	133	147	148	11	<b>68</b>	<b>NR</b>
UT II	10	A17112-72	Rhg1-a, Rhg4	63	73	49	42	51	56	22	<b>26</b>	<b>MR</b>
UT II	11	A17112-202	Rhg1-a, Rhg4	109	154	113	109	117	120	16	<b>56</b>	<b>LR</b>
UT II	16	CR193835	Rhg1a, Rhg4	41	48	145	147	48	86	64	<b>40</b>	<b>**</b>
UT II	32	LD20-4471	Rhg1-a, Rhg4	80	91	66	63	168	94	46	<b>43</b>	<b>**</b>
UT II	35	U19-204054		184	206	174	209	192	193	8	<b>89</b>	<b>NR</b>
UT III	3	LD07-3395bf (SCN)	Rhg1-a, Rhg4	48	75	51	107	62	69	35	<b>32</b>	<b>MR</b>
UT III	5	A17102-209	Rhg1-a, Rhg4	123	103	134	109	104	115	12	<b>53</b>	<b>LR</b>
UT III	7	A17112-133	Rhg1-a, Rhg4	54	49	31	47	49	46		<b>21</b>	<b>R</b>
UT III	8	A17112-226	Rhg1-a, Rhg4	33	39	30	31	35	34		<b>16</b>	<b>R</b>
UT III	24	LD20-5413	Rhg1-a, Rhg4	133	94	96	120	78	104	21	<b>48</b>	<b>LR</b>
UT III	34	U19-274107	Rhg1-a, Rhg4	136	156	132	119	148	138	10	<b>64</b>	<b>NR</b>
UT III	35	U19-274119		104	118	156	137	127	128	15	<b>59</b>	<b>LR</b>
UT III	37	U19-604203	Rhg1-a, Rhg4	41	39	30	39	27	35		<b>16</b>	<b>R</b>
UT IV	2	LD00-2817P (SCN)	Rhg1-a, Rhg4	155	46	152	56	54	93	60	<b>43</b>	<b>**</b>
UT III TM	22	U15-606207 (SCN)	Rhg1-a, Rhg4	45	36	40	52	42	43		<b>20</b>	<b>R</b>

**2024 Phytophthora Screening Results - ISA 124 C-1 Race 1 (7)**

Entry	Strain	% Dead	# D/T	Test Group	Entry	Strain	% Dead	# D/T	Test Group
<b>UT 00</b>					14	M18-101011	8%	1/12	1
1	MN0083 (00)	0%	0/10	1	15	M18-120071	83%	10/12	1
2	MN0095 (0)	0%	0/11	1	16	M18-176012	92%	11/12	1
3	ND Rolette	0%	0/12	1	17	M18-222040	0%	0/9	1
4	M16-110086	0%	0/10	1	18	M18-222071	36%	4/11	1
5	M18-219013	92%	11/12	1	19	M18-243061	100%	12/12	1
6	ND21-16024	0%	0/10	1	20	OAC 22-33C-SCN	17%	2/12	1
7	ND21-16321	73%	8/11	1	21	OAC 22-34C-SCN	0%	0/10	1
8	ND21-16580	100%	12/12	1	22	ORC 3323	0%	0/12	1
9	X6110-10	60%	6/10	1	23	ORC 3523	0%	0/12	1
<b>UT 0</b>					24	ORC 4623	0%	0/12	1
1	ND Dickey (0)	0%	0/10	1	25	ORC 4723	40%	4/10	1
2	MN0095 (E)	0%	0/11	1	26	ORC 5023	0%	0/11	1
3	MN0507CN (SCN)	0%	0/10	1	27	ORC 5822	0%	0/6	1
4	MN1511CN (SCN) (L)	0%	0/10	1	<b>UT II</b>				
5	M15-105140	56%	5/9	1	1	IA2102 (II)	100%	11/11	2
6	M17-191003	100%	12/12	1	2	LD17-2558 (SCN)	75%	9/12	2
7	M17-215039	0%	0/9	1	3	MN1905CN (E)	100%	12/12	2
8	M18-109038	22%	2/9	1	4	U14-910097 (SCN) (L)	50%	4/8	2
9	M18-124018	100%	11/11	1	5	A16373-82	0%	0/12	2
10	MCH17-317025	60%	6/10	1	6	A16373-101	0%	0/12	2
11	MCH17-317065	0%	0/12	1	7	A17107-95	0%	0/10	2
12	ND20-12680	0%	0/11	1	8	A17112-19	100%	12/12	2
13	ND20-14884	0%	0/8	1	9	A17112-34	100%	12/12	2
14	ND21-15882	0%	0/11	1	10	A17112-72	100%	12/12	2
15	ND21-15897	0%	0/12	1	11	A17112-202	100%	11/11	2
16	ND21-16007	0%	0/11	1	12	A17437-29	0%	0/11	2
17	OAC 22-05C-SCN	91%	10/11	1	13	A17438-64	100%	11/11	2
<b>UTI</b>					14	CR184590	8%	1/12	2
1	MN1511CN (SCN) (I)	56%	5/9	1	15	CR190377	67%	8/12	2
2	ND Dickey (0) (E)	0%	0/10	1	16	CR193835	17%	2/12	2
3	MN1905CN (L)	100%	12/12	1	17	CR20-1893	92%	11/12	2
4	E15338	0%	0/11	1	18	CR20-5419	100%	12/12	2
5	A18103-8	100%	11/11	1	19	E20329	0%	0/12	2
6	A18112-101	91%	10/11	1	20	E20333	100%	11/11	2
7	A18273-17	100%	12/12	1	21	E20355	50%	6/12	2
8	A18321-3Y	82%	9/11	1	22	E21107	0%	0/12	2
9	A18325-2Y	0%	0/12	1	23	E21109	17%	2/12	2
10	A18372-90	8%	1/12	1	24	E21118	0%	0/12	2
11	E20078	0%	0/12	1	25	E21125	9%	1/11	2
12	E21100	82%	9/11	1	26	E21127	0%	0/12	2
13	LD18-4787F	100%	10/10	1	27	E21345	10%	1/10	2
					28	LD19-7145	0%	0/12	2

**2024 Phytophthora Screening Results - ISA 124 C-1 Race 1 (7)**

Entry	Strain	% Dead	# D/T	Test Group	Entry	Strain	% Dead	# D/T	Test Group
<b>UT II</b>					30	ORC 4123	0%	0/12	2
29	LD19-7165	100%	12/12	2	31	ORC 4323	25%	3/12	2
30	LD20-0815	0%	0/11	2	32	U20-134367	8%	1/12	2
31	LD20-11062	0%	0/12	2	33	U20-134372	58%	7/12	2
32	LD20-4471	100%	11/11	2	34	U20-135373	50%	6/12	2
33	LD20-4988	0%	0/10	2	35	U20-137350	100%	11/11	2
34	LD20-5172	8%	1/12	2	36	U20-137354	30%	3/10	2
35	U19-204054	27%	3/11	2	37	U20-226190	42%	5/12	2
36	U19-230043	10%	1/10	2	38	U20-232079	100%	12/12	2
37	U20-908101	25%	3/12	2	39	U21-912098	45%	5/11	2
38	U20-910082	33%	4/12	2	40	U21-915158	33%	3/9	2
39	U20-917147	36%	4/11	2					
40	U20-928077	100%	12/12	2	<b>UT III</b>				
<b>PT II</b>					1	LD11-2170 (III)	0%	0/12	3
1	IA2102 (II)	100%	11/11	2	2	LD18-6596	0%	0/12	3
2	LD17-2558 (SCN)	75%	9/12	2	3	LD07-3395bf (SCN) (L)	90%	9/10	3
3	MN1905CN (E)	100%	12/12	2	4	U14-910097 (SCN) (E)	75%	9/12	3
4	U14-910097 (SCN) (L)	50%	4/8	2	5	A17102-209	8%	1/12	3
5	A18110-47	100%	12/12	2	6	A17111-146	0%	0/12	3
6	A18112-98	91%	10/11	2	7	A17112-133	100%	12/12	3
7	A18119-117	100%	12/12	2	8	A17112-226	83%	10/12	3
8	A18124-23	42%	5/12	2	9	A17204-16	82%	9/11	3
9	A18271-108	100%	7/7	2	10	CR183142	100%	12/12	3
10	A18274-34	100%	12/12	2	11	CR183198	83%	10/12	3
11	A18277-42	100%	11/11	2	12	CR184506	100%	11/11	3
12	A18329-108	100%	12/12	2	13	CR191241	33%	4/12	3
13	A18344-171	10%	1/10	2	14	CR194692	92%	11/12	3
14	A18346-14Y	100%	12/12	2	15	CR20-5111	92%	11/12	3
15	A18361-21	100%	11/11	2	16	CR20-5340	100%	12/12	3
16	A18361-123	100%	11/11	2	17	CR20-5633	100%	12/12	3
17	A18385-82	100%	12/12	2	18	CR20-5933	100%	12/12	3
18	CR21-01259	0%	0/12	2	19	LD20-0902	0%	0/12	3
19	CR21-01370	100%	9/9	2	20	LD20-11526	0%	0/12	3
20	CR21-01530	100%	12/12	2	21	LD20-11665	8%	1/12	3
21	CR21-01659	0%	0/11	2	22	LD20-1683	0%	0/11	3
22	CR21-01851	91%	10/11	2	23	LD20-1791	0%	0/12	3
23	CR21-06067	100%	12/12	2	24	LD20-5413	0%	0/12	3
24	E22407	92%	11/12	2	25	LD20-5433	0%	0/12	3
25	E22415	100%	12/12	2	26	LG19-4084	55%	6/11	3
26	E22416	100%	10/10	2	27	LG19-5656	45%	5/11	3
27	LD21-6063	100%	12/12	2	28	SA19-10016	0%	0/12	3
28	LD21-6298	100%	12/12	2	29	SA19-10545	64%	7/11	3
29	ORC 4023	50%	6/12	2	30	SA19-12541	100%	12/12	3
					31	SA21-4164	0%	0/11	3

**2024 Phytophthora Screening Results - ISA 124 C-1 Race 1 (7)**

Entry	Strain	% Dead	# D/T	Test Group	Entry	Strain	% Dead	# D/T	Test Group
<b>UT III</b>					<b>PT III B</b>				
32	U19-244132	8%	1/12	3	1	LD11-2170 (III)	9%	1/11	4
33	U19-274052	0%	0/12	3	2	LD18-6596	0%	0/12	4
34	U19-274107	67%	8/12	3	3	LD07-3395bf (SCN) (L)	80%	8/10	4
35	U19-274119	50%	6/12	3	4	U14-910097 (SCN) (E)	36%	4/11	4
36	U19-277150	42%	5/12	3	5	CR21-01765	0%	0/9	4
37	U19-604203	0%	0/11	3	6	CR21-01770	91%	10/11	4
38	U20-612185	0%	0/11	3	7	CR21-01830	100%	11/11	4
39	U20-612253	92%	11/12	3	8	CR21-01910	100%	10/10	4
40	U20-914165	0%	0/12	3	9	CR21-02165	100%	11/11	4
<b>PT III A</b>					10	CR21-02230	91%	10/11	4
1	LD11-2170 (III)	9%	1/11	4	11	CR21-02238	100%	12/12	4
2	LD18-6596	0%	0/12	4	12	CR21-02797	92%	11/12	4
3	LD07-3395bf (SCN) (L)	80%	8/10	4	13	CR21-05126	92%	11/12	4
4	U14-910097 (SCN) (E)	36%	4/11	4	14	CR21-05897	92%	11/12	4
5	A18101-29	64%	7/11	4	15	HM21-52092	0%	0/12	4
6	A18105-151	100%	11/11	4	16	HM21-52131	0%	0/12	4
7	A18112-171	73%	8/11	4	17	HM21-52134	0%	0/11	4
8	A18328-145Y	100%	11/11	4	18	HM21-52137	0%	0/11	4
9	A18344-156Y	10%	1/10	4	19	HM21-52138	0%	0/12	4
10	A18361-172	9%	1/11	4	20	LG19-5848	73%	8/11	4
11	A18385-130	0%	0/12	4	21	LG21-2513	92%	11/12	4
12	LD21-1222	83%	10/12	4	22	LG21-2680	0%	0/12	4
13	LD21-2156	0%	0/11	4	23	LG21-2735	42%	5/12	4
14	LD21-2688	0%	0/12	4	24	LG21-2736	92%	11/12	4
15	LD21-7234	100%	12/12	4	25	LG21-2809	9%	1/11	4
16	LD21-7338	0%	0/12	4	26	LG21-2818	8%	1/12	4
17	LD21-7350	8%	1/12	4	27	SA21-1879	27%	3/11	4
18	U20-212170	73%	8/11	4	28	SA21-1921	0%	0/11	4
19	U20-222161	0%	0/12	4	29	SA21-3651	100%	12/12	4
20	U20-225189	36%	4/11	4	30	SA21-5178	0%	0/10	4
21	U20-237239	0%	0/12	4	31	SA21-6770	0%	0/12	4
22	U20-304290	100%	10/10	4	32	SA21-6839	78%	7/9	4
23	U20-306316	27%	3/11	4	33	SA22-3531	10%	1/10	4
24	U20-306320	64%	7/11	4	34	SA22-3617	0%	0/9	4
25	U20-307318	9%	1/11	4	35	SA22-5514	0%	0/9	4
26	U21-907129	91%	10/11	4	<b>UT IV</b>				
27	U21-913162	9%	1/11	4	1	LD15-3818 (IV)	55%	6/11	5
28	U21-916129	8%	1/12	4	2	LD00-2817 (L)	100%	12/12	5
29	U21-920106	91%	10/11	4	3	LD07-3395bf (SCN) (E)	100%	12/12	5
30	U21-935155	30%	3/10	4	4	K18-1994	100%	7/7	5
					5	CR183106	100%	9/9	5
					6	CR183264	92%	11/12	5

**2024 Phytophthora Screening Results - ISA 124 C-1 Race 1 (7)**

Entry	Strain	% Dead	# D/T	Test Group	Entry	Strain	% Dead	# D/T	Test Group
<b>UT IV</b>					16	K21-4874	100%	9/9	5
7	CR184183	0%	0/12	5	17	K21-4910	100%	11/11	5
8	CR190628	70%	7/10	5	18	K21-4931	100%	11/11	5
9	CR20-4991	92%	11/12	5	19	LD21-2459	0%	0/11	5
10	CR20-5030	83%	10/12	5	20	LD21-7183	100%	12/12	5
11	CR20-5469	83%	10/12	5	21	LD21-7325	0%	0/12	5
12	CR20-5470	83%	10/12	5	22	LG21-2486	89%	8/9	5
13	LD19-10076	67%	8/12	5	23	LG21-2490	100%	10/10	5
14	LD19-10244	100%	12/12	5	24	LG21-2835	100%	11/11	5
15	LD19-4657	0%	0/12	5	25	LG21-2844	92%	11/12	5
16	LD20-11622	0%	0/12	5	26	LG21-2925	92%	11/12	5
17	LD20-11748	58%	7/12	5	27	LW18-14009	100%	11/11	5
18	LD20-1723	0%	0/11	5	28	LW18-5091	100%	10/10	5
19	LD20-3559	33%	4/12	5	29	SA21-2455	58%	7/12	5
20	LD20-6649	0%	0/12	5	30	SA21-2684	0%	0/6	5
21	SA18-10815	100%	8/8	5	31	SA21-2923	86%	6/7	5
22	SA18-12086	82%	9/11	5	32	SA21-3047	100%	9/9	5
23	SA18-9643	91%	10/11	5	33	SA21-3530	0%	0/8	5
24	SA19-10687	0%	0/12	5	34	SA21-4104	0%	0/8	5
25	SA19-10772	0%	0/12	5	35	SA21-4168	0%	0/4	5
26	SA19-12580	100%	5/5	5	36	SA21-4461	0%	0/4	5
27	SA19-5082	0%	0/12	5	37	SA21-9324	30%	3/10	5
28	SA19-7733	75%	9/12	5	38	SA22-5305	100%	11/11	5
29	SA19-7754	100%	8/8	5					
30	SA20-2212	63%	5/8	5	<b>UT 0 TM</b>				
31	SA20-2256	13%	1/8	5	1	ND Dickey (0)	0%	0/10	1
32	SA21-3590	0%	0/12	5	2	MN1511CN (SCN) (L)	56%	5/9	1
					3	AG03XF2 (E)	0%	0/9	1
<b>PT IV</b>					4	ND15-22873	100%	10/10	1
1	LD15-3818 (IV)	55%	6/11	5	5	M05-363022HO-25	75%	6/8	1
2	LD00-2817 (L)	100%	12/12	5	6	M07-260009HOLL-1	0%	0/10	1
3	LD07-3395bf (SCN) (E)	100%	12/12	5	7	M07-292111HOLL-3	100%	10/10	1
4	K18-1994	100%	7/7	5	8	M17R-306019	50%	4/8	1
5	CR21-01210	100%	10/10	5	9	M17R-908-1094	36%	4/11	1
6	CR21-01290	100%	11/11	5	10	M18-151014	38%	3/8	1
7	CR21-01610	100%	12/12	5	11	M18-154033	0%	0/9	1
8	CR21-02084	9%	1/11	5	12	M18-154036	88%	7/8	1
9	CR21-02090	100%	11/11	5	13	M18-154059	27%	3/11	1
10	CR21-02724	89%	8/9	5	14	M18-156005	9%	1/11	1
11	K21-1577	91%	10/11	5	15	M18-190057	0%	0/6	1
12	K21-2376	100%	10/10	5	16	M18-195034	13%	1/8	1
13	K21-2406	100%	8/8	5	17	M18-200026	0%	0/9	1
14	K21-2447	100%	9/9	5	18	M18-224022	100%	10/10	1
15	K21-2474	100%	10/10	5	19	ND18-20092(GT SCN)	33%	3/9	1

**2024 Phytophthora Screening Results - ISA 124 C-1 Race 1 (7)**

Entry	Strain	% Dead	# D/T	Test Group	Entry	Strain	% Dead	# D/T	Test Group
<b>UT 0 TM</b>					12	E20394	0%	0/10	2
20	ND20-17783(GT)	0%	0/10	1	13	E21062T	8%	1/12	2
21	ND20-18557(GT)	0%	0/10	1	14	E21326GT	9%	1/11	2
22	ND21-11583(GT)	0%	0/11	1	15	E22036T	50%	6/12	2
23	ND21-12686(GT)	0%	0/11	1	16	E22061	0%	0/12	2
24	ND21-13089(GT)	0%	0/11	1	17	E22121	0%	0/12	2
<b>UT 1 TM</b>					18	E22122	0%	0/11	2
1	MN1511CN (SCN) (I)	56%	5/9	1	19	E22163	100%	12/12	2
2	MN1905CN (L)	100%	12/12	1	20	E22169	0%	0/12	2
3	AG11XF2 (E)	0%	0/11	1	21	E22186	100%	12/12	2
4	AG17XF2	17%	2/12	1	22	E22254	0%	0/11	2
5	A18302-39	100%	12/12	1	23	E22296	42%	5/12	2
6	M05-209037HO-4	100%	10/10	1	24	LD20-12206	100%	12/12	2
7	M05-363022HO-6	100%	10/10	1	25	LD21-100211	100%	12/12	2
8	M08-354011HOLL-35	100%	12/12	1	26	LD21-3904	100%	12/12	2
9	M08-362051HOLL-4	92%	11/12	1	27	LD21-3906	92%	11/12	2
10	M08-362051HOLL-5	89%	8/9	1	28	LD21-7822	33%	4/12	2
11	M08-362051HOLL-7	100%	12/12	1	29	LD21-7914	100%	12/12	2
12	M17-124036	60%	6/10	1	30	LD21-8536	100%	11/11	2
13	M17-253029	42%	5/12	1	<b>UT III TM</b>				
14	M17R-908-1002	9%	1/11	1	1	LD11-2170 (III)	0%	0/12	3
15	M17R-908-1003	44%	4/9	1	2	LD18-6596	0%	0/12	3
16	M18-113009	100%	12/12	1	3	AG25XF3 (E)	0%	0/11	3
17	M18-113012	75%	9/12	1	4	AG37XF1 (L)	0%	0/11	3
18	M18-145057	8%	1/12	1	5	A16336-119	0%	0/12	3
19	M18-155056	100%	10/10	1	6	LD19-22127	100%	8/8	3
20	M18-193017	0%	0/12	1	7	LD20-12214	100%	12/12	3
21	M18-201022	0%	0/6	1	8	LD20-12217	100%	12/12	3
22	M18-228055	0%	0/12	1	9	LD20-8968	10%	1/10	3
23	MSC09-774074HO-4	75%	9/12	1	10	LD20-9131	0%	0/12	3
<b>UT II TM</b>					11	LD21-100207	100%	11/11	3
1	IA2102 (II)	100%	11/11	2	12	LD21-3214	100%	12/12	3
2	U14-910097 (SCN) (L)	50%	4/8	2	13	LD21-3429	100%	12/12	3
3	AG17XF2 (E)	0%	0/12	2	14	LD21-3593	33%	4/12	3
4	AG25XF3	0%	0/12	2	15	LD21-7953	91%	10/11	3
5	A18304-10	100%	10/10	2	16	LD21-8716	100%	11/11	3
6	A18304-35	100%	12/12	2	17	LD21-9470	100%	12/12	3
7	A18304-75	100%	11/11	2	18	LD23-20706-5	0%	0/12	3
8	A18328-22Y	0%	0/11	2	19	LD23-20801-1	0%	0/11	3
9	A18328-60Y	91%	10/11	2	20	SA19-23535	100%	12/12	3
10	E20195	0%	0/12	2	21	SA21-11508	100%	12/12	3
11	E20316T	100%	12/12	2	22	U15-606207 (SCN)	9%	1/11	3
					23	U19-604203	0%	0/12	3

## 2024 Phytophthora Screening Results - ISA 124 C-1 Race 1 (7)

Entry	Strain	% Dead	# D/T	Test Group
<b>UT IV TM</b>				
1	LD15-3818 (IV)	55%	6/11	5
2	LD07-3395bf (SCN) (E)	100%	12/12	5
3	AG37XF1	0%	0/12	5
4	AG42XF4 (L)	8%	1/12	5
5	LD19-12943	58%	7/12	5
6	LD20-12210	70%	7/10	5
7	LD20-3780	0%	0/8	5
8	LD21-3549	92%	11/12	5
9	LD21-3582	100%	11/11	5
10	LD21-8474	100%	11/11	5
11	LD21-8509	100%	10/10	5
12	LD21-9624	70%	7/10	5
13	SA21-10247	100%	10/10	5

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	ISA 124 C-1 Race 1		Dorrance Race 3		P1754 Race 4	
			(7)		(1a, 7)		(1a, 1c, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT 00	1	MN0083 (00)	0%	0/10	33%	3/9	0%	0/10
UT 00	2	MN0095 (0)	0%	0/11	100%	10/10	45%	5/11
UT 00	3	ND Rolette	0%	0/12	0%	0/10	0%	0/12
UT 00	4	M16-110086	0%	0/10	10%	1/10	0%	0/12
UT 0	1	ND Dickey (0)	0%	0/10	9%	1/11	33%	4/12
UT 0	2	MN0095 (E)	0%	0/11	100%	10/10	45%	5/11
UT 0	3	MN0507CN (SCN)	0%	0/10	100%	12/12	38%	3/8
UT 0	4	MN1511CN (SCN) (L)	0%	0/10	14%	1/7	40%	4/10
UT 0	5	M15-105140	56%	5/9	42%	5/12	25%	3/12
UT 0	7	M17-215039	0%	0/9	22%	2/9	10%	1/10
UT 0	10	MCH17-317025	60%	6/10	64%	7/11	55%	6/11
UT 0	11	MCH17-317065	0%	0/12	11%	1/9	10%	1/10
UT I	1	MN1511CN (SCN) (I)	56%	5/9	14%	1/7	40%	4/10
UT I	2	ND Dickey (0) (E)	0%	0/10	9%	1/11	33%	4/12
UT I	3	MN1905CN (L)	100%	12/12	100%	12/12	45%	5/11
UT I	4	E15338	0%	0/11	0%	0/12	8%	1/12
UT I	11	E20078	0%	0/12	100%	11/11	80%	8/10
UT I	27	ORC 5822	0%	0/6	0%	0/8	0%	0/12
UT II	1	IA2102 (II)	100%	11/11	100%	10/10	8%	1/12
UT II	2	LD17-2558 (SCN)	75%	9/12	82%	9/11	0%	0/12
UT II	3	MN1905CN (E)	100%	12/12	100%	12/12	8%	1/12
UT II	4	U14-910097 (SCN) (L)	50%	4/8	75%	9/12	64%	7/11
UT II	5	A16373-82	0%	0/12	25%	3/12	36%	4/11
UT II	6	A16373-101	0%	0/12	50%	5/10	100%	11/11
UT II	7	A17107-95	0%	0/10	8%	1/12	100%	11/11
UT II	12	A17437-29	0%	0/11	92%	11/12	100%	12/12
UT II	14	CR184590	8%	1/12	0%	0/12	64%	7/11
UT II	16	CR193835	17%	2/12	0%	0/11	45%	5/11
UT II	19	E20329	0%	0/12	0%	0/12	17%	2/12
UT II	20	E20333	100%	11/11	100%	12/12	100%	12/12
UT II	21	E20355	50%	6/12	73%	8/11	50%	6/12
UT II	22	E21107	0%	0/12	8%	1/12	0%	0/12
UT II	23	E21109	17%	2/12	45%	5/11	42%	5/12
UT II	24	E21118	0%	0/12	58%	7/12	18%	2/11
UT II	25	E21125	9%	1/11	80%	8/10	10%	1/10
UT II	26	E21127	0%	0/12	55%	6/11	64%	7/11
UT II	27	E21345	10%	1/10	100%	12/12	91%	10/11
UT II	28	LD19-7145	0%	0/12	25%	3/12	0%	0/12
UT II	30	LD20-0815	0%	0/11	8%	1/12	0%	0/12
UT II	31	LD20-11062	0%	0/12	0%	0/12	36%	4/11

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	Dorrance Race 7 (1a, 3a, 6, 7)		Dorrance Race 17 (1b,1d, 3a, 6, 7)		Dorrance Race 25 (1a, 1b, 1c, 1k, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT 00	1	MN0083 (00)	9%	1/11	0%	0/8	67%	8/12
UT 00	2	MN0095 (0)	100%	10/10	0%	0/11	55%	6/11
UT 00	3	ND Rolette	0%	0/12	18%	2/11	45%	5/11
UT 00	4	M16-110086	0%	0/12	9%	1/11	0%	0/12
UT 0	1	ND Dickey (0)	8%	1/12	9%	1/11	8%	1/12
UT 0	2	MN0095 (E)	100%	10/10	0%	0/11	55%	6/11
UT 0	3	MN0507CN (SCN)	75%	6/8	0%	0/9	100%	12/12
UT 0	4	MN1511CN (SCN) (L)	0%	0/12	0%	0/11	71%	5/7
UT 0	5	M15-105140	9%	1/11	80%	8/10	0%	0/12
UT 0	7	M17-215039	9%	1/11	18%	2/11	73%	8/11
UT 0	10	MCH17-317025	40%	4/10	63%	5/8	75%	9/12
UT 0	11	MCH17-317065	0%	0/10	0%	0/10	27%	3/11
UT I	1	MN1511CN (SCN) (I)	0%	0/12	0%	0/11	71%	5/7
UT I	2	ND Dickey (0) (E)	8%	1/12	9%	1/11	8%	1/12
UT I	3	MN1905CN (L)	75%	9/12	100%	12/12	58%	7/12
UT I	4	E15338	0%	0/12	0%	0/11	18%	2/11
UT I	11	E20078	70%	7/10	0%	0/11	91%	10/11
UT I	27	ORC 5822	36%	4/11	60%	3/5	0%	0/9
UT II	1	IA2102 (II)	55%	6/11	100%	11/11	82%	9/11
UT II	2	LD17-2558 (SCN)	20%	2/10	92%	11/12	100%	12/12
UT II	3	MN1905CN (E)	75%	9/12	100%	12/12	58%	7/12
UT II	4	U14-910097 (SCN) (L)	55%	6/11	83%	10/12	0%	0/10
UT II	5	A16373-82	0%	0/11	0%	0/11	0%	0/10
UT II	6	A16373-101	0%	0/12	0%	0/10	100%	12/12
UT II	7	A17107-95	0%	0/10	0%	0/11	30%	3/10
UT II	12	A17437-29	100%	8/8	0%	0/12	36%	4/11
UT II	14	CR184590	0%	0/12	10%	1/10	92%	11/12
UT II	16	CR193835	8%	1/12	9%	1/11	50%	6/12
UT II	19	E20329	0%	0/12	8%	1/12	92%	11/12
UT II	20	E20333	90%	9/10	100%	12/12	100%	12/12
UT II	21	E20355	25%	3/12	62%	8/13	83%	10/12
UT II	22	E21107	0%	0/12	0%	0/11	25%	3/12
UT II	23	E21109	0%	0/12	8%	1/12	100%	11/11
UT II	24	E21118	0%	0/12	8%	1/12	92%	11/12
UT II	25	E21125	36%	4/11	0%	0/12	25%	3/12
UT II	26	E21127	33%	4/12	0%	0/11	17%	2/12
UT II	27	E21345	9%	1/11	0%	0/11	75%	9/12
UT II	28	LD19-7145	0%	0/12	9%	1/11	83%	10/12
UT II	30	LD20-0815	0%	0/12	30%	3/10	75%	9/12
UT II	31	LD20-11062	8%	1/12	0%	0/11	100%	11/11

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	ISA 124 C-1 Race 1 (7)		Dorrance Race 3 (1a, 7)		P1754 Race 4 (1a, 1c, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT II	33	LD20-4988	0%	0/10	0%	0/12	0%	0/12
UT II	34	LD20-5172	8%	1/12	0%	0/12	0%	0/12
UT II	35	U19-204054	27%	3/11	0%	0/9	0%	0/12
UT II	36	U19-230043	10%	1/10	33%	4/12	0%	0/12
UT II	37	U20-908101	25%	3/12	22%	2/9	8%	1/12
UT II	38	U20-910082	33%	4/12	0%	0/12	0%	0/12
UT II	39	U20-917147	36%	4/11	0%	0/12	0%	0/12
UT III	1	LD11-2170 (III)	0%	0/12	0%	0/12	0%	0/12
UT III	2	LD18-6596	0%	0/12	0%	0/9	0%	0/11
UT III	3	LD07-3395bf (SCN) (L)	90%	9/10	78%	7/9	0%	0/11
UT III	4	U14-910097 (SCN) (E)	75%	9/12	75%	9/12	64%	7/11
UT III	5	A17102-209	8%	1/12	0%	0/10	0%	0/12
UT III	6	A17111-146	0%	0/12	0%	0/11	0%	0/11
UT III	12	CR184506	100%	11/11	100%	12/12	8%	1/12
UT III	13	CR191241	33%	4/12	36%	4/11	9%	1/11
UT III	19	LD20-0902	0%	0/12	0%	0/11	8%	1/12
UT III	20	LD20-11526	0%	0/12	0%	0/11	8%	1/12
UT III	21	LD20-11665	8%	1/12	0%	0/12	8%	1/12
UT III	24	LD20-5413	0%	0/12	9%	1/11	0%	0/12
UT III	25	LD20-5433	0%	0/12	30%	3/10	0%	0/12
UT III	27	LG19-5656	45%	5/11	33%	4/12	0%	0/12
UT III	28	SA19-10016	0%	0/12	40%	4/10	92%	11/12
UT III	29	SA19-10545	64%	7/11	25%	3/12	0%	0/12
UT III	31	SA21-4164	0%	0/11	0%	0/12	100%	12/12
UT III	32	U19-244132	8%	1/12	0%	0/9	17%	2/12
UT III	33	U19-274052	0%	0/12	0%	0/11	38%	3/8
UT III	34	U19-274107	67%	8/12	56%	5/9	91%	10/11
UT III	36	U19-277150	42%	5/12	0%	0/11	0%	0/11
UT III	37	U19-604203	0%	0/11	0%	0/11	8%	1/12
UT III	38	U20-612185	0%	0/11	0%	0/12	40%	4/10
UT III	39	U20-612253	92%	11/12	100%	11/11	0%	0/12
UT III	40	U20-914165	0%	0/12	42%	5/12	8%	1/12
UT IV	1	LD15-3818 (IV)	55%	6/11	91%	10/11	8%	1/12
UT IV	2	LD00-2817 (L)	100%	12/12	100%	12/12	75%	6/8
UT IV	3	LD07-3395bf (SCN) (E)	100%	12/12	78%	7/9	0%	0/11
UT IV	4	K18-1994	100%	7/7	100%	12/12	33%	4/12
UT IV	6	CR183264	92%	11/12	92%	11/12	67%	8/12
UT IV	16	LD20-11622	0%	0/12	0%	0/11	83%	10/12
UT IV	17	LD20-11748	58%	7/12	92%	11/12	91%	10/11
UT IV	18	LD20-1723	0%	0/11	0%	0/11	83%	10/12
UT IV	19	LD20-3559	33%	4/12	0%	0/12	33%	4/12

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	Dorrance Race 7 (1a, 3a, 6,7)		Dorrance Race 17 (1b,1d, 3a, 6, 7)		Dorrance Race 25 (1a, 1b, 1c, 1k, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT II	33	LD20-4988	0%	0/12	0%	0/12	17%	2/12
UT II	34	LD20-5172	14%	1/7	0%	0/11	25%	3/12
UT II	35	U19-204054	91%	10/11	100%	10/10	0%	0/12
UT II	36	U19-230043	33%	4/12	27%	3/11	8%	1/12
UT II	37	U20-908101	17%	2/12	9%	1/11	17%	2/12
UT II	38	U20-910082	82%	9/11	73%	8/11	0%	0/12
UT II	39	U20-917147	88%	7/8	63%	5/8	0%	0/12
UT III	1	LD11-2170 (III)	0%	0/11	8%	1/12	92%	11/12
UT III	2	LD18-6596	0%	0/10	0%	0/9	75%	6/8
UT III	3	LD07-3395bf (SCN) (L)	36%	4/11	90%	9/10	8%	1/12
UT III	4	U14-910097 (SCN) (E)	55%	6/11	83%	10/12	0%	0/10
UT III	5	A17102-209	0%	0/11	0%	0/11	42%	5/12
UT III	6	A17111-146	0%	0/12	0%	0/11	36%	4/11
UT III	12	CR184506	70%	7/10	45%	5/11	73%	8/11
UT III	13	CR191241	36%	4/11	40%	4/10	75%	9/12
UT III	19	LD20-0902	0%	0/12	0%	0/10	0%	0/12
UT III	20	LD20-11526	0%	0/11	0%	0/12	0%	0/12
UT III	21	LD20-11665	0%	0/11	0%	0/11	50%	6/12
UT III	24	LD20-5413	0%	0/11	0%	0/12	45%	5/11
UT III	25	LD20-5433	0%	0/12	0%	0/12	60%	6/10
UT III	27	LG19-5656	18%	2/11	0%	0/11	25%	3/12
UT III	28	SA19-10016	0%	0/11	0%	0/12	64%	7/11
UT III	29	SA19-10545	10%	1/10	33%	3/9	13%	1/8
UT III	31	SA21-4164	0%	0/8	0%	0/9	8%	1/12
UT III	32	U19-244132	8%	1/12	0%	0/12	100%	10/10
UT III	33	U19-274052	0%	0/12	0%	0/12	0%	0/12
UT III	34	U19-274107	17%	1/6	20%	2/10	0%	0/11
UT III	36	U19-277150	45%	5/11	64%	7/11	10%	1/10
UT III	37	U19-604203	0%	0/12	0%	0/11	0%	0/10
UT III	38	U20-612185	0%	0/9	0%	0/12	27%	3/11
UT III	39	U20-612253	100%	10/10	91%	10/11	83%	10/12
UT III	40	U20-914165	58%	7/12	0%	0/11	75%	9/12
UT IV	1	LD15-3818 (IV)	17%	2/12	0%	0/11	92%	11/12
UT IV	2	LD00-2817 (L)	73%	8/11	92%	11/12	75%	9/12
UT IV	3	LD07-3395bf (SCN) (E)	36%	4/11	90%	9/10	8%	1/12
UT IV	4	K18-1994	70%	7/10	89%	8/9	36%	4/11
UT IV	6	CR183264	70%	7/10	100%	11/11	100%	12/12
UT IV	16	LD20-11622	0%	0/10	0%	0/10	0%	0/11
UT IV	17	LD20-11748	83%	10/12	0%	0/12	8%	1/12
UT IV	18	LD20-1723	0%	0/11	0%	0/11	8%	1/12
UT IV	19	LD20-3559	0%	0/12	0%	0/9	0%	0/12

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	ISA 124 C-1 Race 1 (7)		Dorrance Race 3 (1a, 7)		P1754 Race 4 (1a, 1c, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT IV	20	LD20-6649	0%	0/12	0%	0/12	100%	12/12
UT IV	24	SA19-10687	0%	0/12	17%	2/12	73%	8/11
UT IV	25	SA19-10772	0%	0/12	60%	6/10	0%	0/12
UT IV	27	SA19-5082	0%	0/12	0%	0%	0%	0/12
UT IV	31	SA20-2256	13%	1/8	71%	5/7	0%	0/12
UT IV	32	SA21-3590	0%	0/12	0%	0/12	8%	1/12

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	Dorrance Race 7 (1a, 3a, 6,7)		Dorrance Race 17 (1b,1d, 3a, 6, 7)		Dorrance Race 25 (1a, 1b, 1c, 1k, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT IV	20	LD20-6649	0%	0/12	8%	1/12	0%	0/11
UT IV	24	SA19-10687	0%	0/12	0%	0/9	17%	2/12
UT IV	25	SA19-10772	9%	1/11	25%	3/12	55%	6/11
UT IV	27	SA19-5082	0%	0/9	27%	3/11	18%	2/11
UT IV	31	SA20-2256	80%	4/5	63%	5/8	0%	0/8
UT IV	32	SA21-3590	0%	0/10	0%	0/12	82%	9/11

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	ISA 124 C-1 Race 1 (7)		Dorrance Race 3 (1a, 7)		P1754 Race 4 (1a, 1c, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT 0 TM	1	ND Dickey (0)	0%	0/10	9%	1/11	33%	4/12
UT 0 TM	2	MN1511CN (SCN) (L)	56%	5/9	14%	1/7	40%	4/10
UT 0 TM	3	AG03XF2 (E)	0%	0/9	0%	0/10	0%	0/9
UT 0 TM	4	ND15-22873	100%	10/10	100%	10/10	22%	2/9
UT 0 TM	7	M07-292111HOLL-3	100%	10/10	100%	12/12	0%	0/12
UT 0 TM	8	M17R-306019	50%	4/8	83%	10/12	0%	0/12
UT 0 TM	9	M17R-908-1094	36%	4/11	10%	1/10	55%	6/11
UT 0 TM	20	ND20-17783(GT)	0%	0/10	0%		10%	1/10
UT I TM	1	MN1511CN (SCN) (I)	56%	5/9	14%	1/7	40%	4/10
UT I TM	2	MN1905CN (L)	100%	12/12	100%	12/12	45%	5/11
UT I TM	3	AG11XF2 (E)	0%	0/11	0%	0/11	20%	2/10
UT I TM	4	AG17XF2	17%	2/12	0%	0/12	27%	3/11
UT I TM	9	M08-362051HOLL-4	92%	11/12	100%	12/12	0%	0/12
UT I TM	11	M08-362051HOLL-7	100%	12/12	90%	9/10	0%	0/12
UT I TM	12	M17-124036	60%	6/10	83%	10/12	0%	0/11
UT I TM	13	M17-253029	42%	5/12	100%	12/12	83%	10/12
UT I TM	14	M17R-908-1002	9%	1/11	0%	0/10	83%	10/12
UT I TM	15	M17R-908-1003	44%	4/9	45%	5/11	83%	10/12
UT II TM	1	IA2102 (II)	100%	11/11	100%	10/10	8%	1/12
UT II TM	2	U14-910097 (SCN) (L)	50%	4/8	75%	9/12	30%	3/10
UT II TM	3	AG17XF2 (E)	0%	0/12	0%	0/12	27%	3/11
UT II TM	4	AG25XF3	0%	0/12	0%	0/11	100%	12/12
UT II TM	10	E20195	0%	0/12	40%	4/10	0%	0/12
UT II TM	13	E21062T	8%	1/12	0%	0/11	36%	4/11
UT II TM	14	E21326GT	9%	1/11				
UT III TM	1	LD11-2170 (III)	0%	0/12	0%	0/12	0%	0/12
UT III TM	2	LD18-6596	0%	0/12	0%	0/7	30%	3/10
UT III TM	3	AG25XF3 (E)	0%	0/11	0%	0/11	100%	12/12
UT III TM	4	AG37XF1 (L)	0%	0/11	0%	0/11	8%	1/12
UT III TM	5	A16336-119	0%	0/12	0%	0/12	0%	0/11
UT III TM	9	LD20-8968	10%	1/10	0%	0/12	0%	0/7
UT III TM	10	LD20-9131	0%	0/12	0%	0/10	25%	3/12
UT III TM	22	U15-606207 (SCN)	9%	1/11	0%	0/12	0%	0/11
UT III TM	23	U19-604203	0%	0/12	0%	0/11	0%	0/9
UT IV TM	1	LD15-3818 (IV)	55%	6/11	91%	10/11	8%	1/12
UT IV TM	2	LD07-3395bf (SCN) (E)	100%	12/12	78%	7/9	0%	0/11
UT IV TM	3	AG37XF1	0%	0/12	0%	0/11	8%	1/12
UT IV TM	4	AG42XF4 (L)	8%	1/12	0%	0/11	67%	8/12
UT IV TM	7	LD20-3780	0%	0/8	0%	0/12	75%	9/12

## 2024 Phytophthora Screening Results - All Other Races

Test	Entry Strain	Isolate:	Dorrance Race 7 (1a, 3a, 6, 7)		Dorrance Race 17 (1b,1d, 3a, 6, 7)		Dorrance Race 25 (1a, 1b, 1c, 1k, 7)	
			% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
UT 0 TM	1	ND Dickey (0)	8%	1/12	9%	1/11	8%	1/12
UT 0 TM	2	MN1511CN (SCN) (L)	0%	0/12	0%	0/11	71%	5/7
UT 0 TM	3	AG03XF2 (E)	0%	0/9	0%	0/10	0%	0/10
UT 0 TM	4	ND15-22873	100%	11/11	82%	9/11	75%	9/12
UT 0 TM	7	M07-292111HOLL-3	75%	6/8	82%	9/11	55%	6/11
UT 0 TM	8	M17R-306019	56%	5/9	50%	2/4	25%	3/12
UT 0 TM	9	M17R-908-1094	44%	4/9	75%	9/12	50%	4/8
UT 0 TM	20	ND20-17783(GT)	0%	0/10	0%	0/11	0%	0/12
UT I TM	1	MN1511CN (SCN) (I)	0%	0/12	0%	0/11	71%	5/7
UT I TM	2	MN1905CN (L)	75%	9/12	100%	12/12	18%	2/11
UT I TM	3	AG11XF2 (E)	88%	7/8	75%	6/8	8%	1/12
UT I TM	4	AG17XF2	91%	10/11	100%	12/12	0%	0/11
UT I TM	9	M08-362051HOLL-4	92%	11/12	50%	5/10	67%	8/12
UT I TM	11	M08-362051HOLL-7	73%	8/11	91%	10/11	67%	8/12
UT I TM	12	M17-124036	100%	10/10	60%	6/10	82%	9/11
UT I TM	13	M17-253029	91%	10/11	0%	0/10	100%	11/11
UT I TM	14	M17R-908-1002	0%	0/11	0%	0/9	17%	2/12
UT I TM	15	M17R-908-1003	27%	3/11	22%	2/9	17%	2/12
UT II TM	1	IA2102 (II)	55%	6/11	100%	11/11	82%	9/11
UT II TM	2	U14-910097 (SCN) (L)	55%	6/11	83%	10/12	0%	0/10
UT II TM	3	AG17XF2 (E)	91%	10/11	100%	12/12	0%	0/11
UT II TM	4	AG25XF3	0%	0/12	0%	0/8	70%	7/10
UT II TM	10	E20195	0%	0/12	18%	2/11	0%	0/10
UT II TM	13	E21062T	0%	0/11	0%	0/9	0%	0/11
UT II TM	14	E21326GT						
UT III TM	1	LD11-2170 (III)	0%	0/11	8%	1/12	92%	11/12
UT III TM	2	LD18-6596	0%	0/6	0%	0/6	20%	2/10
UT III TM	3	AG25XF3 (E)	0%	0/12	0%	0/8	70%	7/10
UT III TM	4	AG37XF1 (L)	0%	0/12	0%	0/9	0%	0/12
UT III TM	5	A16336-119	0%	0/12	0%	0/9	9%	1/11
UT III TM	9	LD20-8968	0%	0/11	0%	0/9	45%	5/11
UT III TM	10	LD20-9131	0%	0/12	9%	1/11	18%	2/11
UT III TM	22	U15-606207 (SCN)	27%	3/11	55%	6/11	0%	0/12
UT III TM	23	U19-604203	0%	0/11	9%	1/11	30%	3/10
UT IV TM	1	LD15-3818 (IV)	17%	2/12	0%	0/11	92%	11/12
UT IV TM	2	LD07-3395bf (SCN) (E)	36%	4/11	90%	9/10	8%	1/12
UT IV TM	3	AG37XF1	0%	0/12	0%	0/9	0%	0/12
UT IV TM	4	AG42XF4 (L)	0%	0/12	0%	0/12	60%	6/10
UT IV TM	7	LD20-3780	0%	0/11	8%	1/12	70%	7/10

## 2024 Phytophthora Screening Results -Differential Scores (Race 1)

Differential	Isolate:	ISA 124 C-1 Race 1 (7)					
	Date rated:	Group 1 - 06/27/2024		Group 2 - 08/14/2024		Group 3 - 08/27/2024	
	Rps gene	% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
Williams	rps	100%	11/11	100%	11/11	100%	12/12
Union	1a	0%	0/12	0%	0/9	0%	0/12
L77-1863	1b	36%	4/11	58%	7/12	100%	12/12
L75-3735	1c	0%	0/12	0%	0/12	0%	0/12
PI 103091	1d	55%	6/11	60%	6/10	0%	0/9
Williams 82	1k	0%	0/12	0%	0/12	0%	0/12
L76-1449	2	0%	0/9	30%	3/10	0%	0/12
PI 171442	3a	0%	0/12	0%	0/12	0%	0/12
L91-8347	3b	0%	0/12	0%	0/11	8%	1/12
PRX 145-48	3c	25%	3/12	22%	2/9	33%	4/12
L85-2352	4	0%	0/11	20%	2/10	17%	2/12
L85-3059	5	0%	0/12	0%	0/11	67%	8/12
L89-1581	6	0%	0/10	9%	1/11	8%	1/12
L93-3258	7	100%	12/12	100%	12/12	100%	12/12
PI 399073	8	14%	1/7	0%	0/7	44%	4/9

Differential	Isolate:	ISA 124 C-1 Race 1 (7)			
	Date rated:	Group 4 - 09/05/2024		Group 5 - 09/12/2024	
	Rps gene	% Dead	# D/T	% Dead	# D/T
Williams	rps	100%	12/12	90%	9/10
Union	1a	0%	0/12	0%	0/11
L77-1863	1b	58%	7/12	73%	8/11
L75-3735	1c	33%	4/12	0%	0/12
PI 103091	1d	17%	1/6	0%	0/8
Williams 82	1k	0%	0/12	0%	0/12
L76-1449	2	0%	0/12	0%	0/9
PI 171442	3a	0%	0/11	0%	0/10
L91-8347	3b	0%	0/11	8%	1/12
PRX 145-48	3c	8%	1/12	0%	0/12
L85-2352	4	0%	0/11	0%	0/12
L85-3059	5	0%	0/11	0%	0/12
L89-1581	6	0%	0/10	0%	0/12
L93-3258	7	100%	11/11	100%	12/12
PI 399073	8	0%	0/9	0%	0/6

## 2024 Phytophthora Screening Results - Differential Scores (All Other Races)

Differential Name	Isolate:	Dorrance Race 3 (1a, 7)		P1754 Race 4 (1a, 1c, 7)		Dorrance Race 7 (1a, 3a, 6,7)	
	Date rated:	7/3/2024		7/9/2024		7/18/2024	
	Rps gene	% Dead	# D/T	% Dead	# D/T	% Dead	# D/T
Williams	rps	83%	10/12	100%	10/10	75%	9/12
Union	1a	83%	10/12	70%	7/10	73%	8/11
L77-1863	1b	8%	1/12	0%	0/12	0%	0/12
L75-3735	1c	0%	0/11	75%	9/12	0%	0/12
PI 103091	1d	38%	3/8	9%	1/11	0%	0/10
Williams 82	1k	0%	0/12	0%	0/12	0%	0/11
L76-1449	2	0%	0/12	0%	0/12	73%	8/11
PI 171442	3a	0%	0/12	0%	0/12	91%	10/11
L91-8347	3b	0%	0/11	0%	0/12	0%	0/10
PRX 145-48	3c	9%	1/11	0%	0/11	83%	10/12
L85-2352	4	0%	0/11	0%	0/12	56%	5/9
L85-3059	5	0%	0/12	0%	0/12	73%	8/11
L89-1581	6	9%	1/11	0%	0/12	75%	9/12
L93-3258	7	100%	12/12	45%	5/11	67%	8/12
PI 399073	8	0%	0/8	0%	0/11	18%	2/11

Differential Name	Isolate:	Dorrance Race 17 (1b,1d, 3a, 6, 7)		Dorrance Race 25 (1a, 1b, 1c, 1k, 7)	
	Date rated:	8/7/2024		7/30/2024	
	Rps gene	% Dead	# D/T	% Dead	# D/T
Williams	rps	92%	11/12	91%	10/11
Union	1a	0%	0/11	83%	10/12
L77-1863	1b	92%	11/12	83%	10/12
L75-3735	1c	0%	0/12	75%	9/12
PI 103091	1d	100%	9/9	0%	0/12
Williams 82	1k	0%	0/11	75%	9/12
L76-1449	2	92%	11/12	0%	0/11
PI 171442	3a	83%	10/12	0%	0/12
L91-8347	3b	83%	10/12	0%	0/12
PRX 145-48	3c	100%	12/12	0%	0/12
L85-2352	4	64%	7/11	0%	0/11
L85-3059	5	82%	9/11	0%	0/11
L89-1581	6	92%	11/12	0%	0/12
L93-3258	7	92%	11/12	70%	7/10
PI 399073	8	0%	0/5	0%	0/12

## Uniform and Preliminary Test Locations, 2024

## Non-Traited Tests

Location		Tests Conducted By:	UT						PT		
			00	0	I	II	III	IV	II	III	IV
<b>IA</b>	Ames	A. Singh/B. Scott				<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>	
	Lucas	A. Singh/B. Scott				<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>	
	Sutherland	A. Singh/B. Scott			<u>X</u>	<u>X</u>			<u>X</u>		
<b>IL</b>	Belleville	E. Monteverde / J. Tammen						<u>X</u>			
	Monmouth	E. Monteverde / J. Tammen				<u>X</u>					
	Perry	E. Monteverde / J. Tammen					<u>X</u>				
	Savoy	A. Mahan/E. Moody					<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>
	Urbana	E. Monteverde / J. Tammen				<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>
<b>IN</b>	Butler	G. Cai/A. Brock					<u>X</u>	<u>X</u>			<u>X</u>
	Wanatah	G. Cai/A. Brock			<u>X</u>	<u>X</u>	<u>X</u>				
	West Lafayette	G. Cai/A. Brock			<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>	<u>X</u>
<b>KS</b>	Manhattan-A	W. Schapaugh Jr.					<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>
	Manhattan-B	W. Schapaugh Jr.						<u>X</u>			<u>X</u>
	Ottawa	W. Schapaugh Jr.						<u>X</u>			<u>X</u>
<b>MI</b>	Britton	D. Wang/R. Laurenz				<u>X</u>					
	East Lansing	D. Wang/R. Laurenz			<u>X</u>	<u>X</u>			<u>X</u>		
	Saginaw	D. Wang/R. Laurenz			<u>X</u>						
<b>MN</b>	Crookston	A. Lorenz/S. Bhusal	<u>X</u>	<u>X</u>							
	Lamberton	A. Lorenz/S. Bhusal			<u>X</u>						
	Perley	A. Lorenz/S. Bhusal		<u>X</u>							
	Roseau	A. Lorenz/S. Bhusal	<u>X</u>								
	Rosemount	A. Lorenz/S. Bhusal			<u>X</u>						
	Thief River Falls	A. Lorenz/S. Bhusal	<u>X</u>								
	Waseca	A. Lorenz/S. Bhusal			<u>X</u>						
<b>MO</b>	Novelty	A. Scaboo/C. Meinhardt					<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>
	Rock Port	A. Scaboo/C. Meinhardt					<u>X</u>	<u>X</u>		<u>X</u>	
<b>ND</b>	Casselton	C. Miranda/G. Kreutz	<u>X</u>	<u>X</u>							
	Galesburg	C. Miranda/G. Kreutz	<u>X</u>	<u>X</u>							
<b>NE</b>	Cook	G. Graef/S. Howser					<u>X</u>			<u>X</u>	
	Cotesfield	G. Graef/S. Howser			<u>X</u>	<u>X</u>			<u>X</u>		
	Mead	G. Graef/S. Howser			<u>X</u>	<u>X</u>			<u>X</u>		
	Phillips	G. Graef/S. Howser			<u>X</u>	<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>	
	Steven's Creek	G. Graef/S. Howser					<u>X</u>			<u>X</u>	
<b>OH</b>	Hoytville	L. McHale/J. Heller				<u>X</u>	<u>X</u>		<u>X</u>	<u>X</u>	
<b>MAN</b>	Carman	J. Auclair/E. Cyr-Boudreault	<u>X</u>								
<b>ONT</b>	Chatham	M. Eskandari/R. Brandt				<u>X</u>			<u>X</u>		
	Elora	I. Rajcan/C. Templeton	<u>X</u>	<u>X</u>							
	Ottawa	E. Cober/S. Lackey	<u>X</u>	<u>X</u>							
	St. Marys	I. Rajcan/C. Templeman			<u>X</u>						
	Woodstock	I. Rajcan/C. Templeman			<u>X</u>						
<b>QUE</b>	Saint Hyacinthe	J. Auclair/E. Cyr-Boudreault		<u>X</u>	<u>X</u>						
	St. Mathieu de Beloeil	L. O'Donoghue	<u>X</u>	<u>X</u>							
<b>SAS</b>	Saskatoon	Warkentin / Daba	<u>X</u>								

X # Locations With Agronomic Data: 10 8 14 14 15 10 11 12 8  
X # Locations With Protein and Oil Data: 10 8 12 12 14 10 10 11 8

**Uniform and Preliminary Test Locations, 2024**

**Traited Tests**

Location		Tests Conducted By:	UT-TM				
			0	I	II	III	IV
<b>IA</b>	Ames	A. Singh/B. Scott		<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	
<b>IL</b>	Belleville	E. Monteverde / J. Tammen					<u>X</u>
	Monmouth	E. Monteverde / J. Tammen			<u>X</u>		
	Perry	E. Monteverde / J. Tammen				<u>X</u>	
	Urbana	E. Monteverde / J. Tammen			<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>
<b>IN</b>	Butlerville	G. Cai/A. Brock				<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>
	Wanatah	G. Cai/A. Brock		<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	
	West Lafayette	G. Cai/A. Brock		<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>
<b>MI</b>	Britton	D. Wang/R. Laurenz			<u>X<sup>1</sup></u>		
	East Lansing	D. Wang/R. Laurenz		<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>		
	Saginaw	D. Wang/R. Laurenz		<u>X<sup>1</sup></u>			
<b>MN</b>	Crookston	A. Lorenz/S. Bhusal	<u>X<sup>1</sup></u>				
	Lamberton	A. Lorenz/S. Bhusal		<u>X<sup>1</sup></u>			
	Rosemount	A. Lorenz/S. Bhusal		<u>X<sup>1</sup></u>			
	Thief River Falls	A. Lorenz/S. Bhusal	<u>X<sup>1</sup></u>				
	Waseca	A. Lorenz/S. Bhusal		<u>X<sup>1</sup></u>			
<b>MO</b>	Novelty	A. Scaboo/C. Meinhardt				<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>
	Rock Port	A. Scaboo/C. Meinhardt				<u>X<sup>1</sup></u>	<u>X<sup>1</sup></u>
<b>ND</b>	Casselton	C. Miranda/G. Kreutz	<u>X</u>				
	Galesburg	C. Miranda/G. Kreutz	<u>X</u>				

<b>X</b> Locations With Agronomic Data:	4	8	7	8	6
<b><u>X</u></b> Locations With Protein and Oil Data:	4	7	6	8	6
<b>X<sup>1</sup></b> Locations With Fatty Acid Data:	2	8	6	7	5
<b>X</b> Locations With Sugar Data:	4	0	0	7	0

## Location GPS Coordinates by Test for Reported Data in 2024

Test	State/Province	Location	Latitude (deg)	Longitude (deg)
UT 00	MN	Crookston	47.8199860	-96.6272730
UT 00	MN	Roseau	48.8750400	-95.8113400
UT 00	MN	Thief River Falls	48.1209500	-96.2471100
UT 00	ND	Casselton	46.8867450	-97.2352440
UT 00	ND	Galesburg	47.3128710	-97.4443510
UT 00	MAN	Carman	49.3620000	-97.8910000
UT 00	ONT	Elora	43.6361340	-80.4064030
UT 00	ONT	Ottawa-ONT	45.3683230	-75.7263300
UT 00	QUE	Saint-Mathieu-de-Beloeil	45.5793330	-73.2557780
UT 00	SAS	Saskatoon	52.1579000	106.6702000
UT 0	MN	Crookston	47.8199860	-96.6272730
UT 0	MN	Perley	47.0702880	-96.6905970
UT 0	ND	Casselton	46.8867450	-97.2352440
UT 0	ND	Galesburg	47.3128710	-97.4443510
UT 0	ONT	Elora	43.6361340	-80.4064030
UT 0	ONT	Ottawa-ONT	45.3705650	-75.7302090
UT 0	QUE	Saint Hyacinthe	45.5930000	-72.9330000
UT 0	QUE	Saint-Mathieu-de-Beloeil	45.5793330	-73.2557780
UT I	IA	Sutherland	42.9255670	-95.5271290
UT I	IN	Wanatah	41.4535689	-86.9381861
UT I	IN	West Lafayette	40.4806413	-87.0051709
UT I	MI	East Lansing	42.6303200	-84.4375970
UT I	MI	Saginaw	43.4004640	-83.8535670
UT I	MN	Lamberton	44.2333400	-95.3045300
UT I	MN	Rosemount	44.7070760	-93.1011680
UT I	MN	Waseca	44.0739100	-93.5265800
UT I	NE	Cotesfield	41.3305000	-98.6120000
UT I	NE	Mead	41.1595000	-96.4195000
UT I	NE	Phillips	40.8897000	-98.1495000
UT I	ONT	St. Marys	43.3297710	-81.1071320
UT I	ONT	Woodstock	43.1429260	-80.7958590
UT I	QUE	Saint Hyacinthe	45.5930000	-72.9330000

## Location GPS Coordinates by Test for Reported Data in 2024

Test	State/Province	Location	Latitude (deg)	Longitude (deg)
UT II	IA	Ames	41.9712720	-93.6307870
UT II	IA	Lucas	40.9801050	-93.4157090
UT II	IA	Sutherland	42.9255670	-95.5271290
UT II	IL	Monmouth	40.9261151	-90.7248359
UT II	IL	Urbana	40.0535550	-88.2357160
UT II	IN	Wanatah	41.4535689	-86.9381861
UT II	IN	West Lafayette	40.4806472	-87.0045956
UT II	MI	Britton	41.9375180	-83.8177760
UT II	MI	East Lansing	42.6303200	-84.4375970
UT II	NE	Cotesfield	41.3305000	-98.6120000
UT II	NE	Mead	41.1595000	-96.4195000
UT II	NE	Phillips	40.8897000	-98.1495000
UT II	OH	Hoytville	41.2148700	-83.7577520
UT II	ONT	Chatham	42.4028995	-82.1223806
PT II	IA	Ames	41.9712720	-93.6307870
PT II	IA	Lucas	40.9801050	-93.4157090
PT II	IA	Sutherland	42.9255670	-95.5271290
PT II	IL	Urbana	40.0535550	-88.2357160
PT II	IN	West Lafayette	40.4806472	-87.0045956
PT II	MI	East Lansing	42.6303200	-84.4375970
PT II	NE	Cotesfield	41.3305000	-98.6120000
PT II	NE	Mead	41.1595000	-96.4195000
PT II	NE	Phillips	40.8897000	-98.1495000
PT II	OH	Hoytville	41.2148700	-83.7577520
PT II	ONT	Chatham	42.4028995	-82.1223806
UT III	IA	Ames	41.9712720	-93.6307870
UT III	IA	Lucas	40.9801050	-93.4157090
UT III	IL	Perry	39.8040120	-90.8215870
UT III	IL	Savoy	40.0566160	-88.2329830
UT III	IL	Urbana	40.0535550	-88.2357160
UT III	IN	Butlerville	39.0362213	-85.5263837
UT III	IN	Wanatah	41.4535689	-86.9381861
UT III	IN	West Lafayette	40.4806368	-87.0037108
UT III	KS	Manhattan	39.1322500	-96.6180830
UT III	MO	Novelty	39.9434090	-92.0594150
UT III	MO	Rock Port	40.2692680	-95.4732870
UT III	NE	Cook	40.5188000	-96.2358000
UT III	NE	Steven's Creek	40.8615000	-96.5959000
UT III	NE	Phillips	40.8897000	-98.1495000
UT III	OH	Hoytville	41.2148700	-83.7577520

## Location GPS Coordinates by Test for Reported Data in 2024

Test	State/Province	Location	Latitude (deg)	Longitude (deg)
PT III A	IA	Ames	41.9712720	-93.6307870
PT III A	IA	Lucas	40.9801050	-93.4157090
PT III A	IL	Savoy	40.0566160	-88.2329830
PT III A	IL	Urbana	40.0535550	-88.2357160
PT III A	IN	West Lafayette	40.4806368	-87.0037108
PT III A	KS	Manhattan	39.1322500	-96.6180830
PT III A	MO	Novelty	39.9434090	-92.0594150
PT III A	NE	Cook	40.5188000	-96.2358000
PT III A	NE	Steven's Creek	40.8615000	-96.5959000
PT III A	NE	Phillips	40.8897000	-98.1495000
PT III A	OH	Hoytville	41.2148700	-83.7577520
PT III B	IA	Ames	41.9712720	-93.6307870
PT III B	IA	Lucas	40.9801050	-93.4157090
PT III B	IL	Savoy	40.0566160	-88.2329830
PT III B	IL	Urbana	40.0535550	-88.2357160
PT III B	IN	West Lafayette	40.4806368	-87.0037108
PT III B	KS	Manhattan	39.1322500	-96.6180830
PT III B	MO	Novelty	39.9434090	-92.0594150
PT III B	MO	Rock Port	40.2692680	-95.4732870
PT III B	NE	Cook	40.5188000	-96.2358000
PT III B	NE	Steven's Creek	40.8615000	-96.5959000
PT III B	NE	Phillips	40.8897000	-98.1495000
PT III B	OH	Hoytville	41.2148700	-83.7577520
UT IV	IL	Belleville	38.5332000	-89.8945140
UT IV	IL	Savoy	40.0566160	-88.2329830
UT IV	IL	Urbana	40.0535550	-88.2357160
UT IV	IN	Butlerville	39.0362213	-85.5263837
UT IV	IN	West Lafayette	40.4806396	-87.0030170
UT IV	KS	Manhattan	39.1322500	-96.6180830
UT IV	KS	Manhattan-B	39.1322500	-96.6180830
UT IV	KS	Ottawa-KS	38.5404440	-95.2477220
UT IV	MO	Novelty	39.9434090	-92.0594150
UT IV	MO	Rock Port	40.2692680	-95.4732870
PT IV	IL	Savoy	40.0566160	-88.2329830
PT IV	IL	Urbana	40.0535550	-88.2357160
PT IV	IN	Butlerville	39.0362213	-85.5263837
PT IV	IN	West Lafayette	40.4806396	-87.0030170
PT IV	KS	Manhattan	39.1322500	-96.6180830
PT IV	KS	Manhattan-B	39.1322500	-96.6180830
PT IV	KS	Ottawa-KS	38.5404440	-95.2477220
PT IV	MO	Novelty	39.9434090	-92.0594150

## Location GPS Coordinates by Test for Reported Data in 2024

Test	State/Province	Location	Latitude (deg)	Longitude (deg)
UT 0 TM	MN	Crookston	47.8199860	-96.6272730
UT 0 TM	MN	Thief River Falls	48.1209500	-96.2471100
UT 0 TM	ND	Casselton	46.8867450	-97.2352440
UT 0 TM	ND	Galesburg	47.3128710	-97.4443510
UT I TM	IA	Ames	41.9712720	-93.6307870
UT I TM	IN	Wanatah	41.4535689	-86.9381861
UT I TM	IN	West Lafayette	40.4806413	-87.0051709
UT I TM	MI	East Lansing	42.6303200	-84.4375970
UT I TM	MI	Saginaw	43.4004640	-83.8535670
UT I TM	MN	Lamberton	44.2333400	-95.3045300
UT I TM	MN	Rosemount	44.7070760	-93.1011680
UT I TM	MN	Waseca	44.0739100	-93.5265800
UT II TM	IA	Ames	41.9712720	-93.6307870
UT II TM	IL	Monmouth	40.9261151	-90.7248359
UT II TM	IL	Urbana	40.0535550	-88.2357160
UT II TM	IN	Wanatah	41.4535689	-86.9381861
UT II TM	IN	West Lafayette	40.4806472	-87.0045956
UT II TM	MI	Britton	41.9375180	-83.8177760
UT II TM	MI	East Lansing	42.6303200	-84.4375970
UT III TM	IA	Ames	41.9712720	-93.6307870
UT III TM	IL	Perry	39.8040120	-90.8215870
UT III TM	IL	Urbana	40.0535550	-88.2357160
UT III TM	IN	Butlerville	39.0362213	-85.5263837
UT III TM	IN	Wanatah	41.4535689	-86.9381861
UT III TM	IN	West Lafayette	40.4806368	-87.0037108
UT III TM	MO	Novelty	39.9434090	-92.0594150
UT III TM	MO	Rock Port	40.2692680	-95.4732870
UT IV TM	IL	Belleville	38.5332000	-89.8945140
UT IV TM	IL	Urbana	40.0535550	-88.2357160
UT IV TM	IN	Butlerville	39.0362213	-85.5263837
UT IV TM	IN	West Lafayette	40.4806396	-87.0030170
UT IV TM	MO	Novelty	39.9434090	-92.0594150
UT IV TM	MO	Rock Port	40.2692680	-95.4732870

## Uniform and Preliminary Test Locations Monthly Rainfall Data, 2024

Location		Monthly Rainfall (inches)					
		May	June	July	August	September	October
<b>IA</b>	Ames	7.6	4.0	4.4	2.5	1.8	1.9
	Lucas	7.6	4.3	3.3	2.8	0.9	0.1
	Sutherland	9.5	12.0	2.7	2.7	0.3	1.1
<b>IL</b>	Belleville	5.6	1.1	16.2	0.9	5.1	0.6
	Monmouth	4.0	4.0	8.4	2.7	0.7	2.0
	Perry	7.8	2.6	8.3	3.9	2.6	1.6
	Savoy	6.5	1.6	7.4	5.8	3.2	0.8
	Urbana	6.5	1.6	7.4	5.8	3.2	0.8
<b>IN</b>	Butlerville	4.9	1.3	5.5	5.0	4.0	0.3
	Wanatah	3.1	2.6	6.1	2.8	2.6	2.6
	West Lafayette	2.1	2.8	5.2	4.3	1.7	0.2
<b>KS</b>	Manhattan-A	6.3	5.4	5.0	5.2	0.4	1.1
	Manhattan-B	6.3	5.4	5.0	5.2	0.4	1.1
	Ottawa	4.5	7.4	3.6	4.4	4.6	0.9
<b>MI</b>	Britton	2.8	2.3	2.0	2.2	0.5	2.2
	East Lansing	2.4	4.2	6.3	4.4	1.0	1.3
	Saginaw	3.4	6.0	3.7	2.9	1.1	2.1
<b>MN</b>	Crookston	4.5	2.6	2.2	5.0	0.2	1.1
	Lamberton	6.3	9.0	5.1	3.2	0.2	1.4
	Perley	7.0	4.9	2.1	4.3	0.1	0.5
	Roseau	2.4	3.7	4.6	1.5	1.7	1.0
	Rosemount	6.9	7.3	3.6	6.6	1.0	1.1
	Thief River Falls	5.8	7.3	4.4	4.1	0.3	0.9
	Waseca	7.5	12.5	3.3	5.7	0.5	0.7
<b>MO</b>	Novelty	3.7	3.1	4.3	5.0	2.0	2.0
	Rock Port	11.0	7.7	6.4	3.1	1.6	1.9
<b>ND</b>	Casselton	6.5	3.4	2.5	3.8	0.1	0.4
	Galesburg	6.2	4.6	1.5	4.1	0.3	0.6
<b>NE</b>	Cook	4.3	2.7	4.5	1.4	0.6	1.6
	Cotesfield	8.3	1.4	5.3	2.4	2.4	0.1
	Mead	7.3	2.8	6.5	5.1	0.5	1.5
	Phillips	4.0	4.7	6.9	2.7	0.9	1.4
	Steven's Creek	6.5	4.6	6.4	2.3	0.1	0.9
<b>OH</b>	Hoytville	4.5	3.6	2.0	2.7	2.5	0.9
<b>MAN</b>	Carman	5.1	5.7	1.5	2.9	2.0	0.4
<b>ONT</b>	Chatham	3.7	3.7	2.3	3.5	1.1	2.1
	Elora	3.2	3.9	5.2	2.5	1.2	1.3
	Ottawa	3.0	3.9	4.3	5.2	2.1	2.2
	St. Marys	3.9	5.3	6.1	2.9	1.8	1.3
	Woodstock	0.8	0.4	5.4	2.9	0.3	0.3
<b>QUE</b>	Saint Hyacinthe	1.6	3.5	0.0	5.5	1.8	0.0
	St. Mathieu de Beloeil	1.6	3.5	0.0	5.5	1.8	0.0
<b>SAS</b>	Saskatoon	1.8	0.4	1.1	1.8	1.4	0.2

<https://agacis.rcc-acis.org/>

[https://climate.weather.gc.ca/prods\\_servs/cdn\\_climate\\_summary\\_e.html](https://climate.weather.gc.ca/prods_servs/cdn_climate_summary_e.html)

**Northern Regional Uniform Test  
Uniform Test 00, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	MN0083 (00)	M97-121138	MN0091	Lorenz	6	F5	Rps6, or Rps1k?
2	MN0095 (0)	M92-270029	M93-313185	Lorenz	15	F5	het-Rps1k/het-Rps1a
3	ND Rolette	M00-3075	ND05-17649	Miranda	9	F4	Rps1k
4	M16-110086	ND10-3067	M08-434024	Lorenz	2	F5	Yield, Rps1k+Rps6
5	M18-219013	M08-332003	M09-269045	Lorenz	Initial	F5	SCN
6	ND21-16024	ND14-2671	ND15-18939	Miranda	Initial	F5	P. sojae (Race 4), SCN
7	ND21-16321	ND15-18939	ND14-2678	Miranda	Initial	F5	P. sojae (Race 4), SCN
8	ND21-16580	ND14-2678	ND15-20392	Miranda	Initial	F5	P. sojae (Race 4), SCN
9	X6110-10	OT16-01	Gaillard	Warkentin	Initial	F2	Yld, Early RM, light hil

**UNIFORM TEST 00, 2024**

**DESCRIPTIVE AND DISEASE DATA**

Strain	Descriptive Code	IDC Score		Shattering Score St Mathieu de Beloeil	Green Stem Score St Mathieu de Beloeil
		Climax	Crooks-ton		
MN0083 (00)	WTTSYYI	1.3	1.0	1.0	1.3
MN0095 (0)	PGBDYIbI	1.3	1.0	1.0	3.7
ND Rolette	PGBDYBfI	1.5	1.5	1.0	1.6
M16-110086	PTBDYGI	1.5	1.0	1.0	3.7
M18-219013	PGTDYYI	1.5	1.0	1.0	1.7
ND21-16024	WGB+TSYYI	1.3	1.5	1.0	4.0
ND21-16321	WGTSYBfI	1.3	1.0	1.0	3.7
ND21-16580	WTTDYBrI	1.5	1.0	1.0	2.0
X6110-10	PTBSYYI	1.0	1.5	1.0	2.0

**UNIFORM TEST 00, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield 8 bu/a	Rank 8 No.	Maturity 10 Date	Lodging 9 Score	Plant Height 8 In	Seed Size 10 g/100	Seed Quality 10 Score	<u>Composition</u>	
								Protein 10 %	Oil 10 %
MN0083 (00)	42.0	8	9/16	1.4	29	14.2	1.6	35.6	17.7
MN0095 (0)	49.7	4	1.6	1.3	28	13.9	1.7	34.3	18.4
ND Rolette	47.6	7	0.8	1.1	29	13.8	1.6	34.6	18.0
M16-110086	49.5	5	2.9	1.2	25	16.5	2.3	34.2	18.3
M18-219013	49.4	6	4.6	1.4	29	16.9	1.6	35.2	18.1
ND21-16024	50.3	3	5.1	1.3	28	17.1	2.3	33.8	18.3
ND21-16321	51.9	1	7.0	1.2	26	16.5	2.1	35.2	18.5
ND21-16580	51.2	2	5.8	1.4	30	17.4	2.1	33.7	18.7
X6110-10	40.4	9	-7.5	1.0	23	15.5	1.8	36.0	18.3
Mean	48.0			1.2	27.6	15.8	1.9	34.7	18.3
C.V. (%)	9.5								
L.S.D. (5%)	2.6								

113.3 Days After Planting

**UNIFORM TEST 00, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield 17 bu/a	Rank 17 No.	Maturity 20 Date	Lodging 16 Score	Plant Height 14 In.	Seed Size 17 g/100	Seed Quality 17 Score	<u>Composition</u>	
								Protein 20 %	Oil 20 %
MN0083 (00)	42.0	4	9/14	1.3	31	14.3	1.7	35.9	17.8
MN0095 (0)	46.7	3	2.2	1.3	30	13.8	1.7	34.4	18.7
ND Rolette	46.8	2	1.0	1.2	30	14.3	1.7	34.7	18.3
M16-110086	48.9	1	2.6	1.2	27	16.6	2.1	34.5	18.4

113.2 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	24	24	27	23	19	23	22	26	26
MN0083 (00)	42.5	4	9/14	1.3	29	14.2	1.5	35.9	17.9
MN0095 (0)	48.3	2	2.3	1.2	28	13.7	1.5	34.7	18.5
ND Rolette	47.1	3	1.4	1.1	28	14.2	1.6	34.9	18.3
M16-110086	49.4	1	3.1	1.2	25	16.3	2.0	34.5	18.3

112.7 Days After Planting

**UNIFORM TEST 00, 2024**

**YIELD (bu/a)**

Strain	Mean 8 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND*	Gales- burg ND*	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	42.0	56.0	38.2	41.4	27.3	20.3	40.9	32.3	36.1	39.5	51.8
MN0095 (0)	49.7	67.7	43.6	54.4	36.9	28.7	54.1	42.8	37.6	43.0	54.4
ND Rolette	47.6	64.0	41.3	49.4	37.8	38.0	47.4	43.7	38.6	40.6	56.5
M16-110086	49.5	68.2	42.2	51.3	30.5	40.1	49.1	38.1	46.7	45.8	54.7
M18-219013	49.4	67.4	42.1	50.3	37.9	39.6	47.8	47.8	41.2	49.3	49.2
ND21-16024	50.3	67.4	44.2	56.2	40.0	35.1	49.4	41.6	44.3	50.3	49.0
ND21-16321	51.9	76.5	45.3	51.8	30.1	31.2	49.6	41.0	49.7	52.2	49.2
ND21-16580	51.2	68.7	37.7	54.8	42.7	37.7	48.2	43.7	46.2	57.0	53.4
X6110-10	40.4	54.3	33.6	40.2	14.4	19.7	42.7	33.6	30.6	34.3	52.1
Location Mean		65.6	40.9	50.0	33.1	32.3	47.7	40.5	41.2	45.8	52.3
C.V. (%)		6.2	13.1	8.7	26.1	18.4	3.7	5.2	10.4	8.2	5.1
L.S.D. (5%)		7.0	9.3	7.6	14.9	10.3	4.1	3.6	7.4	6.6	4.7
Row Sp. (In.)		30	30	30	30	30	15	13	18	7	14
Rows/Plot		4	4	4	4	4	3	4	4	5	3
Reps		3	3	3	3	3	2	3	3	3	3

\* Data not included in mean.

**UNIFORM TEST 00, 2024**

**YIELD RANK**

Strain	Yield Rank	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	8	8	7	8	8	8	9	9	8	8	6
MN0095 (0)	4	4	3	3	5	7	1	4	7	6	3
ND Rolette	7	7	6	7	4	3	7	2	6	7	1
M16-110086	5	3	4	5	6	1	4	7	2	5	2
M18-219013	6	5	5	6	3	2	6	1	5	4	7
ND21-16024	3	5	2	1	2	5	3	5	4	3	9
ND21-16321	1	1	1	4	7	6	2	6	1	2	8
ND21-16580	2	2	8	2	1	4	5	3	3	1	4
X6110-10	9	9	9	9	9	9	8	8	9	9	5

**UNIFORM TEST 00, 2024**

**MATURITY (date)**

Strain	Mean 10 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	9/16	9/13	9/17	9/11	9/19	9/17	9/24	9/8	9/15	9/12	9/29
MN0095 (0)	2	2	-1	2	0	0	4	-0	2	5	3
ND Rolette	1	1	-1	0	1	-1	2	-0	3	4	1
M16-110086	3	2	3	2	2	1	4	0	4	11	-0
M18-219013	5	3	4	2	6	1	6	7	4	9	5
ND21-16024	5	4	6	2	6	2	5	9	6	8	4
ND21-16321	7	5	8	4	8	5	7	6	8	13	6
ND21-16580	6	3	4	3	6	4	7	7	8	11	5
X6110-10	-8	-3	-9	-4	-9	-8	-9	-6	-6	-5	-16
Date Planted	5/26	5/29	5/15	5/15	6/7	5/22	5/23	5/23	6/2	6/6	5/27
Days to Mature	113.3	107	125	119	104	118	124	108	105	98	125

**UNIFORM TEST 00, 2024**

**LODGING (score)**

Strain	Mean 9 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	1.4	3.0	1.0	1.7	1.0	1.7		1.0	1.0	1.0	1.3
MN0095 (0)	1.3	3.0	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.7
ND Rolette	1.1	1.7	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.3
M16-110086	1.2	2.7	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0
M18-219013	1.4	3.0	1.0	1.3	1.0	1.0		1.2	1.0	1.0	2.0
ND21-16024	1.3	2.3	1.0	1.0	1.0	1.0		1.0	1.0	1.0	2.0
ND21-16321	1.2	1.7	1.0	1.0	1.0	1.0		1.0	1.0	1.0	2.0
ND21-16580	1.4	2.7	1.0	1.0	1.0	1.3		1.0	1.3	1.0	2.0
X6110-10	1.0	1.3	1.0	1.0	1.0	1.0		1.0	1.0	1.0	1.0

**UNIFORM TEST 00, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 8 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	29	31	36		24	24		36	25	18	40
MN0095 (0)	28	29	35		24	22		36	22	17	40
ND Rolette	29	32	37		23	24		33	23	18	40
M16-110086	25	28	28		20	21		30	23	17	35
M18-219013	29	30	37		24	24		37	24	20	40
ND21-16024	28	29	35		23	23		35	25	19	37
ND21-16321	26	25	31		20	21		31	23	20	34
ND21-16580	30	31	38		26	23		37	28	22	36
X6110-10	23	23	27		15	18		32	22	16	33

**UNIFORM TEST 00, 2024**

**SEED SIZE (g/100)**

Strain	Mean 10 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	14.2	13.2	14.8	13.3	15.4	14.5	14.5	14.5	15.8	13.7	12.6
MN0095 (0)	13.9	13.5	14.2	13.8	13.6	15.3	14.7	14.2	15.1	13.3	11.4
ND Rolette	13.8	13.0	13.6	13.8	14.4	14.9	13.7	13.6	15.8	14.1	11.2
M16-110086	16.5	14.9	16.7	16.8	17.1	18.5	16.7	16.4	17.7	16.5	13.2
M18-219013	16.9	16.6	17.9	17.2	16.9	16.7	18.0	16.8	17.4	16.4	15.0
ND21-16024	17.1	16.2	17.8	17.1	17.5	18.0	17.2	17.1	18.8	16.5	14.3
ND21-16321	16.5	15.9	16.6	15.9	17.4	16.0	16.6	17.2	17.8	16.7	15.1
ND21-16580	17.4	17.0	17.6	16.8	17.7	20.1	17.4	17.7	17.9	16.5	15.7
X6110-10	15.5	16.0	16.4	15.9	13.7	16.0	15.0	15.1	17.9	15.2	14.1

**UNIFORM TEST 00, 2024**

**SEED QUALITY (score)**

Strain	Mean 10 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	1.6	1.0	1.0	1.0	2.0	2.0	3.0	2.0	1.0	2.0	1.0
MN0095 (0)	1.7	1.0	1.0	1.0	2.0	2.0	3.0	2.0	1.3	1.7	2.0
ND Rolette	1.6	1.0	1.0	1.0	2.0	2.0	3.0	1.5	1.0	2.0	1.0
M16-110086	2.3	1.0	2.0	1.0	3.0	3.0	3.0	2.0	2.0	2.0	4.0
M18-219013	1.6	1.0	2.0	1.0	1.0	1.0	3.0	1.5	1.0	2.0	2.0
ND21-16024	2.3	2.0	1.0	2.0	3.0	3.0	3.0	2.5	2.0	3.0	1.0
ND21-16321	2.1	2.0	2.0	1.0	2.0	3.0	3.0	2.5	1.0	2.0	2.0
ND21-16580	2.1	1.0	2.0	2.0	3.0	2.0	3.0	2.0	1.3	2.0	3.0
X6110-10	1.8	2.0	2.0	1.0	1.0	2.0	3.0	2.0	1.7	2.0	1.0

**UNIFORM TEST 00, 2024**

**PROTEIN (%)**

Strain	Mean 10 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN*	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	35.6	35.7	36.6	34.6	37.7	35.9	34.6	35.4	36.2	32.7	37.0
MN0095 (0)	34.3	35.8	35.7	32.6	34.8	35.1	34.2	34.9	33.0	31.8	35.1
ND Rolette	34.6	35.0	34.8	33.7	35.4	35.2	34.1	34.6	35.6	32.1	35.7
M16-110086	34.2	33.4	34.9	34.3	34.7	36.1	33.6	33.1	34.8	32.6	34.9
M18-219013	35.2	36.5	36.2	34.4	35.9	33.7	35.1	35.4	34.8	33.4	37.1
ND21-16024	33.8	33.8	35.0	33.2	34.2	34.2	33.3	34.5	34.9	31.0	34.2
ND21-16321	35.2	35.2	36.0	34.7	35.9	34.5	34.2	35.3	36.2	32.9	37.0
ND21-16580	33.7	34.1	33.8	32.9	34.6	35.6	32.8	34.0	33.4	31.2	35.0
X6110-10	36.0	37.1	36.6	37.0	35.3	36.3	35.4	36.0	36.7	33.9	35.2

\* Data adjusted to 13% moisture.

**UNIFORM TEST 00, 2024**

**OIL (%)**

Strain	Mean 10 Tests	Crooks- ton MN	Roseau MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND	Carman MAN*	Elora ONT	Ottawa ONT	St Mathieu de Beloeil QUE	Saska- toon SAS
MN0083 (00)	17.7	18.1	17.2	18.1	17.9	18.7	16.9	18.0	17.8	18.6	15.9
MN0095 (0)	18.4	18.6	17.9	19.0	19.1	18.9	16.8	18.7	18.9	19.5	17.0
ND Rolette	18.0	18.2	17.6	19.0	18.5	18.6	17.0	18.5	18.1	18.2	16.4
M16-110086	18.3	18.6	18.1	18.4	18.8	18.1	17.7	19.1	18.1	19.2	16.6
M18-219013	18.1	18.3	17.2	18.5	18.4	19.9	16.7	18.3	18.7	18.7	16.6
ND21-16024	18.3	18.8	17.9	18.7	18.8	18.9	17.8	18.8	18.0	18.9	16.4
ND21-16321	18.5	19.0	18.2	19.0	19.2	19.9	17.7	18.9	18.2	18.9	16.4
ND21-16580	18.7	19.1	18.9	19.4	19.4	19.2	17.1	18.9	19.3	19.6	16.3
X6110-10	18.3	18.1	17.5	18.5	19.2	18.9	17.6	18.3	18.0	19.0	18.0

\* Data adjusted to 13% moisture.

**Northern Regional Uniform Test  
Uniform Test 0, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	ND Dickey (0)	P. 91M10	Sheyenne	Miranda	6	F4	Rps1c
2	MN0095 (E)	M92-270029	M93-313185	Lorenz	14	F5	het-Rps1k/het-Rps1a
3	MN0507CN (SCN)			Lorenz	Initial	F9	
4	MN1511CN (SCN) (L)	M06-288181	M06-358188	Lorenz	2	F8	SCN, Rps1c
5	M15-105140	LD12-12701a	M04-239105	Lorenz	1	F9	Aphid R., H-PI 88788
6	M17-191003	MSC10-567015	M09-278096	Lorenz	1	F5	YLD-Div, SCN
7	M17-215039	M07-260009	M10-268096	Lorenz	1	F5	Rps1k
8	M18-109038	M02-366067	M11-337015	Lorenz	Initial	F5	YLD
9	M18-124018	M13-204072	U14-108007	Lorenz	Initial	F5	YLDDiv
10	MCH17-317025	M10-218053	ND12-15628	Lorenz	23 UT 00	F4	Aphid, SCN
11	MCH17-317065	M10-218053	ND12-15628	Lorenz	1	F4	APH, Rps1k, SCN
12	ND20-12680	ND14-2194	M10-181003	Miranda	Initial	F5	P. sojae (Race 4)
13	ND20-14884	ND14-3926(SCN)	ND Bison	Miranda	1		SCN,Rps1c
14	ND21-15882	ND Dickey	ND14-2194	Miranda	Initial	F5	P. sojae (Race 4), SCN
15	ND21-15897	ND14-2678	ND Dickey	Miranda	Initial	F5	P. sojae (Race 4), SCN
16	ND21-16007	ND Dickey	ND Stutsman	Miranda	Initial	F5	P. sojae (Race 3)
17	OAC 22-05C-SCN	SeCan 14-21C-SCN	OAC Adare	Rajcan	Initial	F5	

**UNIFORM TEST 0, 2024**

**DESCRIPTIVE AND DISEASE DATA**

Strain	Descriptive Code	IDC Score		Shattering Score	Green Stem Score
		Climax	Crooks-ton	St Mathieu de Beloeil	St Mathieu de Beloeil
ND Dickey (0)	PGTDYYI	1.3	1.0	1.0	2.3
MN0095 (E)	PGBDYIbI	1.5	1.5	1.0	3.0
MN0507CN (SCN)	PGBDYI	1.8	2.0	1.0	1.7
MN1511CN (SCN) (L)	PGBDYBfI	1.8	2.5	1.0	1.3
M15-105140	PTBDYBrI	1.0	1.0	1.0	2.0
M17-191003	PGTSYYI	1.5	1.0	1.0	1.3
M17-215039	PLtTDYYI	1.5	1.5	1.0	2.3
M18-109038	WGBSYYI	1.5	1.0	1.0	2.0
M18-124018	WTTDYBrI	1.5	1.5	1.0	1.3
MCH17-317025	P+WT+GTDYHI	2.3	1.5	1.0	2.0
MCH17-317065	PTTDYHI	3.0	1.5	1.0	1.7
ND20-12680	WGTDYYI	1.0	1.5	1.0	1.0
ND20-14884	PTBDYYI	1.0	1.5	1.0	1.3
ND21-15882	PGBSYYI	1.3	1.5	1.0	1.7
ND21-15897	PLt+GBDYI	1.5	1.0	1.0	1.0
ND21-16007	PGTSYYI	1.8	1.0	1.0	4.0
OAC 22-05C-SCN	PTBDYYI	1.5	2.0	1.0	3.0

**UNIFORM TEST 0, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield 6 bu/a	Rank 6 No.	Maturity 8 Date	Lodging 7 Score	Plant Height 7 In.	Seed Size 8 g/100	Seed Quality 8 Score	Composition	
								Protein 8 %	Oil 8 %
ND Dickey (0)	60.6	1	9/26	1.8	31	18.5	1.7	34.7	17.6
MN0095 (E)	45.2	17	-7.3	1.7	27	13.7	1.7	34.0	18.8
MN0507CN (SCN)	47.6	12	-5.2	1.4	31	18.2	1.7	35.5	18.5
MN1511CN (SCN) (L)	56.5	6	3.6	1.8	36	15.3	2.0	34.3	18.2
M15-105140	47.7	11	-1.7	2.3	34	17.9	2.1	33.6	18.2
M17-191003	56.5	5	0.3	1.5	29	18.1	2.1	34.7	19.1
M17-215039	50.8	9	-0.3	1.3	30	18.3	2.2	34.4	18.0
M18-109038	48.8	10	0.0	1.5	29	19.5	1.8	36.0	18.2
M18-124018	46.8	15	-3.7	1.8	33	17.5	2.0	35.5	18.4
MCH17-317025	46.5	16	-5.4	1.8	30	15.1	1.9	35.4	18.6
MCH17-317065	46.9	14	-4.8	1.7	30	13.4	2.0	35.0	18.0
ND20-12680	47.5	13	-3.7	1.9	28	12.5	1.9	34.8	18.3
ND20-14884	55.5	7	-1.7	1.5	32	18.1	2.5	34.9	18.0
ND21-15882	60.3	2	-0.4	1.6	31	17.7	1.8	34.4	17.7
ND21-15897	56.7	4	-5.1	1.8	29	17.2	2.4	32.4	19.1
ND21-16007	60.0	3	-1.8	1.5	30	17.8	2.3	33.9	17.6
OAC 22-05C-SCN	54.5	8	-1.5	1.8	32	19.9	2.0	37.5	18.0
Mean	52.3			1.7	30.7	17.0	2.0	34.8	18.3
C.V. (%)	9.2								
L.S.D. (5%)	3.2								

118.9 Days After Planting

**UNIFORM TEST 0, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield 14 bu/a	Rank 14 No.	Maturity 17 Date	Lodging 17 Score	Plant Height 15 In.	Seed Size 14 g/100	Seed Quality 14 Score	Composition	
								Protein 17 %	Oil 17 %
ND Dickey (0)	56.5	1	9/22	1.6	31	18.4	1.6	34.6	18.0
MN0095 (E)	43.7	8	-7.0	1.5	29	13.9	1.6	34.1	19.1
MN1511CN (SCN) (L)	54.0	2	4.6	1.7	38	15.2	1.7	34.0	18.6
M15-105140	46.7	6	-0.5	2.0	34	17.8	1.9	34.0	18.5
M17-191003	53.4	3	1.5	1.5	29	18.2	1.8	34.4	19.5
M17-215039	49.4	5	-0.4	1.3	31	18.4	2.0	34.3	18.7
MCH17-317065	46.1	7	-4.1	1.7	31	13.6	1.8	35.3	18.3
ND20-14884	52.1	4	-0.3	1.4	32	17.9	2.3	34.8	18.5

119.5 Days After Planting

UNIFORM TEST 0, 2024

YIELD (bu/a)

Strain	Mean 6 Tests	Crook- ston MN	Perley MN*	Cassel- ton ND*	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	60.6	69.4	37.5	48.5	58.2	49.6	64.4	57.6	64.5
MN0095 (E)	45.2	62.0	26.2	42.3	48.0	37.4	50.2	40.4	33.3
MN0507CN (SCN)	47.6	61.1	22.5	34.8	30.5	38.9	57.0	45.3	52.7
MN1511CN (SCN) (L)	56.5	72.9	36.7	44.6	46.7	46.0	62.6	51.0	59.7
M15-105140	47.7	59.3	40.8	44.7	32.0	45.0	57.9	42.7	49.5
M17-191003	56.5	79.4	35.7	44.4	45.9	43.9	62.5	50.6	56.8
M17-215039	50.8	66.4	25.5	45.5	35.9	46.2	53.0	52.2	51.4
M18-109038	48.8	60.0	22.2	40.7	35.0	37.4	55.1	51.4	53.9
M18-124018	46.8	54.8	27.3	41.6	37.7	33.8	55.7	45.8	52.7
MCH17-317025	46.5	62.4	26.0	43.7	43.9	37.0	51.8	44.0	39.8
MCH17-317065	46.9	64.0	34.2	39.3	40.0	41.2	47.7	45.8	43.0
ND20-12680	47.5	64.9	31.8	37.9	34.8	42.2	48.9	45.9	49.1
ND20-14884	55.5	70.1	28.2	47.4	43.6	47.6	57.1	52.9	61.6
ND21-15882	60.3	76.6	38.0	47.3	57.6	46.8	59.0	56.5	65.4
ND21-15897	56.7	77.8	37.7	51.7	46.7	45.6	62.5	49.9	57.5
ND21-16007	60.0	66.0	31.8	56.5	59.7	50.4	60.5	52.8	70.5
OAC 22-05C-SCN	54.5	57.3	35.7	44.6	47.2	43.6	59.1	55.3	64.1
Location Mean		66.1	31.6	44.4	43.7	43.1	56.8	49.4	54.4
C.V. (%)		6.7	14.5	20.8	14.1	8.2	7.2	8.2	10.4
L.S.D. (5%)		7.4	10.4	15.4	10.3	5.9	6.8	6.8	9.7
Row Sp. (In.)		30	30	30	30	13	18	20	7
Rows/Plot		4	4	4	4	4	4	3	5
Reps		3	2	3	3	3	3	3	3

\* Data not included in mean.

**UNIFORM TEST 0, 2024**

**YIELD RANK**

Strain	Yield Rank	Crookston MN	Perley MN	Casselton ND	Galesburg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	1	6	4	3	2	2	1	1	3
MN0095 (E)	17	12	13	12	4	14	15	17	17
MN0507CN (SCN)	12	13	16	17	17	13	10	14	10
MN1511CN (SCN) (L)	6	4	5	8	6	6	2	8	6
M15-105140	11	15	1	7	16	8	8	16	13
M17-191003	5	1	6	10	8	9	3	9	8
M17-215039	9	7	15	6	13	5	13	6	12
M18-109038	10	14	17	14	14	14	12	7	9
M18-124018	15	17	12	13	12	17	11	13	10
MCH17-317025	16	11	14	11	9	16	14	15	16
MCH17-317065	14	10	8	15	11	12	17	12	15
ND20-12680	13	9	9	16	15	11	16	11	14
ND20-14884	7	5	11	4	10	3	9	4	5
ND21-15882	2	3	2	5	3	4	7	2	2
ND21-15897	4	2	3	2	7	7	3	10	7
ND21-16007	3	8	10	1	1	1	5	5	1
OAC 22-05C-SCN	8	16	7	9	5	10	6	3	4

**UNIFORM TEST 0, 2024**

**MATURITY (date)**

Strain	Mean 8 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	9/26	9/19	10/2	9/29	10/4	9/18	9/22	9/28	10/2
MN0095 (E)	-7	-6	-8	-5	-3	-7	-7	-6	-17
MN0507CN (SCN)	-5	-3	-7	-3	-7	-2	-3	-7	-10
MN1511CN (SCN) (L)	4	5	6	6	1	3	5	2	1
M15-105140	-2	-1	-1	-3	-2	0	1	-2	-6
M17-191003	0	5	4	-1	-7	2	3	-1	-2
M17-215039	-0	-1	5	-3	-7	6	-0	-5	3
M18-109038	0	-0	0	2	-7	2	2	2	-1
M18-124018	-4	-4	-3	-3	-3	-1	-2	-5	-8
MCH17-317025	-5	-3	-7	-5	-4	-1	-4	-9	-11
MCH17-317065	-5	-2	-4	-4	-2	-3	-5	-8	-10
ND20-12680	-4	-4	-3	-3	-6	-0	-2	-4	-8
ND20-14884	-2	-0	-2	-2	-3	-1	0	-3	-3
ND21-15882	-0	2	-3	0	-2	-2	1	1	0
ND21-15897	-5	-2	-9	-3	-7	-2	-2	-7	-8
ND21-16007	-2	-1	-4	-1	-4	-1	0	-4	0
OAC 22-05C-SCN	-2	-3	-3	-5	-4	-2	-1	-2	6
Date Planted	5/30	5/29	6/14	6/7	5/22	5/23	6/1	5/21	6/6
Days to Mature	119	113	110	114	135	118	113	130	118

**UNIFORM TEST 0, 2024**

**LODGING (score)**

Strain	Mean 7 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	1.8	2.0		1.0	2.0	1.0	3.0	2.0	1.3
MN0095 (E)	1.7	3.3		1.0	2.0	1.0	1.3	2.3	1.0
MN0507CN (SCN)	1.4	2.3		1.0	2.0	1.0	1.0	1.3	1.0
MN1511CN (SCN) (L)	1.8	2.7		1.0	2.0	1.3	2.3	2.0	1.0
M15-105140	2.3	3.3		1.0	2.3	1.5	3.3	2.7	1.7
M17-191003	1.5	2.3		1.0	1.3	1.0	2.0	1.7	1.0
M17-215039	1.3	2.0		1.0	1.3	1.0	1.7	1.3	1.0
M18-109038	1.5	2.3		1.0	2.0	1.0	1.0	2.0	1.0
M18-124018	1.8	3.0		1.0	2.0	1.0	2.0	2.0	1.3
MCH17-317025	1.8	2.7		1.0	2.0	1.2	1.7	2.7	1.0
MCH17-317065	1.7	2.3		1.0	2.0	1.2	1.7	2.7	1.0
ND20-12680	1.9	3.0		1.0	1.3	1.3	2.3	3.7	1.0
ND20-14884	1.5	1.7		1.0	1.7	1.0	2.3	1.7	1.0
ND21-15882	1.6	2.3		1.0	1.7	1.0	2.0	1.7	1.2
ND21-15897	1.8	3.0		1.0	1.7	1.0	2.0	2.7	1.0
ND21-16007	1.5	1.7		1.0	1.7	1.0	1.7	2.0	1.2
OAC 22-05C-SCN	1.8	2.7		1.0	1.0	1.2	2.7	3.0	1.0

**UNIFORM TEST 0, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 7 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	31	28		26	34	36	33	36	23
MN0095 (E)	27	30		25	31	34	30	28	14
MN0507CN (SCN)	31	32		27	27	38	36	34	21
MN1511CN (SCN) (L)	36	34		30	35	47	39	41	24
M15-105140	34	31		32	32	42	39	40	22
M17-191003	29	30		23	27	32	31	34	22
M17-215039	30	32		28	27	37	31	31	21
M18-109038	29	29		26	27	33	31	36	22
M18-124018	33	32		30	31	40	38	38	25
MCH17-317025	30	30		28	30	37	33	31	20
MCH17-317065	30	30		26	32	35	32	37	21
ND20-12680	28	28		25	28	31	31	34	22
ND20-14884	32	30		29	31	36	35	36	25
ND21-15882	31	30		27	32	34	34	35	24
ND21-15897	29	29		28	27	33	31	34	23
ND21-16007	30	30		28	30	33	34	33	24
OAC 22-05C-SCN	32	32		28	30	37	37	36	24

**UNIFORM TEST 0, 2024**

**SEED SIZE (g/100)**

Strain	Mean 8 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	18.5	17.5	16.5	20.0	17.8	17.7	19.4	18.8	19.9
MN0095 (E)	13.7	13.3	11.5	15.0	14.0	13.3	14.2	14.9	13.0
MN0507CN (SCN)	18.2	18.8	15.5	20.1	17.2	19.3	19.7	17.5	17.7
MN1511CN (SCN) (L)	15.3	14.4	14.5	17.1	14.5	15.6	16.0	15.9	14.7
M15-105140	17.9	16.4	16.0	18.1	17.8	19.8	19.3	18.7	16.8
M17-191003	18.1	17.2	16.2	19.8	16.6	19.0	19.7	19.5	17.1
M17-215039	18.3	17.4	16.0	18.9	17.6	19.3	19.6	18.7	18.7
M18-109038	19.5	18.2	16.9	21.9	18.1	19.8	20.4	20.9	19.9
M18-124018	17.5	16.5	16.8	19.0	16.6	16.1	18.8	19.1	16.9
MCH17-317025	15.1	13.9	14.1	15.4	15.0	16.0	15.6	16.4	14.0
MCH17-317065	13.4	13.3	12.5	13.7	12.6	13.2	13.5	14.5	13.7
ND20-12680	12.5	12.1	11.6	13.7	11.3	12.6	13.4	13.3	12.0
ND20-14884	18.1	17.6	17.2	19.1	17.0	18.1	19.4	18.9	17.6
ND21-15882	17.7	17.4	15.2	20.0	16.6	16.2	18.4	18.6	18.8
ND21-15897	17.2	16.5	15.1	19.0	17.6	15.4	17.9	18.7	17.5
ND21-16007	17.8	16.6	16.0	18.8	17.6	17.2	18.2	18.7	19.2
OAC 22-05C-SCN	19.9	17.8	18.7	20.0	19.4	21.8	21.4	20.1	20.0

**UNIFORM TEST 0, 2024**

**SEED QUALITY (score)**

Strain	Mean 8 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE	St Mathieu de Beloeil QUE
ND Dickey (0)	1.7	1.0	2.0	2.0	2.0	1.5	1.3	3.0	1.0
MN0095 (E)	1.7	1.0	1.0	2.0	2.0	2.0	1.0	3.0	1.3
MN0507CN (SCN)	1.7	1.0	1.0	2.0	2.0	1.5	1.7	3.0	1.3
MN1511CN (SCN) (L)	2.0	1.0	2.0	3.0	2.0	1.5	1.3	3.0	2.0
M15-105140	2.1	1.0	2.0	2.0	3.0	2.0	1.7	3.0	1.7
M17-191003	2.1	2.0	1.0	3.0	2.0	2.0	2.0	3.0	2.0
M17-215039	2.2	1.0	2.0	2.0	3.0	2.5	1.7	3.3	2.3
M18-109038	1.8	1.0	1.0	2.0	3.0	2.0	1.7	2.3	1.0
M18-124018	2.0	2.0	2.0	2.0	2.0	1.5	1.7	3.0	1.7
MCH17-317025	1.9	2.0	2.0	2.0	2.0	1.5	1.3	3.0	1.3
MCH17-317065	2.0	2.0	1.0	2.0	2.0	2.0	1.3	4.0	1.7
ND20-12680	1.9	2.0	2.0	2.0	2.0	1.5	1.0	3.0	2.0
ND20-14884	2.5	2.0	2.0	3.0	3.0	2.5	2.0	3.0	2.7
ND21-15882	1.8	1.0	2.0	2.0	2.0	1.5	1.7	3.0	1.0
ND21-15897	2.4	2.0	2.0	3.0	3.0	2.0	2.0	3.0	2.0
ND21-16007	2.3	2.0	2.0	3.0	3.0	1.5	1.7	3.0	2.0
OAC 22-05C-SCN	2.0	2.0	2.0	2.0	2.0	1.5	1.7	3.0	1.7

**UNIFORM TEST 0, 2024**

**PROTEIN (%)**

Strain	Mean 8 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE*	St Mathieu de Beloeil QUE
ND Dickey (0)	34.7	35.1	35.2	35.8	34.5	34.5	35.1	34.7	33.0
MN0095 (E)	34.0	36.2	33.9	34.9	34.0	35.0	33.6	33.5	31.1
MN0507CN (SCN)	35.5	35.6	35.8	37.9	35.1	36.5	35.4	34.5	33.6
MN1511CN (SCN) (L)	34.3	34.3	33.7	35.4	33.3	34.9	35.9	34.4	32.4
M15-105140	33.6	34.5	33.6	34.7	32.9	34.7	33.5	34.1	31.1
M17-191003	34.7	34.3	34.7	36.3	33.6	33.8	36.7	35.6	32.7
M17-215039	34.4	35.1	34.0	35.5	33.7	34.4	35.3	34.8	32.7
M18-109038	36.0	36.3	35.2	37.2	35.2	36.0	36.8	36.7	34.5
M18-124018	35.5	37.2	35.1	37.3	34.3	34.9	35.9	35.9	33.0
MCH17-317025	35.4	36.2	36.3	35.9	35.3	35.7	36.4	34.6	32.5
MCH17-317065	35.0	35.6	34.8	35.1	34.5	35.2	36.5	34.9	33.2
ND20-12680	34.8	35.7	34.2	35.3	34.7	35.4	36.7	35.2	31.3
ND20-14884	34.9	35.3	34.5	35.4	35.0	34.4	36.3	35.3	33.5
ND21-15882	34.4	35.1	34.5	35.3	34.1	34.2	35.1	34.3	32.9
ND21-15897	32.4	33.1	31.9	33.0	32.4	31.0	33.2	33.4	31.2
ND21-16007	33.9	34.5	32.8	36.0	33.1	33.6	34.0	33.9	33.1
OAC 22-05C-SCN	37.5	38.0	37.5	37.5	37.6	37.7	38.2	37.6	35.7

\* Data adjusted to 13% moisture.

**UNIFORM TEST 0, 2024**

**OIL (%)**

Strain	Mean 8 Tests	Crook- ston MN	Perley MN	Cassel- ton ND	Gales- burg ND	Elora ONT	Ottawa ONT	St Hyacinthe QUE*	St Mathieu de Beloeil QUE
ND Dickey (0)	17.6	17.7	18.6	17.8	18.0	17.8	17.0	16.2	17.8
MN0095 (E)	18.8	18.1	19.9	19.2	19.6	18.4	18.5	17.4	19.3
MN0507CN (SCN)	18.5	18.7	19.5	18.3	19.4	17.6	18.1	17.3	19.0
MN1511CN (SCN) (L)	18.2	18.4	19.4	18.5	19.3	17.8	17.4	16.7	18.2
M15-105140	18.2	18.4	19.0	18.2	19.0	17.5	17.8	16.6	19.1
M17-191003	19.1	19.7	20.1	19.4	20.2	19.1	18.2	16.9	18.9
M17-215039	18.0	18.2	19.0	18.3	18.8	17.5	17.6	16.6	18.2
M18-109038	18.2	18.6	19.6	18.2	19.1	18.0	17.8	16.5	17.9
M18-124018	18.4	18.2	19.1	18.1	19.3	18.6	17.9	17.2	19.0
MCH17-317025	18.6	18.4	19.4	18.7	19.6	18.7	18.2	17.1	18.9
MCH17-317065	18.0	17.8	18.6	18.8	18.6	18.3	17.2	16.6	18.1
ND20-12680	18.3	18.5	19.6	19.0	18.8	18.0	17.2	16.9	18.8
ND20-14884	18.0	18.4	19.1	18.3	18.4	17.9	17.3	16.5	18.0
ND21-15882	17.7	17.6	18.6	18.0	18.1	18.0	17.4	16.4	17.7
ND21-15897	19.1	18.8	20.2	19.3	19.8	19.5	18.5	17.5	19.1
ND21-16007	17.6	17.3	19.1	17.4	18.4	17.8	17.1	16.2	17.3
OAC 22-05C-SCN	18.0	17.9	18.7	18.7	18.8	18.2	17.5	16.7	17.8

\* Data adjusted to 13% moisture.

**Northern Regional Uniform Test  
Uniform Test I, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	MN1511CN (SCN) (I)	M06-288181	M06-358188	Lorenz	2	F8	SCN, Rps1c
2	ND Dickey (0) (E)	P. 91M10	Sheyenne	Miranda	7	F4	Rps1c
3	MN1905CN (L)	M08-365038	IA1026	Lorenz	23 SCN UT I	F9	Yld, SCN
4	E15338	E09088	E12901	Wang	6	F5	SCN
5	A18103-8	A14004-3	A14011-67	Singh	Initial	F5	
6	A18112-101	U14-213255	A14011-77	Singh	Initial	F5	
7	A18273-17	A14017-50	AR15-358030 / R10-2710	Singh	Initial	F5	
8	A18321-3Y	A14018-51	A14020-41	Singh	Initial	F5	
9	A18325-2Y	A14020-44	A14011-77	Singh	Initial	F5	
10	A18372-90	A14061-131	A14020-8	Singh	Initial	F5	
11	E20078	E14077	AR09-191018	Wang	2	F5	SCN, Rps1a
12	E21100	LD10-10198	E14077	Wang	1	F5	SCN
13	LD18-4787F	U11-932025	LD13-5131a	Monteverde	23 SCN P I	F5	SCN
14	M18-101011	ND Stutman	M11-337015	Lorenz	Initial	F5	YLDCN
15	M18-120071	M12-439036	U14-103015	Lorenz	Initial	F5	YLDDiv
16	M18-176012	M02-366067	M10-218053	Lorenz	Initial	F5	AphidCN
17	M18-222040	M13-265028	M09-269045	Lorenz	Initial	F5	AphidCN
18	M18-222071	M13-265028	M09-269045	Lorenz	Initial	F5	AphidCN
19	M18-243061	ND13-8894	M10-186021	Lorenz	Initial	F5	YLDCN
20	OAC 22-33C-SCN	OAC 13-87C-SCN	OAC Durham	Rajcan	Initial	F5	
21	OAC 22-34C-SCN	OAC Malory	M10-181060	Rajcan	Initial	F5	
22	ORC 3323	SeCan 15-29C SCN	OX 172	Eskandari	Initial	F4	Conv / SCN
23	ORC 3523	SC 6014	SC 8415N	Eskandari	Initial	F4	Conv / SCN
24	ORC 4623	OAC Ramsay	Tala	Eskandari	Initial	F4	Conv
25	ORC 4723	OAC Ramsay	U14-206321	Eskandari	Initial	F4	Conv / SCN
26	ORC 5023	OAC Bruton	U14-910097	Eskandari	Initial	F4	Conv / SCN
27	ORC 5822	OAC Brooke	SC 8415N	Eskandari	1	F4	Conv, SCN, Rps3a

**UNIFORM TEST I, 2024**

**DESCRIPTIVE AND DISEASE DATA**

Strain	Descriptive Code	IDC Score	
		Climax	Crooks-ton
MN1511CN (SCN) (I)	PGBDYBfI	2.0	1.5
ND Dickey (0) (E)	P+WGTDYYI	2.3	1.0
MN1905CN (L)	PTBDYYI	2.3	1.5
E15338	PGBDYIbI	2.8	1.5
A18103-8	PLtBSYBrI	2.0	1.5
A18112-101	PLtB+TDYHI	3.0	2.0
A18273-17	WGTDYYI	2.5	1.0
A18321-3Y	WGTDYYI	1.8	1.5
A18325-2Y	PLtBSYYI	1.8	1.0
A18372-90	PLtTDYYI	3.0	2.0
E20078	PLtBDYBI	3.0	1.0
E21100	PGBSYGI	2.8	2.0
LD18-4787F	WGBSYBfI	1.8	2.0
M18-101011	PGBDYYI	1.0	1.0
M18-120071	PTTSYHI	2.0	1.5
M18-176012	P+WGTDYBfI	1.5	1.0
M18-222040	PTTDYYI	2.3	1.5
M18-222071	PTTDYBrI	2.3	2.5
M18-243061	PTBDYBrI	1.8	1.5
OAC 22-33C-SCN	PGBDYD	2.3	1.5
OAC 22-34C-SCN	PTBSYGI	2.0	1.0
ORC 3323	PGBDYYI	1.8	1.5
ORC 3523	PTTDYYI	2.3	2.0
ORC 4623	PGBSYI	2.8	2.0
ORC 4723	WGBDYBfI	2.3	2.0
ORC 5023	WGBDYBfI	2.5	2.5
ORC 5822	WGTDYYI	1.8	2.0

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**UNIFORM TEST I, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	12 bu/a	12 No.	13 Date	14 Score	14 In.	13 g/100	13 Score	Protein 12 %	Oil 12 %
MN1511CN (SCN) (I)	57.9	16	9/16	1.5	34	14.7	1.4	34.0	18.9
ND Dickey (0) (E)	55.3	23	-2.7	1.4	29	17.4	1.4	35.0	18.3
MN1905CN (L)	67.5	7	5.1	1.7	34	17.1	1.4	34.7	19.2
E15338	65.6	10	4.8	2.0	34	16.5	1.5	33.9	19.0
A18103-8	66.8	8	4.6	1.4	29	15.5	1.3	35.1	19.0
A18112-101	70.3	3	7.2	1.3	31	13.9	1.5	34.2	18.7
A18273-17	68.3	5	5.1	1.2	32	16.7	1.3	34.8	18.6
A18321-3Y	65.7	9	3.1	1.5	32	17.3	1.3	36.7	18.0
A18325-2Y	68.5	4	5.4	1.4	32	18.0	1.4	36.5	18.0
A18372-90	65.1	12	3.8	1.7	31	17.8	1.6	37.1	17.6
E20078	65.5	11	6.3	1.7	38	16.2	1.4	34.4	19.2
E21100	71.5	2	5.6	1.5	33	16.9	1.5	33.4	18.8
LD18-4787F	72.1	1	4.9	1.5	30	17.2	1.3	34.3	18.0
M18-101011	55.1	24	-3.2	1.3	29	16.0	1.6	36.0	17.7
M18-120071	64.9	13	4.1	1.3	28	14.6	1.5	34.2	19.1
M18-176012	55.7	22	0.1	1.3	31	19.0	1.8	36.4	18.3
M18-222040	54.5	25	-1.3	1.3	29	15.8	1.7	35.3	18.2
M18-222071	48.0	27	-6.2	1.8	25	14.7	1.3	34.7	18.4
M18-243061	57.6	17	-1.4	1.4	28	16.5	1.4	34.3	19.4
OAC 22-33C-SCN	60.4	14	-0.3	1.5	26	17.3	1.4	35.3	19.1
OAC 22-34C-SCN	56.9	18	-0.5	1.7	32	17.5	1.6	36.5	18.0
ORC 3323	58.5	15	2.4	1.4	32	17.8	1.3	36.1	18.2
ORC 3523	56.1	21	0.4	1.2	31	23.3	1.6	36.7	18.3
ORC 4623	56.9	18	-0.9	1.6	34	19.0	1.6	35.9	18.6
ORC 4723	54.2	26	-0.2	1.2	28	20.5	1.7	36.6	17.6
ORC 5023	67.6	6	5.3	1.7	32	18.4	1.3	35.0	19.2
ORC 5822	56.1	20	4.4	1.5	29	19.2	1.5	35.7	17.6
Mean	61.6			1.5	30.7	17.2	1.5	35.3	18.5
C.V. (%)	10.0								
L.S.D. (5%)	2.9								

116.8 Days After Planting

**UNIFORM TEST I, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield 27 bu/a	Rank 27 No.	Maturity 27 Date	Lodging 28 Score	Plant Height 27 In.	Seed Size 26 g/100	Seed Quality 26 Score	<u>Composition</u>	
								Protein 25 %	Oil 25 %
MN1511CN (SCN) (I)	60.5	5	9/16	1.8	36	15.1	1.5	34.2	19.0
ND Dickey (0) (E)	56.9	6	-3.3	1.5	30	17.7	1.6	34.9	18.4
E15338	65.9	2	4.4	2.1	34	16.8	1.6	34.1	19.0
E20078	65.4	3	6.4	2.0	39	16.4	1.5	34.4	19.2
E21100	70.1	1	5.9	1.4	34	17.3	1.5	33.4	18.9
ORC 5822	60.6	4	4.3	1.5	31	19.8	1.5	35.8	17.7

119.7 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	41	41	38	37	37	38	38	38	38
MN1511CN (SCN) (I)	59.8	3	9/15	1.5	33.9	15.2	1.5	34.2	18.9
ND Dickey (0) (E)	53.7	4	-3.2	1.3	28.5	17.6	1.6	34.9	18.4
E15338	64.9	2	4.5	1.8	32.9	16.8	1.5	34.0	18.9
E20078	65.6	1	6.9	1.8	37.9	16.6	1.4	34.2	19.2

118.1 Days After Planting

**UNIFORM TEST I, 2024**

**YIELD (bu/a)**

Strain	Mean 12 Tests	Suther- land IA*	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	57.9	44.1	49.4	55.3	52.6	59.8	52.7	51.0
ND Dickey (0) (E)	55.3	56.3	53.1	42.2	45.1	49.0	55.7	47.5
MN1905CN (L)	67.5	56.6	63.9	74.6	63.3	62.6	57.9	58.6
E15338	65.6	56.2	66.1	65.1	61.1	49.7	59.6	59.4
A18103-8	66.8	52.7	66.9	70.2	63.3	51.7	58.5	61.1
A18112-101	70.3	46.6	63.9	78.2	72.9	63.8	69.4	64.4
A18273-17	68.3	55.6	68.5	76.9	54.8	63.2	64.7	57.5
A18321-3Y	65.7	49.4	62.5	62.6	57.1	54.5	60.8	59.5
A18325-2Y	68.5	45.1	69.9	68.4	59.2	54.8	67.9	60.4
A18372-90	65.1	50.3	63.5	62.4	62.7	61.9	60.1	57.8
E20078	65.5	58.9	70.6	73.2	62.4	53.2	55.4	57.9
E21100	71.5	62.9	68.7	68.5	72.3	64.4	62.0	61.1
LD18-4787F	72.1	64.0	78.4	71.0	61.4	63.8	62.9	62.2
M18-101011	55.1	39.3	49.2	45.0	47.1	61.2	53.8	43.6
M18-120071	64.9	44.0	60.3	71.3	64.2	53.5	53.9	48.6
M18-176012	55.7	42.4	46.6	54.0	39.6	50.6	57.1	49.6
M18-222040	54.5	55.2	52.5	49.7	52.3	42.3	55.5	46.0
M18-222071	48.0	42.5	40.7	42.2	47.6	50.5	48.2	33.3
M18-243061	57.6	36.4	57.3	64.2	46.0	52.6	45.7	47.4
OAC 22-33C-SCN	60.4	42.0	58.6	51.5	47.1	55.9	62.3	47.2
OAC 22-34C-SCN	56.9	51.1	47.6	50.8	52.4	59.1	48.9	47.7
ORC 3323	58.5	49.8	56.3	58.2	52.5	54.6	56.2	52.0
ORC 3523	56.1	55.0	51.4	45.4	52.4	53.5	49.1	48.0
ORC 4623	56.9	56.2	44.3	47.5	53.1	55.3	52.1	54.4
ORC 4723	54.2	35.4	36.8	38.7	53.1	42.2	52.2	52.5
ORC 5023	67.6	57.8	68.5	76.0	62.9	61.3	59.0	56.8
ORC 5822	56.1	55.5	53.5	55.9	50.6	55.8	45.4	50.8
Location Mean		50.4	58.1	59.9	55.9	55.6	56.6	53.2
C.V. (%)		16.5	8.7	10.1	9.9	11.9	10.2	8.3
L.S.D. (5%)		13.6	10.4	12.4	11.4	13.6	9.4	7.2
Row Sp. (In.)		30	30	30	15	15	30	30
Rows/Plot		4	4	4	6	6	4	4
Reps		3	2	2	2	2	3	3

\* Data not included in mean.

**UNIFORM TEST I, 2024**

**YIELD (bu/a)**

Strain	Waseca MN*	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	66.6	72.4	57.7	81.1	53.5	53.2	56.6
ND Dickey (0) (E)	44.3	73.4	36.4	78.7	64.4	55.6	63.9
MN1905CN (L)	63.2	93.9	62.1	75.8	71.6	64.9	59.9
E15338	60.0	89.9	41.5	85.8	74.5	67.1	69.0
A18103-8	55.6	96.5	59.5	67.6	66.7	64.4	76.7
A18112-101	59.2	84.2	60.4	86.0	66.0	63.5	71.5
A18273-17	54.6	91.9	63.1	83.2	63.2	66.9	66.5
A18321-3Y	43.0	88.5	60.3	76.6	71.9	64.4	69.0
A18325-2Y	68.1	82.5	65.7	84.6	72.1	66.0	71.0
A18372-90	61.4	88.2	61.2	79.1	62.4	60.0	62.3
E20078	45.4	77.8	56.0	68.0	66.1	70.2	76.9
E21100	59.2	103.1	65.3	83.4	74.3	64.4	71.6
LD18-4787F	53.1	96.2	69.1	94.3	66.1	69.2	73.3
M18-101011		74.4	36.3	85.0	59.6	50.0	57.1
M18-120071	43.1	91.3	55.1	88.5	66.4	57.0	70.0
M18-176012	40.8	67.7	49.2	75.7	67.5	52.6	58.9
M18-222040	56.1	68.5	55.2	62.4	61.1	46.6	62.4
M18-222071	54.4	61.2	29.2	63.7	57.7	47.7	52.7
M18-243061		74.0	57.5	81.6	52.8	47.7	65.0
OAC 22-33C-SCN	49.4	89.1	45.9	81.5	62.7	58.3	65.8
OAC 22-34C-SCN	55.1	80.8	49.4	61.5	66.5	59.6	56.3
ORC 3323	62.5	71.7	25.7	77.8	77.3	57.9	62.7
ORC 3523	38.6	81.0	41.3	74.2	69.0	56.4	52.6
ORC 4623	61.1	71.4	50.7	63.9	70.2	55.0	65.2
ORC 4723	48.2	63.6	46.5	66.2	73.3	55.7	70.1
ORC 5023	65.6	91.2	58.4	79.9	74.6	62.0	62.3
ORC 5822		51.9	52.7	72.2	65.3	53.1	67.6
Location Mean	54.5	80.6	52.3	77.0	66.6	58.9	65.1
C.V. (%)	15.1	9.8	12.5	8.2	7.9	7.0	11.6
L.S.D. (5%)	13.7	16.3	13.5	13.3	8.6	6.7	12.3
Row Sp. (In.)	30	30	30	30	13	13	20
Rows/Plot	4	4	4	4	4	4	3
Reps	3	2	2	2	3	3	3

\* Data not included in mean.

UNIFORM TEST I, 2024

YIELD RANK

Strain	Yield Rank	Sutherland IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamberton MN	Rosemount MN
MN1511CN (SCN) (I)	16	20	21	17	16	9	20	16
ND Dickey (0) (E)	23	6	18	25	26	25	15	22
MN1905CN (L)	7	5	10	4	4	5	12	8
E15338	10	7	8	11	10	24	9	7
A18103-8	8	13	7	8	5	21	11	3
A18112-101	3	18	9	1	1	3	1	1
A18273-17	5	9	5	2	13	4	3	11
A18321-3Y	9	17	12	13	12	16	7	6
A18325-2Y	4	19	3	10	11	14	2	5
A18372-90	12	15	11	14	7	6	8	10
E20078	11	3	2	5	8	19	17	9
E21100	2	2	4	9	2	1	6	3
LD18-4787F	1	1	1	7	9	2	4	2
M18-101011	24	25	22	24	23	8	19	26
M18-120071	13	21	13	6	3	18	18	19
M18-176012	22	23	24	18	27	22	13	18
M18-222040	25	11	19	21	20	26	16	25
M18-222071	27	22	26	25	22	23	25	27
M18-243061	17	26	15	12	25	20	26	23
OAC 22-33C-SCN	14	24	14	19	24	11	5	24
OAC 22-34C-SCN	18	14	23	20	19	10	24	21
ORC 3323	15	16	16	15	17	15	14	15
ORC 3523	21	12	20	23	18	17	23	20
ORC 4623	18	8	25	22	15	13	22	13
ORC 4723	26	27	27	27	14	27	21	14
ORC 5023	6	4	5	3	6	7	10	12
ORC 5822	20	10	17	16	21	12	27	17

**UNIFORM TEST I, 2024**

**YIELD RANK**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	2	20	11	11	26	21	24
ND Dickey (0) (E)	20	19	24	14	19	19	16
MN1905CN (L)	4	4	5	17	8	6	21
E15338	8	8	22	4	3	3	10
A18103-8	12	2	9	22	12	9	2
A18112-101	10	12	7	3	17	10	5
A18273-17	14	5	4	8	20	4	12
A18321-3Y	22	10	8	16	7	7	9
A18325-2Y	1	13	2	6	6	5	6
A18372-90	6	11	6	13	22	12	19
E20078	19	16	13	21	16	1	1
E21100	9	1	3	7	4	7	4
LD18-4787F	16	3	1	1	15	2	3
M18-101011		17	25	5	24	24	23
M18-120071	21	6	15	2	14	16	8
M18-176012	23	24	19	18	11	23	22
M18-222040	11	23	14	26	23	27	18
M18-222071	15	26	26	25	25	25	26
M18-243061		18	12	9	27	25	15
OAC 22-33C-SCN	17	9	21	10	21	14	13
OAC 22-34C-SCN	13	15	18	27	13	13	25
ORC 3323	5	21	27	15	1	15	17
ORC 3523	24	14	23	19	10	17	27
ORC 4623	7	22	17	24	9	20	14
ORC 4723	18	25	20	23	5	18	7
ORC 5023	3	7	10	12	2	11	19
ORC 5822		27	16	20	18	22	11

**UNIFORM TEST I, 2024**

**MATURITY (date)**

Strain	Mean 13 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	9/16	9/19	8/26	8/28	9/18		9/18	9/22
ND Dickey (0) (E)	-3	-1	-3	-2	-1		-6	-5
MN1905CN (L)	5	8	5	7	4		5	4
E15338	5	5	5	6	10		5	4
A18103-8	5	8	3	5	11		6	3
A18112-101	7	10	7	11	11		8	7
A18273-17	5	8	4	6	8		6	3
A18321-3Y	3	5	1	4	4		4	1
A18325-2Y	5	8	4	6	10		7	6
A18372-90	4	8	2	3	9		4	1
E20078	6	7	5	9	10		8	5
E21100	6	10	5	7	10		6	5
LD18-4787F	5	6	5	7	9		4	5
M18-101011	-3	-2	-3	-1	-3		-6	-6
M18-120071	4	5	6	6	9		5	3
M18-176012	0	1	-1	-1	-1		-1	-1
M18-222040	-1	0	0	-1	-1		-2	-2
M18-222071	-6	-4	-5	-6	-3		-8	-13
M18-243061	-1	-1	-3	-1	-1		-0	-1
OAC 22-33C-SCN	-0	-0	-1	-1	1		-1	-1
OAC 22-34C-SCN	-0	0	-2	1	-1		-2	-1
ORC 3323	2	5	3	3	0		2	4
ORC 3523	0	4	-1	1	1		-1	-1
ORC 4623	-1	1	-2	1	-1		-3	-2
ORC 4723	-0	-1	-1	-1	1		-1	-1
ORC 5023	5	9	5	6	7		7	4
ORC 5822	4	6	5	3	9		6	4
Date Planted	5/22	6/10	5/6	5/8	5/24		5/16	5/8
Days to Mature	117	101	112	112	117		125	137

**UNIFORM TEST I, 2024**

**MATURITY (date)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	9/18	9/19	9/9	9/12	9/23	10/3	9/30
ND Dickey (0) (E)	-3	-3	-5	-2	2	-5	-3
MN1905CN (L)	3	4	7	9	7	1	2
E15338	2	4	6	6	6	0	2
A18103-8	2	5	4	8	7	-3	2
A18112-101	8	8	9	9	7	-4	4
A18273-17	5	4	6	8	9	-2	4
A18321-3Y	2	1	2	6	9	0	2
A18325-2Y	4	4	5	8	7	1	3
A18372-90	4	1	4	8	7	-1	1
E20078	4	3	6	8	8	7	2
E21100	5	5	5	7	8	-1	3
LD18-4787F	7	4	8	5	7	-5	2
M18-101011	-5	-3	-5	0	-2	-3	-3
M18-120071	5	3	4	5	8	-5	2
M18-176012	3	0	-2	3	6	-3	-2
M18-222040	-2	-4	-3	2	4	-5	-6
M18-222071	-8	-5	-7	-4	-4	-7	-9
M18-243061	-1	-1	1	0	0	-7	-4
OAC 22-33C-SCN	-2	-1	-2	5	2	-3	-1
OAC 22-34C-SCN	-2	-2	-1	3	3	-2	0
ORC 3323	4	0	1	3	8	-3	2
ORC 3523	2	0	-3	6	4	-4	-2
ORC 4623	-0	-3	0	-2	3	-4	0
ORC 4723	1	-1	-3	3	6	-6	-0
ORC 5023	6	5	6	6	9	-2	2
ORC 5822	8	4	3	8	7	-4	2
Date Planted	5/20	5/28	5/18	5/29	6/1	6/11	5/21
Days to Mature	121	114	114	106	114	114	132

**UNIFORM TEST I, 2024**

**LODGING (score)**

Strain	Mean 14 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	1.5	1.0	1.5	2.5	1.0	1.0	1.0	1.7
ND Dickey (0) (E)	1.4	1.0	1.5	2.0	1.0	1.0	1.0	2.3
MN1905CN (L)	1.7	1.0	1.5	2.5	1.5	1.0	1.0	2.3
E15338	2.0	1.0	2.0	3.0	2.0	1.0	1.3	2.7
A18103-8	1.4	1.0	1.0	1.5	1.5	1.0	1.0	1.3
A18112-101	1.3	1.0	1.5	2.0	1.5	1.0	1.0	1.3
A18273-17	1.2	1.0	1.5	2.0	1.0	1.0	1.0	1.0
A18321-3Y	1.5	1.0	1.5	2.5	1.0	1.0	1.0	2.0
A18325-2Y	1.4	1.0	1.0	2.0	1.5	1.0	1.0	1.7
A18372-90	1.7	1.0	1.5	2.5	2.0	1.0	1.0	2.0
E20078	1.7	1.0	2.0	2.5	2.0	1.0	1.0	2.0
E21100	1.5	1.0	2.0	2.0	1.5	1.0	1.0	2.0
LD18-4787F	1.5	1.0	1.0	2.0	1.0	1.0	1.0	2.3
M18-101011	1.3	1.0	1.0	2.5	1.0	1.0	1.0	1.7
M18-120071	1.3	1.0	1.0	2.0	1.0	1.0	1.0	2.0
M18-176012	1.3	1.0	1.5	2.0	1.0	1.0	1.0	1.7
M18-222040	1.3	1.0	2.0	2.0	1.0	1.0	1.0	1.7
M18-222071	1.8	1.0	1.5	3.5	1.0	1.0	1.0	3.0
M18-243061	1.4	1.0	1.5	2.0	1.0	1.0	1.0	2.0
OAC 22-33C-SCN	1.5	1.0	1.5	2.0	1.0	1.0	1.0	2.3
OAC 22-34C-SCN	1.7	1.0	2.0	3.0	1.0	1.0	1.0	2.3
ORC 3323	1.4	1.0	1.0	2.0	1.0	1.0	1.0	2.3
ORC 3523	1.2	1.0	1.0	2.0	1.0	1.0	1.0	1.7
ORC 4623	1.6	1.0	2.0	2.5	1.0	1.0	1.0	2.0
ORC 4723	1.2	1.0	1.0	2.0	1.0	1.0	1.0	2.0
ORC 5023	1.7	1.0	1.5	3.0	1.5	1.0	1.0	2.0
ORC 5822	1.5	1.0	1.5	2.0	1.5	1.0	1.0	2.3

**UNIFORM TEST I, 2024**

**LODGING (score)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	2.0	1.8	1.5	1.5	1.2	1.0	1.7
ND Dickey (0) (E)	2.0	1.0	1.5	1.5	1.0	1.0	2.0
MN1905CN (L)	2.0	1.3	1.5	2.0	1.3	1.0	3.7
E15338	2.3	1.8	2.5	2.0	2.5	1.0	2.3
A18103-8	2.0	1.0	2.0	2.0	1.0	1.0	1.7
A18112-101	2.0	1.0	1.0	1.5	1.0	1.0	2.0
A18273-17	2.0	1.0	1.0	1.5	1.0	1.0	1.3
A18321-3Y	2.0	1.0	1.5	1.0	2.0	1.0	2.0
A18325-2Y	2.0	1.0	1.0	2.0	1.2	1.0	2.0
A18372-90	2.0	1.3	2.0	2.5	1.3	1.0	2.0
E20078	2.3	1.3	2.0	1.5	1.7	1.0	3.0
E21100	2.0	1.0	1.0	2.0	1.3	1.0	1.7
LD18-4787F	2.0	1.0	2.0	2.5	1.2	1.0	2.3
M18-101011	1.3	1.0	1.5	1.0	1.2	1.0	1.3
M18-120071	2.3	1.0	1.0	1.0	1.0	1.0	1.7
M18-176012	2.0	1.0	1.5	1.0	1.2	1.0	1.0
M18-222040	2.0	1.3	1.5	1.0	1.0	1.0	1.3
M18-222071	2.0	1.8	2.5	2.5	1.0	1.0	2.0
M18-243061	2.3	1.0	1.5	1.0	1.2	1.0	1.7
OAC 22-33C-SCN	1.3	1.0	1.0	2.0	2.5	1.0	1.7
OAC 22-34C-SCN	2.0	1.0	2.0	3.0	1.3	1.0	1.7
ORC 3323	2.0	1.0	2.0	1.5	1.3	1.0	2.0
ORC 3523	1.7	1.0	1.5	1.0	1.2	1.0	1.0
ORC 4623	2.0	2.0	2.0	1.5	1.5	1.0	1.7
ORC 4723	2.0	1.0	1.0	1.0	1.3	1.0	1.0
ORC 5023	2.0	1.0	3.0	1.5	1.5	1.0	2.3
ORC 5822	3.0	1.0	1.0	1.0	1.0	1.0	2.0

**UNIFORM TEST I, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 14 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	34	28	35	33	33	34	33	31
ND Dickey (0) (E)	29	25	31	27	27	26	31	29
MN1905CN (L)	34	29	33	33	32	32	34	33
E15338	34	27	33	33	35	33	33	33
A18103-8	29	23	30	31	30	27	28	28
A18112-101	31	22	31	32	33	32	30	28
A18273-17	32	27	34	34	31	31	31	30
A18321-3Y	32	28	30	32	31	30	30	33
A18325-2Y	32	24	32	34	32	27	29	30
A18372-90	31	24	31	31	32	32	30	30
E20078	38	33	39	39	40	36	36	36
E21100	33	28	33	33	34	32	31	32
LD18-4787F	30	24	30	33	30	29	32	30
M18-101011	29	23	30	28	29	28	29	28
M18-120071	28	23	27	29	27	27	28	26
M18-176012	31	25	30	30	26	35	29	30
M18-222040	29	27	31	29	31	25	28	27
M18-222071	25	22	26	24	25	25	24	24
M18-243061	28	20	30	30	28	26	22	29
OAC 22-33C-SCN	26	21	31	22	24	27	26	26
OAC 22-34C-SCN	32	25	32	32	34	27	31	32
ORC 3323	32	27	31	33	33	32	31	34
ORC 3523	31	27	30	28	32	34	29	29
ORC 4623	34	27	34	33	36	36	32	32
ORC 4723	28	20	27	26	28	26	29	27
ORC 5023	32	25	32	31	31	32	31	30
ORC 5822	29	24	28	30	31	31	26	27

**UNIFORM TEST I, 2024**

**PLANT HEIGHT (inches)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	33	40	32	37	35	35	39
ND Dickey (0) (E)	24	33	25	33	31	28	34
MN1905CN (L)	30	37	32	38	36	34	40
E15338	31	38	29	37	39	33	40
A18103-8	23	33	27	33	35	30	35
A18112-101	25	35	31	36	31	29	36
A18273-17	25	35	31	34	34	31	37
A18321-3Y	25	38	26	35	40	33	41
A18325-2Y	29	36	28	36	36	34	39
A18372-90	27	37	27	33	35	32	35
E20078	25	45	37	41	40	40	44
E21100	27	37	31	35	36	32	36
LD18-4787F	25	33	29	32	33	28	35
M18-101011	19	35	27	35	34	30	36
M18-120071	20	31	26	32	34	28	35
M18-176012	26	41	31	29	34	30	35
M18-222040	24	35	27	32	32	28	34
M18-222071	22	29	24	27	29	26	30
M18-243061	20	31	27	33	30	26	36
OAC 22-33C-SCN	22	32	22	26	32	30	29
OAC 22-34C-SCN	29	34	29	36	35	31	38
ORC 3323	32	34	30	31	36	30	39
ORC 3523	26	34	25	36	38	29	36
ORC 4623	30	37	30	37	41	29	42
ORC 4723	23	31	24	30	36	27	35
ORC 5023	30	33	30	35	36	31	39
ORC 5822	20	30	25	34	32	29	37

**UNIFORM TEST I, 2024**

**SEED SIZE (g/100)**

Strain	Mean 13 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	14.7	13.1	13.9	15.6	13.8	14.0	14.9	14.4
ND Dickey (0) (E)	17.4	16.3	18.4	19.4	16.0	16.1	18.9	17.1
MN1905CN (L)	17.1	15.4	15.5	17.1	15.7	15.9	17.9	17.1
E15338	16.5	15.0	15.6	17.0	14.3	15.3	17.4	16.0
A18103-8	15.5	13.5	15.1	16.3	14.7	14.4	15.5	15.1
A18112-101	13.9	12.3	12.5	13.8	13.8	13.4	14.0	13.2
A18273-17	16.7	15.5	15.9	17.4	15.1	16.2	18.0	15.8
A18321-3Y	17.3	15.5	17.2	18.5	15.4	16.0	18.3	17.1
A18325-2Y	18.0	16.5	17.3	18.2	16.5	16.5	19.0	17.8
A18372-90	17.8	16.4	17.4	18.5	15.9	15.2	19.9	18.7
E20078	16.2	15.3	14.5	16.9	15.2	14.8	16.6	16.0
E21100	16.9	16.0	15.8	17.7	16.3	16.9	16.9	16.7
LD18-4787F	17.2	15.9	16.3	16.7	15.6	15.5	18.7	17.4
M18-101011	16.0	14.1	17.7	18.6	14.8	14.3	15.9	15.5
M18-120071	14.6	13.1	14.0	15.3	13.7	13.6	14.7	13.8
M18-176012	19.0	17.0	19.2	21.4	15.8	18.0	20.0	18.6
M18-222040	15.8	14.8	16.1	16.9	14.3	13.8	16.4	15.7
M18-222071	14.7	13.9	15.7	15.6	14.2	13.0	14.8	13.9
M18-243061	16.5	15.3	15.4	18.0	14.7	15.3	17.3	15.8
OAC 22-33C-SCN	17.3	15.1	17.8	18.8	15.7	16.4	18.3	17.0
OAC 22-34C-SCN	17.5	16.7	15.8	18.4	16.4	17.2	18.2	17.0
ORC 3323	17.8	16.0	16.2	17.9	16.8	16.7	19.0	18.1
ORC 3523	23.3	23.3	21.6	24.9	22.0	21.7	23.2	24.2
ORC 4623	19.0	17.8	19.0	20.8	18.0	17.7	18.6	18.7
ORC 4723	20.5	18.9	20.1	21.6	18.2	19.7	21.8	19.9
ORC 5023	18.4	17.2	17.1	19.0	17.3	17.8	18.9	18.6
ORC 5822	19.2	19.1	18.4	20.6	17.5	18.6	19.6	18.3

**UNIFORM TEST I, 2024**

**SEED SIZE (g/100)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	15.2	17.0	15.5		14.3	14.6	15.0
ND Dickey (0) (E)	16.6	17.5	17.2		17.7	16.8	17.9
MN1905CN (L)	16.1	18.4	17.1		18.3	19.3	18.1
E15338	15.6	16.7	17.0		18.5	18.5	17.3
A18103-8	14.6	16.3	15.6		16.4	17.5	16.4
A18112-101	13.9	13.5	13.1		15.4	15.9	16.3
A18273-17	15.2	17.6	16.4		17.8	18.1	17.6
A18321-3Y	15.4	18.3	17.2		18.8	18.6	18.1
A18325-2Y	16.9	18.3	17.9		20.0	19.8	18.7
A18372-90	17.3	19.0	18.4		18.9	17.6	18.0
E20078	14.9	16.4	15.5		17.8	19.4	17.5
E21100	15.5	17.2	14.9		19.7	19.3	17.0
LD18-4787F	15.8	18.0	16.3		19.0	18.3	19.5
M18-101011	15.5	17.3	16.5		15.1	15.9	17.0
M18-120071	13.4	16.1	13.8		16.2	16.6	15.6
M18-176012	17.2	19.5	18.9		19.5	21.1	20.3
M18-222040	15.7	16.4	14.6		15.5	18.0	17.0
M18-222071	14.5	15.5	15.2		14.1	15.7	14.8
M18-243061	15.5	17.6	16.3		17.4	18.1	17.8
OAC 22-33C-SCN	16.4	19.0	18.1		16.2	19.0	17.2
OAC 22-34C-SCN	16.2	17.9	16.4		18.2	20.0	18.9
ORC 3323	17.4	17.1	15.5		19.6	20.9	20.0
ORC 3523	21.9	23.6	22.7		24.9	25.5	23.7
ORC 4623	18.7	19.9	18.9		19.3	20.0	19.8
ORC 4723	19.6	21.5	20.3		21.3	21.7	21.3
ORC 5023	17.3	18.7	17.5		20.3	20.3	19.6
ORC 5822	17.8	19.6	19.4		19.2	20.3	21.2

**UNIFORM TEST I, 2024**

**SEED QUALITY (score)**

Strain	Mean 13 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	1.4	1.0	1.0	1.0	1.5	2.5	1.0	1.0
ND Dickey (0) (E)	1.4	1.0	2.0	1.5	1.5	2.0	2.0	1.0
MN1905CN (L)	1.4	1.0	1.0	1.5	1.0	2.0	2.0	1.0
E15338	1.5	1.0	1.0	1.0	2.0	2.5	2.0	1.0
A18103-8	1.3	1.0	1.0	1.0	1.0	2.5	2.0	1.0
A18112-101	1.5	1.0	1.0	1.5	1.5	2.0	2.0	1.0
A18273-17	1.3	1.0	2.0	1.0	1.0	2.0	1.0	1.0
A18321-3Y	1.3	1.0	1.0	1.0	1.5	2.0	2.0	1.0
A18325-2Y	1.4	1.0	1.0	1.0	1.5	2.5	2.0	1.0
A18372-90	1.6	1.0	1.0	2.0	1.5	3.0	2.0	1.0
E20078	1.4	1.0	1.5	1.0	1.0	2.5	2.0	1.0
E21100	1.5	1.0	1.0	1.0	1.5	3.0	2.0	1.0
LD18-4787F	1.3	1.0	1.0	1.0	1.0	2.5	2.0	1.0
M18-101011	1.6	1.0	1.5	1.5	1.0	3.0	2.0	1.0
M18-120071	1.5	1.0	1.0	2.0	1.0	2.0	1.0	1.0
M18-176012	1.8	1.0	1.5	2.0	1.0	2.5	2.0	2.0
M18-222040	1.7	1.0	1.5	1.5	2.0	3.0	1.0	1.0
M18-222071	1.3	1.0	1.5	1.0	1.5	1.9	1.0	1.0
M18-243061	1.4	1.0	1.0	1.0	1.0	2.5	2.0	1.0
OAC 22-33C-SCN	1.4	1.0	1.0	1.0	1.0	3.5	1.0	1.0
OAC 22-34C-SCN	1.6	1.0	1.0	1.5	2.5	3.5	1.0	1.0
ORC 3323	1.3	1.0	1.0	1.0	1.0	2.5	2.0	1.0
ORC 3523	1.6	1.0	1.0	1.5	2.5	2.0	2.0	2.0
ORC 4623	1.6	1.0	1.0	1.0	2.5	3.0	2.0	2.0
ORC 4723	1.7	1.0	1.0	1.0	1.5	3.0	2.0	2.0
ORC 5023	1.3	1.0	1.0	1.0	1.0	2.0	1.0	1.0
ORC 5822	1.5	1.0	1.0	1.0	1.0	3.0	2.0	1.0

**UNIFORM TEST I, 2024**

**SEED QUALITY (score)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE
MN1511CN (SCN) (I)	1.0	2.0	1.0		1.5	1.5	2.7
ND Dickey (0) (E)	1.0	1.0	1.0		1.0	1.5	2.0
MN1905CN (L)	1.0	1.0	1.0		1.5	1.5	2.7
E15338	1.0	1.0	1.0		1.5	1.5	2.7
A18103-8	1.0	1.0	1.0		1.5	1.5	2.0
A18112-101	1.0	1.0	1.0		2.0	1.5	2.7
A18273-17	1.0	1.0	1.0		1.0	1.5	2.0
A18321-3Y	1.0	1.0	1.0		1.5	1.5	2.0
A18325-2Y	1.0	1.0	1.0		1.5	1.5	2.0
A18372-90	1.0	1.0	1.0		1.5	1.5	3.0
E20078	1.0	1.0	1.0		1.5	1.5	2.3
E21100	1.0	1.0	1.0		1.5	1.5	2.7
LD18-4787F	1.0	1.0	1.0		1.5	1.5	2.0
M18-101011	2.0	1.0	1.0		1.5	1.5	2.3
M18-120071	2.0	1.0	1.0		2.0	1.5	2.7
M18-176012	2.0	2.0	1.0		1.5	1.5	3.0
M18-222040	2.0	2.0	1.0		2.0	1.5	2.7
M18-222071	1.0	1.0	1.0		1.5	1.5	2.0
M18-243061	2.0	1.0	1.0		1.5	1.5	2.3
OAC 22-33C-SCN	1.0	1.0	1.0		1.5	1.5	2.3
OAC 22-34C-SCN	1.0	1.0	1.0		1.5	1.5	3.0
ORC 3323	1.0	1.0	1.0		1.0	1.5	2.0
ORC 3523	1.0	1.0	1.0		1.5	1.5	3.0
ORC 4623	1.0	1.5	1.0		1.5	1.5	2.0
ORC 4723	2.0	1.0	1.0		2.0	1.5	3.0
ORC 5023	1.0	1.0	1.0		1.5	1.5	2.3
ORC 5822	2.0	1.0	1.0		1.5	1.5	2.3

**UNIFORM TEST I, 2024**

**PROTEIN (%)**

Strain	Mean 12 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	34.0	33.6	33.4	33.9	34.6		33.0	33.9
ND Dickey (0) (E)	35.0	35.1	35.6	36.0	34.7		34.6	34.7
MN1905CN (L)	34.7	34.2	33.5	33.4	35.0		34.1	35.8
E15338	33.9	33.3	32.9	34.7	32.8		33.4	33.5
A18103-8	35.1	34.8	35.1	35.8	35.8		34.3	36.2
A18112-101	34.2	34.0	34.2	34.3	34.5		33.2	33.4
A18273-17	34.8	34.7	34.7	35.1	35.2		34.6	35.7
A18321-3Y	36.7	36.3	36.0	36.5	36.5		37.1	36.6
A18325-2Y	36.5	34.9	36.3	37.3	38.4		34.1	37.5
A18372-90	37.1	36.1	35.9	37.4	37.4		37.6	37.5
E20078	34.4	34.7	33.9	35.4	33.6		34.2	35.0
E21100	33.4	32.9	32.7	33.6	34.0		33.3	32.9
LD18-4787F	34.3	33.7	32.2	35.2	33.7		35.4	34.9
M18-101011	36.0	35.8	37.0	38.1	35.8		35.3	36.5
M18-120071	34.2	34.5	33.7	34.6	33.8		33.4	34.6
M18-176012	36.4	37.1	36.4	37.7	35.8		35.0	37.2
M18-222040	35.3	35.3	35.3	36.7	34.8		34.9	35.7
M18-222071	34.7	35.2	35.5	37.1	35.1		33.2	33.8
M18-243061	34.3	35.1	34.1	35.5	33.7		33.2	34.6
OAC 22-33C-SCN	35.3	35.8	34.4	36.7	34.5		35.7	35.4
OAC 22-34C-SCN	36.5	37.0	36.4	37.7	35.5		35.3	36.6
ORC 3323	36.1	35.9	35.2	36.8	35.0		36.4	36.9
ORC 3523	36.7	36.4	38.1	38.2	34.8		35.9	36.9
ORC 4623	35.9	35.8	35.8	37.2	34.1		36.7	35.2
ORC 4723	36.6	36.9	36.8	37.2	35.9		36.1	36.2
ORC 5023	35.0	34.3	34.6	34.8	36.4		35.2	35.3
ORC 5822	35.7	35.8	35.3	37.0	36.3		35.8	35.4

\* Data adjusted to 13% moisture.

**UNIFORM TEST I, 2024**

**PROTEIN (%)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE*
MN1511CN (SCN) (I)	32.2	34.8	33.6		36.4	34.2	34.7
ND Dickey (0) (E)	33.8	34.1	36.2		35.8	34.9	35.0
MN1905CN (L)	33.5	34.0	35.0		36.8	35.7	35.3
E15338	33.7	34.2	33.8		35.9	34.2	34.5
A18103-8	34.7	33.9	34.5		36.2	35.1	35.2
A18112-101	32.6	33.1	34.2		37.1	35.1	34.5
A18273-17	32.4	33.9	34.5		36.7	34.9	34.7
A18321-3Y	35.7	37.3	36.3		38.4	36.8	36.4
A18325-2Y	36.4	36.2	36.0		38.4	36.2	35.9
A18372-90	37.3	35.4	36.1		39.3	37.9	36.9
E20078	33.3	34.4	33.9		36.6	33.9	34.4
E21100	32.4	33.0	33.1		36.2	33.9	33.2
LD18-4787F	33.7	34.0	33.1		36.4	34.4	34.8
M18-101011	35.0	36.2	36.0		36.0	35.6	34.8
M18-120071	34.9	33.3	33.1		34.7	34.5	34.7
M18-176012	34.7	35.6	36.2		37.6	37.4	36.3
M18-222040	35.3	34.9	34.3		36.1	35.5	34.8
M18-222071	32.6	34.2	35.4		34.2	35.4	34.4
M18-243061	33.5	34.2	34.9		34.1	33.8	34.5
OAC 22-33C-SCN	34.5	35.7	35.8		35.6	34.4	35.2
OAC 22-34C-SCN	35.2	36.3	36.4		37.4	37.5	36.4
ORC 3323	36.0	35.9	36.9		37.8	35.3	35.6
ORC 3523	35.7	36.5	36.7		37.8	36.3	37.0
ORC 4623	34.6	36.3	36.3		36.6	35.7	36.7
ORC 4723	36.4	36.4	35.8		37.9	36.3	37.5
ORC 5023	33.0	34.3	35.3		37.3	34.6	35.4
ORC 5822	35.1	32.9	35.9		36.4	36.1	36.7

\* Data adjusted to 13% moisture.

**UNIFORM TEST I, 2024**

**OIL (%)**

Strain	Mean 12 Tests	Suther- land IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- mount MN
MN1511CN (SCN) (I)	18.9	19.8	19.7	19.9	18.7		19.4	19.0
ND Dickey (0) (E)	18.3	18.5	19.3	19.1	18.6		18.4	18.5
MN1905CN (L)	19.2	20.2	20.5	20.2	19.2		20.3	19.1
E15338	19.0	19.9	20.1	19.9	19.6		19.3	19.4
A18103-8	19.0	20.0	20.3	20.0	18.7		19.8	18.8
A18112-101	18.7	19.3	19.5	19.3	18.6		19.8	19.1
A18273-17	18.6	19.2	19.6	19.4	18.8		19.1	18.6
A18321-3Y	18.0	18.5	19.1	19.3	18.3		17.8	18.3
A18325-2Y	18.0	19.2	18.6	18.9	18.5		18.7	18.0
A18372-90	17.6	18.3	19.1	18.5	17.1		17.7	17.8
E20078	19.2	19.7	20.0	20.2	19.8		20.0	19.0
E21100	18.8	19.8	20.1	19.9	19.0		19.4	19.0
LD18-4787F	18.0	18.6	19.3	18.9	18.5		18.5	17.8
M18-101011	17.7	18.4	17.8	18.2	17.8		18.0	17.4
M18-120071	19.1	19.7	19.9	19.8	19.1		19.6	19.1
M18-176012	18.3	18.9	18.8	19.1	18.6		18.9	18.2
M18-222040	18.2	18.9	18.6	18.5	18.8		18.6	17.8
M18-222071	18.4	19.0	18.3	18.3	18.6		19.0	18.4
M18-243061	19.4	19.9	19.7	19.9	19.8		20.0	19.2
OAC 22-33C-SCN	19.1	19.8	20.1	19.3	19.8		19.3	19.2
OAC 22-34C-SCN	18.0	18.3	18.7	18.7	18.8		18.9	18.1
ORC 3323	18.2	18.8	19.3	19.0	19.5		18.8	18.1
ORC 3523	18.3	19.3	18.6	18.4	18.7		18.9	18.2
ORC 4623	18.6	19.3	19.3	18.9	19.6		19.4	18.8
ORC 4723	17.6	18.1	18.4	18.4	17.9		17.7	17.6
ORC 5023	19.2	20.0	20.2	20.2	18.7		19.7	19.3
ORC 5822	17.6	17.9	18.6	18.8	17.3		17.9	17.7

\* Data adjusted to 13% moisture.

**UNIFORM TEST I, 2024**

**OIL (%)**

Strain	Waseca MN	Cotes- field NE	Mead NE	Phillips NE	St. Marys ONT	Wood- stock ONT	Saint Hyacinthe QUE*
MN1511CN (SCN) (I)	20.1	18.6	19.2		17.7	18.6	16.2
ND Dickey (0) (E)	18.8	19.1	18.6		17.3	17.8	16.0
MN1905CN (L)	19.7	19.3	20.0		17.8	18.1	16.2
E15338	19.1	18.9	19.7		17.5	18.4	15.5
A18103-8	19.6	19.3	19.6		18.1	18.1	16.2
A18112-101	19.5	18.8	19.5		17.5	17.7	16.3
A18273-17	19.1	18.9	19.3		17.5	17.7	15.6
A18321-3Y	18.9	18.2	18.7		16.6	17.1	15.3
A18325-2Y	18.2	18.3	18.4		16.6	17.5	15.4
A18372-90	18.1	16.9	19.1		16.1	17.5	15.0
E20078	19.8	19.1	20.3		18.1	18.3	16.1
E21100	19.3	18.6	19.6		17.1	18.3	15.9
LD18-4787F	18.4	17.9	18.6		17.1	17.3	15.2
M18-101011	18.3	17.5	18.1		17.6	17.4	15.9
M18-120071	19.4	19.6	20.1		18.1	18.2	16.6
M18-176012	19.4	18.7	19.1		17.4	17.3	15.7
M18-222040	18.4	18.3	19.0		17.7	17.9	16.1
M18-222071	19.3	18.5	19.0		18.1	17.9	16.0
M18-243061	20.2	19.5	19.9		19.0	19.2	16.5
OAC 22-33C-SCN	19.8	19.2	20.0		18.4	18.6	16.3
OAC 22-34C-SCN	18.7	18.2	18.8		17.0	16.9	15.4
ORC 3323	18.6	18.0	17.9		17.1	17.9	15.5
ORC 3523	19.1	18.7	19.6		17.4	17.8	15.4
ORC 4623	19.1	18.2	18.6		17.9	18.0	15.8
ORC 4723	18.0	17.5	18.5		16.4	17.1	15.1
ORC 5023	19.5	19.3	19.8		18.1	18.9	16.1
ORC 5822	18.4	18.1	18.3		16.7	16.8	14.9

\* Data adjusted to 13% moisture.

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**Northern Regional Uniform Test  
Uniform Test II, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	IA2102 (II)	A04-545045	AgriPro 98180-A01-0613	Cai	12	F4	
2	LD17-2558 (SCN)	U11-614119	LD09-30224	Monteverde	3	F5	SCN
3	MN1905CN (E)	M08-365038	IA1026	Lorenz	23 SCN UI	F9	Yld, SCN
4	U14-910097 (SCN) (L)	U09-105007	LD07-3419	Graef	7	F5	SCN (HR, HR)
5	A16373-82	LD11-2170 / LD07-3395bf (SCN)	IA3027LFRA12	Singh	23 UT III	F5	SCN, Rps1k
6	A16373-101	LD11-2170 / LD07-3395bf (SCN)	IA3027LFRA12	Singh	23 UT III	F5	SCN, Rps1k
7	A17107-95	DSN11-12073	U13-931068	Singh	23 PT II A		Rps1c
8	A17112-19	U14-924158	U14-910097	Singh	23 PT III A	F5	
9	A17112-34	U14-924158	U14-910097	Singh	23 PT III A	F5	
10	A17112-72	U14-924158	U14-910097	Singh	23 PT II A		
11	A17112-202	U14-924158	U14-910097	Singh	23 PT III A	F5	
12	A17437-29	U14-924158	LD14-00870	Singh	23 PT II A		Rps1a
13	A17438-64	LD14-06407	U14-924158	Singh	23 PT II A		
14	CR184590	U09-133021	AR11-214001	Rainey	2	F6	Rps1k
15	CR190377	DS11-15020	PI417015	Rainey	1	F5	SCN
16	CR193835	DS11-15083	DS11-42127	Rainey	1	F5	Rps1k, SCN
17	CR20-1893			Rainey	23 PT II B		
18	CR20-5419			Rainey	23 PT II B		SCN
19	E20329	LD02-4485	E14077	Wang	1	F5	SCN, Rps1k
20	E20333	LD02-4485	E14077	Wang	1	F5	SCN, H-Rps1k
21	E20355	LD10-10198	E14077	Wang	1	F5	SCN, H-Rps1k
22	E21107	LD02-4485	E14077	Wang	23 PT II A	F5	SCN, Rps1
23	E21109	LD02-4485	E14077	Wang	23 PT II A	F5	SCN, Rps1
24	E21118	LD10-10198	E14077	Wang	23 PT II A	F5	SCN, H-Rps1a+H-Rps1k
25	E21125	M07-209037	PI 567425B	Wang	23 PT II A	F5	SCN, Rps1
26	E21127	M07-209037	PI 567425B	Wang	23 PT II A	F5	Rps1a
27	E21345	LD10-10198	E18902	Wang	23 PT II A	F5	Rps1a
28	LD19-7145	LD12-459	LD11-2170	Monteverde	1	F5	SCN, Rps1k
29	LD19-7165	LD12-459	LD11-2170	Monteverde	1	F5	SCN
30	LD20-0815	LD12-459	LD11-2170	Monteverde	23 PT II B	F5	SCN, Rps1k
31	LD20-11062	LD10-10198	LD15-5776793	Monteverde	23 PT II B	F5	SCN, Rps1c
32	LD20-4471	U14-925152	U11-917032	Monteverde	23 SCN PII	F5	SCN (rhg1,4)
33	LD20-4988	U14-910097	LD11-2170	Monteverde	23 SCN UII	F5	SCN (rhg1), Rps1k
34	LD20-5172	LD14-6099a	LD11-2170	Monteverde	23 PT II B	F5	SCN, Rps1k
35	U19-204054	U14-910097	U16-905090	Graef	23 PT II B	F5	SCN, H-Rps1k+H-Rps6
36	U19-230043	U14-925152	U16-905090	Graef	23 PT II B	F5	SCN, Rps1k
37	U20-908101	U14-910097	U16-928123	Graef	1	F5	IDC, SCN, H-Rps1c
38	U20-910082	U14-910097	U16-932015	Graef	1	F5	IDC, SCN, Rps6
39	U20-917147	U14-206326	U16-932015	Graef	23 PT II B	F5	IDC, Rps6
40	U20-928077	U14-206326	U14-219257	Graef	23 PT II B	F5	SCN, IDC

**UNIFORM TEST II, 2024**  
**DESCRIPTIVE AND DISEASE DATA**

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Strain	Descriptive Code
IA2102 (II)	WGTDYYI
LD17-2558 (SCN)	PGBSYIbI
MN1905CN (E)	PTBDYYI
U14-910097 (SCN) (L)	PGTDYBfI
A16373-82	PLtBDYBrI
A16373-101	PLtBDYBrI
A17107-95	P+WLtBDYBI
A17112-19	PGTSYIbI
A17112-34	PGTDYIbI
A17112-72	PGTDYBfI
A17112-202	PGTSYIbI
A17437-29	PLtTSYBI
A17438-64	PTTDYBI
CR184590	PTBSYBI
CR190377	WGTDYBfI
CR193835	PGBSYBfI
CR20-1893	WLtTSYBI
CR20-5419	PGBSYIbI
E20329	PLt+GBDYHI
E20333	PTBSYBI
E20355	PGBSYGI
E21107	PGBDYBfI
E21109	PLt+GBSYHI
E21118	PT+GBSYHI
E21125	PLtTSYBrI
E21127	P+WLtTSYBrI
E21345	PLtTSYBrI
LD19-7145	PLtBDYBrI
LD19-7165	PLtBSYBI
LD20-0815	PLtBSYBI
LD20-11062	PGBDYYI
LD20-4471	PLtBSYBI
LD20-4988	PLtBDYBrI
LD20-5172	PGBDYBfI
U19-204054	PGTDYIbI
U19-230043	PLtBSYBI
U20-908101	PLtBDYBrI
U20-910082	WLtTDYBrI
U20-917147	WLtBDYBrI
U20-928077	WLtTDYBI

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**UNIFORM TEST II, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield 13 bu/a	Rank 13 No.	Maturity 12 Date	Lodging 12 Score	Plant Height 11 In.	Seed Size 12 g/100	Seed Quality 11 Score	<u>Composition</u>	
								Protein 12 %	Oil 12 %
IA2102 (II)	70.1	33	9/19	2.3	36	15.9	1.2	33.9	19.3
LD17-2558 (SCN)	74.4	17	3.1	1.5	36	16.1	1.1	32.9	19.9
MN1905CN (E)	68.5	37	-3.6	1.8	34	16.4	1.4	34.1	20.1
U14-910097 (SCN) (L)	76.5	6	6.6	1.9	34	14.8	1.0	32.7	20.5
A16373-82	74.2	19	4.9	1.3	34	15.1	1.1	34.0	20.1
A16373-101	72.9	26	5.1	1.5	35	15.2	1.2	33.9	20.1
A17107-95	73.6	22	1.7	1.2	32	16.2	1.2	33.0	19.9
A17112-19	80.4	2	4.1	1.1	32	14.8	1.1	30.6	21.2
A17112-34	81.1	1	4.1	1.2	32	14.1	1.3	31.0	20.8
A17112-72	75.9	7	1.3	1.2	31	16.5	1.2	32.5	20.7
A17112-202	79.4	3	4.8	1.6	35	14.3	1.1	30.9	20.8
A17437-29	71.9	30	5.4	1.3	34	15.5	1.1	32.3	19.5
A17438-64	76.7	5	3.5	1.4	37	15.4	1.1	31.8	20.9
CR184590	70.0	34	2.7	1.6	38	15.0	1.2	34.4	19.5
CR190377	66.0	39	3.3	2.1	37	13.7	1.2	32.0	20.1
CR193835	70.8	32	0.1	1.4	32	14.3	1.1	32.1	20.8
CR20-1893	67.6	38	6.5	2.0	38	14.2	1.1	33.6	20.0
CR20-5419	71.2	31	4.2	1.6	35	14.1	1.3	33.0	18.9
E20329	75.5	11	1.5	1.6	35	14.9	1.3	32.6	20.0
E20333	69.3	36	2.1	1.8	38	15.0	1.2	32.4	20.2
E20355	71.9*	30*	4.2	1.6	38	15.3	1.3	33.4	19.6
E21107	74.1	20	4.0	1.7	34	14.8	1.1	32.9	19.8
E21109	75.6	10	1.5	1.4	35	15.6	1.3	33.3	19.4
E21118	74.6	15	4.3	1.2	35	13.8	1.2	34.1	18.9
E21125	75.7	9	0.6	1.6	35	15.0	1.0	33.7	19.3
E21127	75.7	8	0.7	1.7	35	15.0	1.2	33.9	19.1
E21345	73.8	21	0.6	1.6	35	15.1	1.1	33.9	19.2
LD19-7145	74.8	14	2.0	1.1	30	15.0	1.2	33.4	19.5
LD19-7165	69.6	35	3.5	1.1	32	15.2	1.2	32.8	20.1
LD20-0815	75.0	13	1.2	1.3	34	15.3	1.1	32.4	20.7
LD20-11062	74.3	18	1.4	1.2	32	14.1	1.1	33.1	20.1
LD20-4471	73.5	24	5.1	1.7	33	15.3	1.1	32.2	20.8
LD20-4988	74.4	16	2.8	1.4	33	15.4	1.1	33.5	20.2
LD20-5172	72.0	29	1.5	1.1	32	15.2	1.1	32.0	20.1
U19-204054	72.2	28	6.8	1.2	36	15.0	1.3	32.6	20.8
U19-230043	72.5	27	6.6	1.3	37	15.0	1.1	32.7	19.9
U20-908101	75.4	12	4.2	1.5	35	14.8	1.3	32.9	20.5
U20-910082	78.0	4	2.5	1.6	34	15.8	1.0	32.6	20.9
U20-917147	73.6	22	5.1	1.5	36	15.5	1.2	32.5	20.5
U20-928077	73.2	25	6.7	1.4	35	14.1	1.2	31.8	20.2
Mean	73.7			1.5	34.5	15.0	1.2	32.8	20.1
C.V. (%)	8.1								
L.S.D. (5%)	2.6								

\* E20355 not included in analysis and mean does not include IN locations. E20355 ranked 30th when only 11 locs were used.

120.3 Days After Planting

**UNIFORM TEST II, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	27 bu/a	27 No.	23 Date	23 Score	Height 21 In.	Size 22 g/100	Quality 20 Score	Protein 22 %	Oil 22 %
IA2102 (II)	69.6	11	9/21	2.5	36	16.6	1.2	34.4	19.2
LD17-2558 (SCN)	74.3	4	3.3	1.7	36	17.1	1.2	33.4	19.6
U14-910097 (SCN) (L)	77.1	2	5.8	2.0	34	15.8	1.1	33.0	20.3
CR184590	70.0	10	2.8	1.8	39	15.8	1.2	34.6	19.4
CR190377	66.3	13	2.8	2.4	37	14.5	1.3	32.2	20.1
CR193835	69.4	12	-0.1	1.5	34	15.4	1.2	32.4	20.7
E20329	73.2	6	1.0	1.7	36	15.7	1.2	32.9	19.8
E20333	70.2	9	2.2	1.9	39	16.0	1.2	32.7	19.9
E20355	73.1	7	4.9	1.7	39	16.0	1.3	33.4	19.5
LD19-7145	73.8	5	1.9	1.3	32	15.6	1.2	34.0	19.4
LD19-7165	72.2	8	3.5	1.3	33	15.9	1.2	33.4	19.7
U20-908101	75.2	3	4.0	1.7	36	15.6	1.2	33.2	20.2
U20-910082	77.8	1	2.5	1.8	35	16.6	1.1	32.9	20.5

124.9 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	39	39	32	31	29	32	30	32	32
IA2102 (II)	69.7	3	9/21	2.2	35	16.7	1.3	34.2	19.1
LD17-2558 (SCN)	74.3	2	2.9	1.6	36	17.1	1.4	33.2	19.6
U14-910097 (SCN) (L)	76.6	1	5.9	2.0	34	15.9	1.3	32.8	20.4
CR184590	68.7	4	3.3	1.7	39	15.7	1.3	34.3	19.4

124.6 Days After Planting

**UNIFORM TEST II, 2024**

**YIELD (bu/a)**

Strain	Mean 13 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	70.1	83.8	59.9	68.4	54.1	59.5	68.3	61.7
LD17-2558 (SCN)	74.4	86.0	51.6	70.7	58.4	68.4	69.7	90.7
MN1905CN (E)	68.5	75.2	49.3	61.5	54.0	55.0	72.5	69.2
U14-910097 (SCN) (L)	76.5	93.6	60.7	72.5	62.8	71.5	66.9	91.2
A16373-82	74.2	85.0	56.9	72.2	56.8	69.9	70.9	82.3
A16373-101	72.9	84.6	55.0	67.3	60.8	72.6	72.4	83.7
A17107-95	73.6	81.0	50.3	66.0	66.3	59.2	71.5	78.7
A17112-19	80.4	90.0	62.8	71.7	62.7	74.3	78.9	88.1
A17112-34	81.1	91.1	64.5	76.2	65.5	71.9	74.2	99.3
A17112-72	75.9	90.9	64.3	63.8	67.9	62.8	71.3	79.6
A17112-202	79.4	99.8	58.9	72.7	63.0	72.2	79.9	88.6
A17437-29	71.9	87.1	49.1	71.1	57.0	65.9	74.6	85.3
A17438-64	76.7	87.9	55.8	74.0	64.6	68.3	69.9	78.0
CR184590	70.0	75.5	57.9	64.3	54.1	67.0	67.2	71.3
CR190377	66.0	69.9	53.0	60.0	49.2	54.4	60.0	74.7
CR193835	70.8	69.2	48.7	62.5	54.5	59.1	67.5	81.2
CR20-1893	67.6	74.8	53.5	69.1	50.4	67.5	65.8	80.1
CR20-5419	71.2	77.0	58.8	73.8	54.4	62.1	74.5	85.2
E20329	75.5	86.0	66.5	69.2	61.2	65.6	74.0	77.8
E20333	69.3	81.0	47.6	68.3	55.7	59.7	80.2	65.3
E20355		85.9	55.6	66.9	55.6	65.1		
E21107	74.1	78.6	58.3	74.0	61.2	60.7	74.1	81.7
E21109	75.6	89.1	59.7	71.2	57.5	60.5	74.1	82.4
E21118	74.6	83.8	55.6	69.3	56.0	64.5	74.8	83.5
E21125	75.7	79.9	63.5	74.4	54.3	59.6	77.2	78.5
E21127	75.7	81.4	64.7	76.3	60.3	65.1	76.1	84.4
E21345	73.8	83.9	65.3	66.8	50.6	65.2	66.3	79.0
LD19-7145	74.8	89.7	43.9	73.7	61.2	70.1	79.7	78.8
LD19-7165	69.6	78.9	46.8	72.7	59.5	64.6	72.2	90.1
LD20-0815	75.0	79.6	54.7	71.1	58.6	63.2	74.9	87.0
LD20-11062	74.3	84.2	59.6	64.6	44.8	64.6	69.0	74.3
LD20-4471	73.5	78.0	55.1	68.7	63.5	67.5	83.6	84.6
LD20-4988	74.4	84.5	54.9	72.0	64.3	64.9	79.7	74.2
LD20-5172	72.0	83.5	55.3	68.3	58.1	65.3	63.7	79.9
U19-204054	72.2	87.1	54.2	70.7	54.4	64.0	66.7	75.0
U19-230043	72.5	74.7	58.5	75.5	52.3	68.2	70.7	81.0
U20-908101	75.4	86.7	61.6	75.9	56.9	64.3	78.9	74.2
U20-910082	78.0	93.6	63.2	73.0	60.3	70.1	76.5	77.3
U20-917147	73.6	99.2	58.0	70.1	55.5	62.8	72.7	73.4
U20-928077	73.2	85.4	44.5	74.0	58.0	61.0	70.8	74.7
Location Mean		83.9	56.5	70.1	57.9	65.0	72.6	80.1
C.V. (%)		8.3	10.2	4.7	7.1	6.1	9.7	6.1
L.S.D. (5%)		11.3	9.4	5.4	8.3	7.9	14.3	10.0
Row Sp. (In.)		30	30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4	4
Reps		3	3	3	2	2	2	2

\* Data not included in mean.

**UNIFORM TEST II, 2024**

**YIELD (bu/a)**

Strain	Britton MI	East Lansing MI*	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)	68.9	59.2	81.2	64.0	86.1	61.7	98.8
LD17-2558 (SCN)	69.6	61.1	85.7	78.5	79.9	59.8	102.9
MN1905CN (E)	63.4	70.8	83.8	73.4	88.1	59.5	90.8
U14-910097 (SCN) (L)	76.0	62.3	89.7	81.3	90.8	52.4	88.5
A16373-82	72.4	65.4	90.1	75.9	82.9	65.3	88.2
A16373-101	67.8	69.4	68.3	75.4	84.5	64.5	95.8
A17107-95	73.7	69.2	90.2	77.8	91.4	58.6	95.6
A17112-19	74.6	64.1	100.3	84.8	94.5	64.7	104.2
A17112-34	72.4	60.0	97.5	89.3	92.5	58.9	104.4
A17112-72	66.9	60.3	91.6	78.0	94.3	57.2	102.4
A17112-202	74.7	65.2	92.9	78.9	89.2	63.9	103.9
A17437-29	70.5	57.0	91.0	72.9	70.8	51.5	93.1
A17438-64	69.2	65.2	96.9	77.1	93.9	64.7	103.1
CR184590	67.2	55.4	86.4	73.5	78.1	60.9	91.1
CR190377	64.5	48.1	88.2	68.1	85.2	61.4	74.1
CR193835	63.4	53.7	89.3	74.6	96.4	55.9	102.8
CR20-1893	60.1	58.2	88.6	59.4	67.8	62.0	84.7
CR20-5419	67.4	47.4	89.7	65.9	88.2	54.1	79.6
E20329	65.8	65.8	88.3	73.7	88.0	63.2	106.7
E20333	74.2	54.4	77.0	73.4	77.3	59.1	87.0
E20355	62.2	44.1	94.5	78.6	88.3	62.1	75.7
E21107	67.7	44.6	81.0	71.7	89.0	62.9	105.4
E21109	80.7	51.5	89.2	70.0	85.3	62.5	105.3
E21118	72.2	57.9	89.7	76.5	86.0	61.5	101.1
E21125	73.9	54.6	96.3	79.6	94.6	59.3	97.7
E21127	67.1	46.9	94.4	80.4	83.7	58.1	97.3
E21345	61.6	68.9	97.1	80.5	91.3	57.2	100.5
LD19-7145	68.0	46.9	93.8	87.3	87.2	61.0	82.5
LD19-7165	63.2	53.0	88.9	72.3	96.8	49.8	55.5
LD20-0815	65.7	54.4	96.3	76.3	93.7	61.4	96.8
LD20-11062	67.9	71.1	96.6	74.1	94.6	61.1	115.3
LD20-4471	64.5	44.0	72.3	75.1	84.7	53.0	109.3
LD20-4988	69.3	44.9	94.1	71.2	90.3	60.6	91.4
LD20-5172	66.0	39.2	85.6	68.8	81.0	64.1	101.1
U19-204054	72.2	48.8	86.5	78.1	85.6	66.2	82.3
U19-230043	67.1	56.6	88.2	78.2	86.9	63.3	82.2
U20-908101	66.8	55.3	96.5	81.0	90.6	67.0	83.8
U20-910082	73.9	57.2	90.2	82.9	93.7	64.6	98.8
U20-917147	67.3	55.6	92.8	80.0	74.5	63.5	91.4
U20-928077	70.7	58.2	92.7	80.5	84.9	63.3	96.3
Location Mean	68.8	56.6	89.6	76.0	87.1	60.5	94.2
C.V. (%)	12.0	14.7	5.0	8.7	6.5	7.0	7.8
L.S.D. (5%)	16.7	17.0	9.1	13.4	11.5	6.8	11.9
Row Sp. (ln.)	15	15	30	30	30	8	17
Rows/Plot	6	6	4	4	4	8	5
Reps	2	2	2	2	2	3	3

\* Data not included in mean.

**UNIFORM TEST II, 2024**

**YIELD RANK**

Strain	Yield Rank	Ames IA	Lucas IA	Sutherland IA	Monmouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	33	24	11	28	34	36	31	39
LD17-2558 (SCN)	17	14	32	22	18	9	29	3
MN1905CN (E)	37	36	34	39	35	39	20	37
U14-910097 (SCN) (L)	6	3	10	14	8	5	34	2
A16373-82	19	18	20	15	24	8	25	15
A16373-101	26	19	26	31	13	2	21	12
A17107-95	22	27	33	34	2	37	23	24
A17112-19	2	7	8	17	9	1	6	6
A17112-34	1	5	4	2	3	4	15	1
A17112-72	7	6	5	37	1	28	24	21
A17112-202	3	1	14	12	7	3	3	5
A17437-29	30	11	35	19	22	15	13	8
A17438-64	5	10	21	8	4	10	28	26
CR184590	34	35	19	36	33	14	33	36
CR190377	39	39	31	40	39	40	39	30
CR193835	32	40	36	38	29	38	32	17
CR20-1893	38	37	30	26	38	13	37	19
CR20-5419	31	34	15	9	30	30	14	9
E20329	11	15	1	25	11	16	18	27
E20333	36	28	37	29	26	34	2	38
E20355		16	23	32	27	20		
E21107	20	32	17	6	12	32	16	16
E21109	10	9	12	18	21	33	16	14
E21118	15	23	22	24	25	24	12	13
E21125	9	29	6	5	32	35	8	25
E21127	8	26	3	1	15	19	10	11
E21345	21	22	2	33	37	18	36	22
LD19-7145	14	8	40	10	10	7	4	23
LD19-7165	35	31	38	12	16	22	22	4
LD20-0815	13	30	28	20	17	27	11	7
LD20-11062	18	21	13	35	40	23	30	32
LD20-4471	24	33	25	27	6	12	1	10
LD20-4988	16	20	27	16	5	21	4	33
LD20-5172	29	25	24	30	19	17	38	20
U19-204054	28	12	29	21	31	26	35	29
U19-230043	27	38	16	4	36	11	27	18
U20-908101	12	13	9	3	23	25	6	33
U20-910082	4	4	7	11	14	6	9	28
U20-917147	22	2	18	23	28	28	19	35
U20-928077	25	17	39	7	20	31	26	30

**UNIFORM TEST II, 2024**

**YIELD RANK**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)	18	15	36	39	24	18	16
LD17-2558 (SCN)	15	12	33	14	35	26	10
MN1905CN (E)	35	2	35	29	20	27	28
U14-910097 (SCN) (L)	2	11	21	5	13	38	29
A16373-82	9	7	20	22	33	3	30
A16373-101	21	3	40	23	31	7	22
A17107-95	8	4	18	18	11	31	23
A17112-19	4	10	1	3	5	4	7
A17112-34	10	14	2	1	10	30	6
A17112-72	28	13	16	17	6	33	12
A17112-202	3	9	13	12	16	9	8
A17437-29	14	20	17	31	39	39	24
A17438-64	17	8	4	19	7	4	9
CR184590	25	23	32	28	36	24	27
CR190377	34	32	30	37	28	20	39
CR193835	36	28	24	25	2	35	11
CR20-1893	40	17	27	40	40	17	32
CR20-5419	23	33	23	38	19	36	37
E20329	31	6	28	27	21	13	3
E20333	5	27	38	29	37	29	31
E20355	38	38	9	13	18	16	38
E21107	22	37	37	33	17	14	4
E21109	1	30	25	35	27	15	5
E21118	12	18	21	20	25	19	13
E21125	7	25	7	11	4	28	18
E21127	26	34	10	9	32	32	19
E21345	39	5	3	7	12	34	15
LD19-7145	19	34	12	2	22	23	34
LD19-7165	37	29	26	32	1	40	40
LD20-0815	32	26	8	21	8	21	20
LD20-11062	20	1	5	26	3	22	1
LD20-4471	33	39	39	24	30	37	2
LD20-4988	16	36	11	34	15	25	25
LD20-5172	30	40	34	36	34	8	13
U19-204054	11	31	31	16	26	2	35
U19-230043	27	21	29	15	23	11	36
U20-908101	29	24	6	6	14	1	33
U20-910082	6	19	19	4	9	6	17
U20-917147	24	22	14	10	38	10	26
U20-928077	13	16	15	8	29	12	21

**UNIFORM TEST II, 2024**

**MATURITY (date)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	9/19	9/17	9/19		9/12	9/16	9/2	9/9
LD17-2558 (SCN)	3	3	-1		3	4	2	3
MN1905CN (E)	-4	-5	-1		-2	-2	-1	-4
U14-910097 (SCN) (L)	7	8	2		8	8	7	9
A16373-82	5	7	1		7	7	6	6
A16373-101	5	8	1		7	7	7	6
A17107-95	2	3	0		4	3	2	1
A17112-19	4	6	1		4	6	9	5
A17112-34	4	7	2		6	6	3	6
A17112-72	1	4	1		4	3	2	3
A17112-202	5	7	1		7	6	7	6
A17437-29	5	9	1		7	5	11	9
A17438-64	4	5	2		8	4	3	4
CR184590	3	3	1		1	4	6	4
CR190377	3	2	1		3	4	2	4
CR193835	0	-0	-1		1	1	1	1
CR20-1893	7	10	2		8	8	10	7
CR20-5419	4	8	1		3	5	8	6
E20329	1	5	-0		3	2	1	2
E20333	2	3	1		6	2	7	1
E20355	4	7	2		3	6		
E21107	4	5	0		7	5	5	5
E21109	1	2	1		4	3	4	2
E21118	4	6	3		6	4	10	6
E21125	1	2	1		1	2	3	0
E21127	1	-0	1		4	2	3	1
E21345	1	1	0		1	2	1	1
LD19-7145	2	3	0		2	2	5	3
LD19-7165	3	7	1		5	5	8	5
LD20-0815	1	4	-1		3	2	4	1
LD20-11062	1	2	0		2	2	4	-1
LD20-4471	5	8	2		8	4	10	6
LD20-4988	3	6	1		7	4	5	2
LD20-5172	1	2	-1		3	2	2	1
U19-204054	7	11	2		9	7	11	7
U19-230043	7	7	3		8	8	9	8
U20-908101	4	7	2		3	5	6	5
U20-910082	3	6	1		4	4	5	2
U20-917147	5	7	2		6	7	8	6
U20-928077	7	9	3		8	8	9	6
Date Planted	5/21	5/19	6/1		5/16	5/22	5/6	5/8
Days to Mature	120	121	110		119	117	119	124

**UNIFORM TEST II, 2024**

**MATURITY (date)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)		9/30	9/23	9/19	9/24	9/30	9/28
LD17-2558 (SCN)		6	8	4	0	4	3
MN1905CN (E)		-8	-2	-3	-5	-5	-8
U14-910097 (SCN) (L)		5	10	8	-1	10	5
A16373-82		5	10	5	-2	4	4
A16373-101		5	8	5	1	4	4
A17107-95		2	5	2	-3	6	-4
A17112-19		4	8	3	-4	6	2
A17112-34		3	7	4	-1	4	3
A17112-72		1	4	2	-5	3	-4
A17112-202		3	8	5	-2	5	4
A17437-29		4	8	3	-3	4	6
A17438-64		2	5	4	-2	5	3
CR184590		2	7	4	-2	5	-3
CR190377		5	7	6	-2	6	2
CR193835		-2	5	1	-3	3	-5
CR20-1893		7	10	7	-3	8	6
CR20-5419		5	8	4	-5	8	1
E20329		4	5	2	-4	3	-5
E20333		5	5	2	-5	1	-2
E20355		5	8	5	-1	5	3
E21107		-1	8	4	0	4	5
E21109		1	5	1	-4	4	-5
E21118		5	9	3	-4	4	1
E21125		-2	5	-1	-4	1	-1
E21127		-3	5	1	-4	2	-3
E21345		2	4	1	-4	2	-5
LD19-7145		-2	9	4	-2	4	-3
LD19-7165		4	7	4	-3	5	-5
LD20-0815		5	4	1	-5	2	-5
LD20-11062		4	5	1	-2	5	-4
LD20-4471		6	6	6	-1	4	3
LD20-4988		5	5	3	-3	4	-4
LD20-5172		4	5	1	-2	5	-3
U19-204054		4	10	7	1	10	4
U19-230043		5	12	7	1	7	6
U20-908101		4	9	5	-2	5	3
U20-910082		3	5	3	-2	3	-3
U20-917147		3	9	5	-1	4	5
U20-928077		6	10	6	0	10	6
Date Planted		5/24	5/28	5/18	5/29	6/12	5/16
Days to Mature		129	118	124	118	110	135

**UNIFORM TEST II, 2024**

**LODGING (score)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	2.3	2.0			1.8	2.0	2.0	3.0
LD17-2558 (SCN)	1.5	1.0			1.5	1.0	1.0	2.0
MN1905CN (E)	1.8	1.0			2.3	1.0	2.0	2.5
U14-910097 (SCN) (L)	1.9	1.0			2.0	2.0	1.5	2.0
A16373-82	1.3	1.0			2.0	1.0	1.0	1.5
A16373-101	1.5	1.0			2.5	1.0	1.5	1.5
A17107-95	1.2	1.0			1.3	1.0	1.0	1.0
A17112-19	1.1	1.0			1.0	1.0	1.0	1.5
A17112-34	1.2	1.0			1.0	1.0	1.0	2.0
A17112-72	1.2	1.0			1.3	1.0	1.0	2.0
A17112-202	1.6	1.3			1.8	1.0	1.5	2.0
A17437-29	1.3	1.0			1.3	1.0	1.0	1.0
A17438-64	1.4	1.0			2.0	1.5	1.5	2.0
CR184590	1.6	1.0			1.5	1.0	2.0	2.0
CR190377	2.1	2.0			2.5	1.5	2.0	3.0
CR193835	1.4	1.0			2.0	1.0	1.0	2.0
CR20-1893	2.0	1.7			3.0	1.5	1.5	2.0
CR20-5419	1.6	1.0			2.0	1.0	1.0	2.0
E20329	1.6	1.0			1.5	1.0	1.5	2.5
E20333	1.8	1.3			1.8	1.0	2.0	3.0
E20355	1.6	1.0			2.0	1.0		
E21107	1.7	1.0			1.8	1.0	2.0	2.5
E21109	1.4	1.0			1.8	1.0	1.0	2.0
E21118	1.2	1.0			1.5	1.0	1.0	1.5
E21125	1.6	1.0			1.5	1.0	1.5	2.0
E21127	1.7	1.0			2.0	1.0	1.5	3.0
E21345	1.6	1.0			1.5	1.0	1.0	2.5
LD19-7145	1.1	1.0			1.3	1.0	1.0	1.0
LD19-7165	1.1	1.0			1.0	1.0	1.0	1.0
LD20-0815	1.3	1.0			1.5	1.0	1.0	1.5
LD20-11062	1.2	1.0			1.8	1.0	1.0	2.0
LD20-4471	1.7	1.3			2.8	1.0	2.0	2.0
LD20-4988	1.4	1.0			1.5	1.0	1.5	2.0
LD20-5172	1.1	1.0			1.0	1.0	1.0	1.0
U19-204054	1.2	1.0			1.0	1.0	1.5	2.0
U19-230043	1.3	1.0			2.3	1.0	1.5	2.0
U20-908101	1.5	1.0			1.0	1.5	1.5	2.0
U20-910082	1.6	1.0			1.0	1.5	2.0	2.0
U20-917147	1.5	1.3			1.8	1.0	1.5	1.5
U20-928077	1.4	1.0			2.8	1.0	1.0	1.5

**UNIFORM TEST II, 2024**

**LODGING (score)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)	2.5	1.5	1.0	4.0	3.0	1.0	3.7
LD17-2558 (SCN)	1.5	1.5	1.0	2.0	1.5	1.0	2.7
MN1905CN (E)	1.5	1.5	1.0	2.5	2.0	1.0	2.7
U14-910097 (SCN) (L)	1.0	2.5	1.0	3.0	2.0	1.0	3.3
A16373-82	1.0	1.0	1.0	1.5	2.0	1.0	1.7
A16373-101	1.0	1.5	1.0	1.5	2.0	1.0	2.7
A17107-95	1.0	1.0	1.0	1.5	1.5	1.0	1.7
A17112-19	1.0	1.0	1.0	1.5	1.0	1.0	1.7
A17112-34	1.0	1.0	1.0	1.5	1.0	1.0	2.0
A17112-72	1.0	1.0	1.0	1.5	1.0	1.0	1.7
A17112-202	1.5	1.0	1.0	2.5	1.5	1.0	2.7
A17437-29	1.0	1.0	1.0	1.5	1.5	1.0	2.7
A17438-64	1.0	1.0	1.0	1.5	1.5	1.0	2.0
CR184590	2.0	1.0	1.0	2.5	2.0	1.0	2.3
CR190377	1.5	1.5	1.3	3.0	2.0	1.0	3.7
CR193835	1.5	1.0	1.0	1.5	1.5	1.0	2.0
CR20-1893	3.0	1.5	1.0	3.0	2.0	1.0	3.3
CR20-5419	1.5	1.0	1.0	2.0	2.0	1.0	3.7
E20329	1.5	2.5	1.0	2.0	1.5	1.0	2.3
E20333	1.5	1.5	1.0	2.5	1.5	1.0	3.0
E20355	2.0	1.0	1.0	2.5	1.5	1.0	3.3
E21107	1.0	1.0	1.3	2.5	2.0	1.0	3.0
E21109	1.0	1.0	1.0	2.5	1.5	1.0	2.0
E21118	1.0	1.0	1.0	1.5	1.0	1.0	2.0
E21125	2.0	1.0	1.0	2.5	2.0	1.0	2.7
E21127	1.5	1.0	1.0	2.5	2.0	1.0	2.7
E21345	1.0	1.5	1.0	2.5	2.0	1.0	2.7
LD19-7145	1.0	1.0	1.0	1.0	1.0	1.0	1.7
LD19-7165	1.0	1.0	1.0	1.5	1.5	1.0	1.7
LD20-0815	1.0	1.0	1.0	1.5	2.0	1.0	2.3
LD20-11062	1.0	1.0	1.0	1.0	1.0	1.0	2.0
LD20-4471	1.0	1.5	1.0	2.0	2.0	1.0	2.7
LD20-4988	1.0	1.0	1.0	1.5	2.0	1.0	2.0
LD20-5172	1.0	1.0	1.0	1.5	1.0	1.0	2.0
U19-204054	1.0	1.0	1.0	1.0	1.0	1.0	1.7
U19-230043	1.0	1.0	1.0	1.5	1.0	1.0	1.7
U20-908101	1.0	1.5	1.3	1.5	2.0	1.0	2.3
U20-910082	1.5	1.5	1.0	2.0	2.0	1.0	2.7
U20-917147	1.5	1.0	1.0	2.0	2.0	1.0	2.3
U20-928077	1.0	1.5	1.0	1.5	1.5	1.0	2.3

**UNIFORM TEST II, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 11 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	36	35				33	35	35
LD17-2558 (SCN)	36	36				31	34	37
MN1905CN (E)	34	33				30	34	33
U14-910097 (SCN) (L)	34	35				29	34	35
A16373-82	34	33				32	34	37
A16373-101	35	34				32	34	38
A17107-95	32	32				27	31	34
A17112-19	32	33				28	31	33
A17112-34	32	32				28	29	32
A17112-72	31	31				27	31	31
A17112-202	35	34				31	35	37
A17437-29	34	34				31	34	38
A17438-64	37	35				33	35	39
CR184590	38	34				34	39	41
CR190377	37	36				30	38	41
CR193835	32	31				27	33	35
CR20-1893	38	38				32	35	40
CR20-5419	35	34				31	37	39
E20329	35	35				34	35	38
E20333	38	36				34	38	40
E20355	38	39				34		
E21107	34	33				33	35	35
E21109	35	36				34	35	38
E21118	35	35				31	36	38
E21125	35	33				31	36	38
E21127	35	30				32	35	37
E21345	35	33				31	34	37
LD19-7145	30	31				28	29	29
LD19-7165	32	30				30	31	35
LD20-0815	34	32				30	34	36
LD20-11062	32	31				29	32	34
LD20-4471	33	33				30	35	35
LD20-4988	33	33				30	35	35
LD20-5172	32	32				29	32	35
U19-204054	36	36				32	37	38
U19-230043	37	36				35	39	43
U20-908101	35	34				32	36	36
U20-910082	34	33				31	35	36
U20-917147	36	38				30	33	38
U20-928077	35	36				29	35	36

**UNIFORM TEST II, 2024**

**PLANT HEIGHT (inches)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)	35	36	37	39	39	25	43
LD17-2558 (SCN)	37	37	37	37	38	25	45
MN1905CN (E)	33	35	37	34	38	23	45
U14-910097 (SCN) (L)	30	35	36	34	38	23	44
A16373-82	31	31	37	38	37	25	44
A16373-101	32	35	35	37	36	24	45
A17107-95	30	33	34	32	38	23	45
A17112-19	30	33	33	32	36	23	44
A17112-34	29	29	34	34	35	21	44
A17112-72	27	28	32	33	33	23	43
A17112-202	31	33	38	36	40	25	45
A17437-29	30	34	37	35	38	23	46
A17438-64	33	37	39	38	42	26	49
CR184590	37	36	43	40	40	27	49
CR190377	32	37	38	37	43	26	48
CR193835	29	28	37	34	40	21	43
CR20-1893	40	37	40	39	43	28	47
CR20-5419	32	28	36	37	40	23	44
E20329	33	38	35	34	39	24	45
E20333	35	41	41	37	40	25	48
E20355	34	35	38	40	43	29	50
E21107	30	28	37	35	39	23	45
E21109	33	34	39	33	39	23	46
E21118	31	32	41	35	38	23	47
E21125	36	33	37	34	41	25	45
E21127	33	32	38	41	38	25	45
E21345	30	38	39	37	39	24	47
LD19-7145	28	25	31	32	34	22	43
LD19-7165	28	30	35	33	37	21	42
LD20-0815	30	31	37	36	38	24	47
LD20-11062	29	30	35	34	38	24	43
LD20-4471	28	26	35	35	39	23	45
LD20-4988	31	30	35	35	36	23	43
LD20-5172	29	25	34	34	35	25	48
U19-204054	33	31	38	37	39	25	49
U19-230043	31	34	40	39	43	25	47
U20-908101	32	33	41	37	39	25	46
U20-910082	31	34	35	36	37	25	43
U20-917147	35	32	40	41	39	25	46
U20-928077	34	32	38	37	39	25	45

**UNIFORM TEST II, 2024**

**SEED SIZE (g/100)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	15.9	16.9	14.1	15.1		16.1	14.3	17.0
LD17-2558 (SCN)	16.1	16.8	13.6	16.2		16.8	13.2	17.3
MN1905CN (E)	16.4	17.1	14.0	15.7		16.1	15.9	18.0
U14-910097 (SCN) (L)	14.8	15.1	12.6	14.4		14.8	11.7	15.7
A16373-82	15.1	15.9	12.8	15.3		16.0	12.9	15.7
A16373-101	15.2	16.4	13.2	16.1		16.0	12.8	15.4
A17107-95	16.2	17.5	14.9	15.5		17.0	14.5	17.3
A17112-19	14.8	15.1	13.2	14.4		15.4	13.3	15.3
A17112-34	14.1	14.8	12.8	13.1		14.9	11.7	15.1
A17112-72	16.5	17.7	15.5	15.9		17.8	15.5	15.7
A17112-202	14.3	14.6	12.4	13.9		14.6	12.7	15.2
A17437-29	15.5	16.5	13.2	15.8		15.8	14.0	16.3
A17438-64	15.4	16.2	13.7	15.4		16.6	13.2	15.6
CR184590	15.0	15.3	13.1	14.8		15.2	13.7	16.0
CR190377	13.7	13.7	12.1	12.9		13.9	11.3	15.2
CR193835	14.3	14.4	12.3	13.5		14.5	12.3	16.2
CR20-1893	14.2	14.6	12.1	13.9		14.3	12.0	13.9
CR20-5419	14.1	15.1	13.1	13.6		14.9	12.3	14.9
E20329	14.9	15.9	14.0	14.9		15.2	13.1	15.9
E20333	15.0	16.1	13.6	15.6		15.0	13.6	13.3
E20355	15.3	15.9	13.5	15.3		15.6		
E21107	14.8	15.2	13.1	15.6		15.3	13.6	15.4
E21109	15.6	16.5	14.8	15.5		16.2	14.2	15.2
E21118	13.8	14.3	12.6	13.6		14.3	12.5	14.3
E21125	15.0	15.8	13.2	14.3		15.4	13.5	15.3
E21127	15.0	15.2	13.3	14.5		15.8	13.7	16.3
E21345	15.1	15.9	13.7	14.4		15.7	13.8	15.7
LD19-7145	15.0	15.4	12.8	15.0		16.0	13.1	16.4
LD19-7165	15.2	15.9	13.2	15.9		15.3	12.7	15.7
LD20-0815	15.3	16.1	12.9	15.3		16.0	13.7	16.6
LD20-11062	14.1	14.8	12.6	13.9		14.8	12.7	15.0
LD20-4471	15.3	16.4	12.6	16.5		15.5	14.4	15.7
LD20-4988	15.4	15.8	13.2	15.5		16.2	13.7	16.3
LD20-5172	15.2	16.1	12.5	15.3		16.2	13.3	16.1
U19-204054	15.0	15.7	12.4	16.2		15.9	12.8	15.1
U19-230043	15.0	15.6	13.2	16.3		15.2	13.0	15.7
U20-908101	14.8	15.5	12.8	15.9		14.9	13.2	15.5
U20-910082	15.8	16.4	14.1	16.4		17.0	13.9	17.1
U20-917147	15.5	16.2	12.8	17.1		15.0	13.9	17.3
U20-928077	14.1	14.7	12.0	15.3		13.6	11.9	14.0

**UNIFORM TEST II, 2024**

**SEED SIZE (g/100)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)	16.5	14.2	16.3	16.7		14.0	19.1
LD17-2558 (SCN)	17.2	14.4	17.5	16.2		14.5	19.5
MN1905CN (E)	17.4	14.6	17.8	16.5		14.0	19.5
U14-910097 (SCN) (L)	15.5	14.7	15.6	15.2		13.9	18.5
A16373-82	15.6	14.4	16.2	15.0		13.9	17.8
A16373-101	15.6	13.6	15.6	15.0		14.3	18.2
A17107-95	17.0	14.3	17.1	16.1		15.4	18.0
A17112-19	14.9	13.4	16.5	14.6		13.5	17.8
A17112-34	14.8	13.6	15.3	13.8		12.5	16.7
A17112-72	16.9	14.4	18.2	16.1		15.1	18.9
A17112-202	15.1	13.4	15.0	13.7		13.4	17.5
A17437-29	16.2	13.3	17.5	15.1		14.1	18.7
A17438-64	15.6	14.1	16.8	15.1		13.8	18.1
CR184590	15.1	13.9	16.5	15.0		13.6	18.0
CR190377	14.6	12.5	15.2	13.3		12.4	17.0
CR193835	15.0	13.4	15.9	14.6		12.7	17.3
CR20-1893	16.4	13.2	15.4	13.0		12.4	19.1
CR20-5419	14.8	13.8	14.7	13.9		12.7	15.8
E20329	16.6	13.5	15.1	14.1		12.6	17.8
E20333	16.8	14.2	14.7	14.5		14.5	18.4
E20355	15.8	13.6	16.7	14.7		13.3	18.8
E21107	15.8	13.0	15.1	14.3		13.3	17.9
E21109	16.6	13.6	16.3	15.7		14.2	18.0
E21118	14.6	13.0	14.2	12.9		12.1	16.7
E21125	16.2	13.2	16.0	15.1		13.7	17.7
E21127	14.8	13.8	16.0	15.3		14.0	17.5
E21345	14.5	14.0	16.1	15.6		14.1	17.9
LD19-7145	15.8	13.9	16.4	15.6		13.4	16.4
LD19-7165	15.4	14.1	16.9	15.4		13.7	17.8
LD20-0815	15.5	13.5	17.2	15.3		13.1	18.4
LD20-11062	14.1	13.2	15.2	14.4		12.4	16.0
LD20-4471	14.7	14.1	15.6	15.3		12.8	19.5
LD20-4988	15.9	15.1	16.4	15.3		13.8	17.7
LD20-5172	15.6	13.7	16.3	15.0		14.4	17.7
U19-204054	15.3	13.5	16.1	14.4		14.4	18.4
U19-230043	14.9	13.6	16.4	14.7		13.9	17.8
U20-908101	14.9	13.8	16.1	14.5		14.0	16.8
U20-910082	15.1	13.5	17.2	16.4		13.6	18.6
U20-917147	15.5	14.3	16.8	14.8		13.8	18.7
U20-928077	15.4	13.0	15.7	13.8		12.6	16.8

**UNIFORM TEST II, 2024**

**SEED QUALITY (score)**

Strain	Mean 11 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	1.2	1.0	1.0	1.0		2.0	1.0	1.0
LD17-2558 (SCN)	1.1	1.0	1.0	1.0		2.0	1.0	1.0
MN1905CN (E)	1.4	1.0	1.0	1.0		2.0	1.0	1.5
U14-910097 (SCN) (L)	1.0	1.0	1.0	1.0		1.0	1.0	1.0
A16373-82	1.1	1.0	1.0	1.0		1.0	1.0	1.0
A16373-101	1.2	1.0	1.0	1.0		2.0	1.0	1.0
A17107-95	1.2	1.0	1.0	1.0		2.0	1.0	1.0
A17112-19	1.1	1.0	1.0	1.0		1.0	1.5	1.5
A17112-34	1.3	1.0	1.0	1.0		1.0	1.0	1.0
A17112-72	1.2	1.0	1.0	1.0		2.0	1.5	1.0
A17112-202	1.1	1.0	1.0	1.0		2.0	1.0	1.0
A17437-29	1.1	1.0	1.0	1.0		2.0	1.0	1.5
A17438-64	1.1	1.0	1.0	1.0		1.0	1.0	1.0
CR184590	1.2	1.0	1.0	1.0		2.0	1.5	1.0
CR190377	1.2	1.0	1.0	1.0		2.0	1.0	1.0
CR193835	1.1	1.0	1.0	1.0		2.0	1.0	1.0
CR20-1893	1.1	1.0	1.0	1.0		1.0	1.0	1.0
CR20-5419	1.3	1.0	1.0	1.0		2.0	1.0	1.0
E20329	1.3	1.0	1.0	1.0		2.0	1.0	1.0
E20333	1.2	1.0	1.0	1.0		1.0	1.5	1.0
E20355	1.3	1.0	1.0	1.0		2.0		
E21107	1.1	1.0	1.0	1.0		2.0	1.0	1.0
E21109	1.3	1.0	1.0	1.0		2.0	1.0	1.0
E21118	1.2	1.0	1.0	1.0		1.0	1.0	1.0
E21125	1.0	1.0	1.0	1.0		1.0	1.0	1.0
E21127	1.2	1.0	1.0	1.0		2.0	1.0	1.0
E21345	1.1	1.0	1.0	1.0		1.0	1.0	1.0
LD19-7145	1.2	1.0	1.0	1.0		2.0	1.0	1.0
LD19-7165	1.2	1.0	1.0	1.0		2.0	1.5	1.0
LD20-0815	1.1	1.0	1.0	1.0		2.0	1.5	1.0
LD20-11062	1.1	1.0	1.0	1.0		2.0	1.5	1.0
LD20-4471	1.1	1.0	1.0	1.0		2.0	1.0	1.0
LD20-4988	1.1	1.0	1.0	1.0		1.0	1.0	1.0
LD20-5172	1.1	1.0	1.0	1.0		2.0	1.0	1.0
U19-204054	1.3	1.0	1.0	1.0		1.0	2.0	1.5
U19-230043	1.1	1.3	1.0	1.0		1.0	1.0	1.5
U20-908101	1.3	1.0	1.0	1.0		2.0	1.5	2.0
U20-910082	1.0	1.0	1.0	1.0		1.0	1.5	1.0
U20-917147	1.2	1.0	1.0	1.0		2.0	1.0	1.0
U20-928077	1.2	1.0	1.0	1.0		1.0	1.5	1.5

**UNIFORM TEST II, 2024**

**SEED QUALITY (score)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)	0.9	1.0	1.0	1.0			2.0
LD17-2558 (SCN)	1.5	1.0	1.0	1.0			1.0
MN1905CN (E)	1.0	1.5	1.0	1.0			3.0
U14-910097 (SCN) (L)	1.0	1.0	1.0	1.0			1.3
A16373-82	1.5	1.5	1.0	1.0			1.0
A16373-101	1.0	1.0	1.0	1.0			2.3
A17107-95	0.9	1.5	1.0	1.0			1.3
A17112-19	0.9	1.5	1.0	1.0			1.0
A17112-34	1.5	2.0	1.0	1.0			2.3
A17112-72	1.0	1.0	1.0	1.0			1.7
A17112-202	1.0	1.5	1.0	1.0			1.0
A17437-29	1.0	1.0	1.0	1.0			1.0
A17438-64	1.0	1.5	1.0	1.0			1.3
CR184590	0.9	2.0	1.0	1.0			1.0
CR190377	2.0	1.5	1.0	1.0			1.0
CR193835	0.9	1.5	1.0	1.0			1.0
CR20-1893	1.0	1.0	1.0	1.0			1.7
CR20-5419	1.0	1.5	1.0	1.0			2.3
E20329	2.0	1.5	1.0	1.0			1.3
E20333	1.5	1.0	1.0	1.0			1.7
E20355	2.0	1.0	1.0	1.0			2.0
E21107	1.5	1.0	1.0	1.0			1.0
E21109	1.9	2.0	1.0	1.0			1.3
E21118	1.5	2.0	1.0	1.0			1.7
E21125	1.0	1.5	1.0	1.0			1.0
E21127	1.5	1.5	1.0	1.0			1.0
E21345	2.0	1.5	1.0	1.0			1.0
LD19-7145	1.9	1.5	1.0	1.0			1.0
LD19-7165	0.9	1.5	1.0	1.0			1.3
LD20-0815	0.9	1.0	1.0	1.0			1.0
LD20-11062	1.0	1.0	1.0	1.0			1.0
LD20-4471	1.0	1.0	1.5	1.0			1.0
LD20-4988	1.0	2.0	1.0	1.0			1.0
LD20-5172	1.0	1.5	1.0	1.0			1.0
U19-204054	1.5	2.0	1.0	1.0			1.0
U19-230043	0.9	1.0	1.0	1.0			1.0
U20-908101	1.0	1.5	1.0	1.0			1.0
U20-910082	1.0	1.0	1.0	1.0			1.0
U20-917147	1.5	1.5	1.0	1.0			1.0
U20-928077	1.0	2.0	1.0	1.0			1.0

**UNIFORM TEST II, 2024**

**PROTEIN (%)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	33.9	33.8	33.0	33.9	36.9	33.3	33.8	35.1
LD17-2558 (SCN)	32.9	33.0	33.5	32.6	34.2	31.7	33.0	33.6
MN1905CN (E)	34.1	34.5	33.9	34.1	34.8	33.3	34.0	33.5
U14-910097 (SCN) (L)	32.7	33.7	33.6	31.7	33.7	31.8	32.2	32.9
A16373-82	34.0	34.7	34.4	34.8	34.6	33.7	34.1	34.0
A16373-101	33.9	34.8	33.2	33.1	34.2	33.2	34.0	33.2
A17107-95	33.0	33.9	33.0	31.7	33.5	32.6	34.3	33.0
A17112-19	30.6	30.6	30.8	29.7	31.9	29.7	30.9	30.0
A17112-34	31.0	31.4	31.4	30.1	31.7	30.4	31.1	30.9
A17112-72	32.5	33.6	32.6	30.9	33.5	32.2	32.6	33.6
A17112-202	30.9	31.5	31.3	29.4	31.7	29.6	31.2	31.7
A17437-29	32.3	32.7	33.9	32.3	33.2	31.5	30.9	32.1
A17438-64	31.8	32.2	32.4	31.1	32.8	31.4	31.6	31.5
CR184590	34.4	35.0	34.8	34.8	34.6	33.1	34.1	35.0
CR190377	32.0	32.4	32.2	30.5	34.4	31.4	31.8	32.1
CR193835	32.1	32.4	31.5	31.5	32.9	30.0	32.6	31.6
CR20-1893	33.6	34.4	33.2	32.7	34.6	32.4	33.9	33.4
CR20-5419	33.0	34.5	33.5	32.3	34.0	32.0	32.7	33.0
E20329	32.6	32.5	32.9	32.6	33.9	31.6	32.5	33.0
E20333	32.4	33.2	32.8	32.9	33.1	30.2	31.7	31.6
E20355	32.9	34.1	33.2	33.1	33.7	31.9		
E21107	32.9	34.2	32.9	31.0	34.1	32.8	33.0	33.8
E21109	33.3	33.8	32.7	33.4	34.7	32.8	32.7	33.4
E21118	34.1	34.5	34.5	34.0	35.2	33.2	33.8	34.6
E21125	33.7	34.3	33.4	33.8	34.7	33.0	33.8	33.2
E21127	33.9	34.3	34.0	33.3	34.7	32.9	34.2	35.1
E21345	33.9	34.4	34.1	32.8	34.6	33.7	34.0	34.0
LD19-7145	33.4	34.3	33.1	33.2	33.7	32.7	32.0	34.4
LD19-7165	32.8	33.6	32.3	32.0	34.1	31.5	32.9	33.9
LD20-0815	32.4	33.0	32.0	31.0	32.8	32.2	32.6	31.9
LD20-11062	33.1	33.5	33.1	33.0	33.4	32.8	33.2	34.7
LD20-4471	32.2	32.9	33.1	33.0	33.1	31.0	31.4	33.1
LD20-4988	33.5	33.1	33.7	33.4	34.6	32.0	34.1	34.5
LD20-5172	32.0	32.3	32.0	32.1	32.8	31.5	32.5	33.2
U19-204054	32.6	33.6	33.3	32.3	33.4	32.1	33.7	31.6
U19-230043	32.7	33.9	32.4	33.0	33.9	31.9	32.4	33.0
U20-908101	32.9	33.7	33.6	32.5	33.4	32.0	32.5	34.9
U20-910082	32.6	32.4	32.6	32.4	33.8	31.6	33.2	32.8
U20-917147	32.5	32.7	33.0	33.1	33.8	32.0	32.1	31.5
U20-928077	31.8	32.5	31.7	31.9	33.0	30.8	32.0	32.0

**UNIFORM TEST II, 2024**

**PROTEIN (%)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)		32.4	32.2	33.2		35.2	34.3
LD17-2558 (SCN)		33.5	31.5	32.1		32.5	33.7
MN1905CN (E)		35.0	33.9	33.1		34.6	34.2
U14-910097 (SCN) (L)		33.3	31.2	32.4		33.0	33.2
A16373-82		34.2	33.1	32.5		34.4	34.2
A16373-101		34.8	34.1	32.3		34.8	34.7
A17107-95		33.0	32.8	32.3		34.0	32.5
A17112-19		31.1	30.5	29.6		31.5	31.2
A17112-34		30.6	30.4	30.7		31.6	31.4
A17112-72		31.9	31.7	33.0		32.4	32.3
A17112-202		30.9	29.9	30.0		32.2	31.6
A17437-29		31.8	31.9	30.8		33.6	32.8
A17438-64		30.8	32.1	30.3		32.8	32.8
CR184590		33.5	34.5	33.2		35.2	34.5
CR190377		31.8	32.4	30.9		31.9	32.8
CR193835		32.4	32.6	32.2		33.3	32.1
CR20-1893		32.3	32.9	33.1		35.3	34.5
CR20-5419		32.0	32.4	32.4		33.7	33.3
E20329		32.9	32.5	30.8		33.2	32.5
E20333		32.7	32.0	31.9		32.8	33.4
E20355		31.3	33.6	31.6		33.5	33.0
E21107		32.5	31.7	33.6		33.5	32.2
E21109		32.7	33.4	33.5		33.5	33.5
E21118		32.3	34.1	33.3		34.9	34.3
E21125		32.7	33.8	32.1		34.5	34.7
E21127		33.0	33.1	33.0		34.4	34.8
E21345		33.7	33.2	32.9		34.3	34.6
LD19-7145		32.7	32.5	33.8		33.7	34.6
LD19-7165		32.3	31.6	32.8		32.4	33.7
LD20-0815		32.0	32.8	32.1		33.1	33.4
LD20-11062		29.8	33.2	33.6		33.6	32.8
LD20-4471		29.8	30.8	30.6		34.5	33.1
LD20-4988		32.7	33.5	32.4		34.6	33.9
LD20-5172		30.6	31.2	31.6		32.1	32.5
U19-204054		30.6	31.9	31.8		33.2	33.6
U19-230043		31.7	33.7	30.9		32.5	33.5
U20-908101		31.1	31.9	31.8		33.3	33.7
U20-910082		31.3	32.0	32.4		33.6	33.2
U20-917147		31.7	32.4	31.2		33.9	33.2
U20-928077		30.5	31.6	31.0		31.6	33.0

**UNIFORM TEST II, 2024**

**OIL (%)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Suther- land IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN
IA2102 (II)	19.3	18.6	20.5	19.1	18.8	20.1	19.8	19.3
LD17-2558 (SCN)	19.9	19.8	20.0	19.6	20.7	21.1	19.8	19.9
MN1905CN (E)	20.1	19.8	20.5	19.9	21.0	20.7	20.4	20.6
U14-910097 (SCN) (L)	20.5	20.3	20.7	20.3	21.4	21.4	20.5	20.6
A16373-82	20.1	20.2	20.7	19.2	20.9	21.0	20.2	20.3
A16373-101	20.1	20.0	20.8	19.8	21.0	21.0	20.0	20.3
A17107-95	19.9	19.6	20.2	19.5	20.8	20.5	20.0	20.4
A17112-19	21.2	21.1	21.4	20.9	22.2	21.6	21.4	21.5
A17112-34	20.8	20.8	21.4	20.5	21.9	21.6	20.9	20.9
A17112-72	20.7	20.4	21.0	20.8	21.6	20.9	21.1	20.8
A17112-202	20.8	20.6	21.4	20.6	21.6	21.6	20.8	20.8
A17437-29	19.5	19.5	19.8	18.6	20.5	20.4	19.7	19.8
A17438-64	20.9	20.7	21.2	20.3	21.6	21.4	21.1	21.5
CR184590	19.5	19.6	19.9	18.8	20.5	20.4	19.9	19.5
CR190377	20.1	19.9	20.4	19.8	20.2	21.3	20.2	20.3
CR193835	20.8	20.9	21.3	20.1	21.4	22.6	21.1	21.2
CR20-1893	20.0	19.8	20.4	19.4	20.3	21.1	19.7	20.5
CR20-5419	18.9	18.3	19.2	18.3	20.0	19.9	19.0	19.1
E20329	20.0	20.5	20.3	19.5	20.3	20.7	20.3	20.3
E20333	20.2	19.6	20.5	19.7	21.2	21.4	20.4	20.3
E20355	19.8	19.8	20.1	19.2	20.4	20.7		
E21107	19.8	19.2	20.1	20.1	20.7	20.1	19.8	19.6
E21109	19.4	19.1	19.8	18.9	19.8	20.2	19.7	19.4
E21118	18.9	18.9	19.4	18.6	19.2	19.9	18.8	18.9
E21125	19.3	18.7	19.7	18.6	19.8	20.1	19.6	19.8
E21127	19.1	18.9	19.8	18.6	19.8	19.9	19.2	18.8
E21345	19.2	18.8	19.5	19.1	20.3	19.8	19.5	19.5
LD19-7145	19.5	19.0	20.6	19.3	19.9	20.2	20.2	19.1
LD19-7165	20.1	20.2	21.2	20.0	20.3	21.0	20.1	19.7
LD20-0815	20.7	20.4	21.5	20.7	20.9	21.3	21.0	21.0
LD20-11062	20.1	20.1	20.3	19.8	20.9	20.6	20.2	20.0
LD20-4471	20.8	20.6	20.9	19.8	21.7	21.8	20.8	20.9
LD20-4988	20.2	19.5	20.9	19.8	20.4	21.1	20.2	20.5
LD20-5172	20.1	20.0	20.1	19.4	21.1	20.6	20.2	19.9
U19-204054	20.8	20.4	20.9	20.3	21.7	21.7	20.1	21.4
U19-230043	19.9	19.9	20.2	19.2	20.4	20.8	19.7	20.1
U20-908101	20.5	20.1	20.4	19.8	21.1	21.2	20.1	21.8
U20-910082	20.9	20.8	21.0	20.8	21.4	21.3	20.5	21.3
U20-917147	20.5	20.4	20.5	19.6	21.1	21.4	20.5	21.0
U20-928077	20.2	20.1	20.8	19.7	20.9	21.1	20.0	20.5

**UNIFORM TEST II, 2024**

**OIL (%)**

Strain	Britton MI	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoytville OH	Chatham ONT
IA2102 (II)		19.4	19.7	19.9		19.3	17.8
LD17-2558 (SCN)		18.7	19.8	20.5		20.3	18.4
MN1905CN (E)		18.8	19.7	20.2		20.1	19.7
U14-910097 (SCN) (L)		19.6	20.1	20.5		20.5	19.7
A16373-82		19.3	19.5	20.9		20.4	18.7
A16373-101		19.2	19.9	21.0		19.9	18.8
A17107-95		19.4	19.3	20.3		19.8	18.7
A17112-19		20.7	20.6	21.5		21.1	20.3
A17112-34		20.6	19.8	20.9		21.0	19.7
A17112-72		20.7	20.2	20.6		21.0	19.6
A17112-202		21.0	20.4	20.7		20.3	19.6
A17437-29		19.2	19.3	20.2		19.2	17.8
A17438-64		20.8	20.5	21.6		20.8	19.6
CR184590		19.5	18.6	20.3		18.9	18.5
CR190377		20.2	19.1	20.5		20.8	19.0
CR193835		20.5	20.2	20.6		20.6	19.7
CR20-1893		20.3	20.7	20.4		19.0	18.7
CR20-5419		19.3	18.5	19.3		18.8	17.7
E20329		19.5	18.8	20.2		19.7	19.4
E20333		19.7	19.3	20.6		20.2	19.4
E20355		20.7	18.6	20.3		19.6	18.8
E21107		19.9	19.2	19.8		19.7	18.9
E21109		19.8	18.6	19.2		19.7	18.5
E21118		19.7	18.1	19.0		18.8	17.9
E21125		20.1	18.2	19.7		19.5	17.7
E21127		19.7	18.0	19.3		19.3	17.5
E21345		19.6	18.2	19.2		19.7	17.5
LD19-7145		20.0	18.8	19.0		19.9	18.4
LD19-7165		20.3	19.5	20.0		20.5	18.9
LD20-0815		20.8	19.9	20.4		20.6	19.7
LD20-11062		21.3	19.4	19.8		20.0	19.5
LD20-4471		21.9	20.5	21.7		19.4	20.1
LD20-4988		20.8	19.9	20.5		20.0	19.4
LD20-5172		20.4	19.3	20.3		20.2	19.3
U19-204054		21.5	20.4	21.2		19.8	20.1
U19-230043		20.8	19.1	20.7		19.8	18.6
U20-908101		21.3	19.9	20.8		20.2	19.3
U20-910082		21.7	19.9	20.8		20.4	20.5
U20-917147		21.0	19.7	20.9		19.8	19.8
U20-928077		20.5	19.6	20.5		19.6	19.3

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**Northern Regional Uniform Test  
Preliminary Test II, 2024**

Ent.	Strain	Parentage		Seed Source	Gen. Comp.	Unique Traits
		Female	Male			
1	IA2102 (II)	A04-545045	AgriPro 98180-A01-0613	Cai	F4	
2	LD17-2558 (SCN)	U11-614119	LD09-30224	Monteverde	F5	SCN
3	MN1905CN (E)	M08-365038	IA1026	Lorenz	F9	Yld, SCN
4	U14-910097 (SCN) (L)	U09-105007	LD07-3419	Graef	F5	SCN (HR, HR)
5	A18110-47	A14004-126	U14-211226	Singh	F5	
6	A18112-98	U14-213255	A14011-77	Singh	F5	
7	A18119-117	A14061-56	LD13-6678	Singh	F5	
8	A18124-23	A14018-51	U14-924158	Singh	F5	
9	A18271-108	A14004-126	AR14-247080/R10-2710	Singh	F5	
10	A18274-34	A14011-77	DSN11-12073/R10-230	Singh	F5	
11	A18277-42	A14004-126	SA13-1385/Walters	Singh	F5	
12	A18329-108	A14056-187	A14020-86	Singh	F5	
13	A18344-171	A14050-101	A14004-58	Singh	F5	
14	A18346-14Y	A14058-35	U13-609144	Singh	F5	
15	A18361-21	A14011-77	DSN11-12119/R11-8346	Singh	F5	
16	A18361-123	A14011-77	DSN11-12119/R11-8346	Singh	F5	
17	A18385-82	A14058-113	A14050-101	Singh	F5	
18	CR21-01259			Rainey		
19	CR21-01370			Rainey		
20	CR21-01530			Rainey		
21	CR21-01659			Rainey		
22	CR21-01851			Rainey		
23	CR21-06067			Rainey		
24	E22407	E15339	PI 068516	Wang	F5	SCN
25	E22415	E15339	PI 068516	Wang	F5	SCN
26	E22416	E15339	PI 068516	Wang	F5	SCN
27	LD21-6063	LD10-10198	U14-108007	Monteverde	F5	SCN
28	LD21-6298	LD10-10198	LD15-5776793	Monteverde	F5	SCN
29	ORC 4023	OAC Bruton	U14-910097	Eskandari		Conventional / SCN
30	ORC 4123	SC 4317N	OAC Marvel	Eskandari		Conventional / SCN
31	ORC 4323	OAC Bruton	OX172	Eskandari		Conventional / SCN
32	U20-134367	LD14-3702	U16-932015	Graef	F5	SCN
33	U20-134372	LD14-3702	U16-932015	Graef	F5	SCN
34	U20-135373	LD14-3702	U16-932015	Graef	F5	
35	U20-137350	U17-609217	U16-932015	Graef	F5	SCN, Rps
36	U20-137354	U17-609217	U16-932015	Graef	F5	SCN
37	U20-226190	U17-609217	U16-932015	Graef	F5	SCN, Rps
38	U20-232079	U14-206326	U16-216354	Graef	F5	
39	U21-912098	U17-238027	LD15-5776793	Graef	F5	SCN, Rps
40	U21-915158	U17-238027	U17-322103	Graef	F5	SCN, Rps

**PRELIMINARY TEST II, 2024**  
**DESCRIPTIVE AND DISEASE DATA**

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Strain	Descriptive Code
IA2102 (II)	WGTDYYI
LD17-2558 (SCN)	PGBSYbI
MN1905CN (E)	PTBDYYI
U14-910097 (SCN) (L)	PGTDYBfI
A18110-47	PGBDYHI
A18112-98	WGBSYYI
A18119-117	WLtBSYGI
A18124-23	WTTSYBI
A18271-108	PGBDYHI
A18274-34	PLtTDYYI
A18277-42	PGTDYBfI
A18329-108	WLtTDYGI
A18344-171	PGBDYGI
A18346-14Y	WGTSYYI
A18361-21	PGTDYYI
A18361-123	PGTDYYI
A18385-82	PGBDYI
CR21-01259	PLtBDYBrI
CR21-01370	WLtBSYHI
CR21-01530	PGBSYGI
CR21-01659	PLtBDYBrI
CR21-01851	PLtBSYBI
CR21-06067	P+WTBDYHI
E22407	WGTDYBfI
E22415	WGTDYBfI
E22416	WGTDYBfI
LD21-6063	PGBSYHI
LD21-6298	PLt+GBSYGI
ORC 4023	WGBDYI
ORC 4123	PGTSYYI
ORC 4323	WGBDYI
U20-134367	P+WLtBDYHI
U20-134372	P+WLtBSYBrI
U20-135373	PLtBDYBrI
U20-137350	PTBDYBrI
U20-137354	P+WLt+GBDYHI
U20-226190	PLtBDYHI
U20-232079	WLtBSYBI
U21-912098	PLt+GBDYHI
U21-915158	PGBSYbI

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**PRELIMINARY TEST II, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield 11 bu/a	Rank 11 No.	Maturity 9 Date	Lodging 9 Score	Plant Height 9 In.	Seed Size 10 g/100	Seed Quality 9 Score	<u>Composition</u>	
								Protein 10 %	Oil 10 %
IA2102 (II)	73.4	18	9/21	2.1	35	15.7	1.2	34.0	19.3
LD17-2558 (SCN)	77.2	4	3.3	1.5	35	16.1	1.3	33.1	19.8
MN1905CN (E)	69.2	40	-3.3	1.4	34	16.4	1.7	33.7	20.2
U14-910097 (SCN) (L)	77.2	5	6.6	1.9	33	15.1	1.2	32.5	20.7
A18110-47	74.2	13	1.6	1.2	31	16.8	1.3	33.4	20.2
A18112-98	76.7	7	4.8	1.2	36	15.1	1.3	34.2	19.7
A18119-117	70.9	35	2.2	1.7	34	14.7	1.4	32.7	20.4
A18124-23	72.8	23	0.3	1.4	36	15.2	1.3	33.7	20.5
A18271-108	74.9	12	5.1	1.6	35	15.3	1.2	33.2	20.1
A18274-34	71.5	27	-2.8	1.3	31	16.2	1.4	34.8	19.2
A18277-42	72.2	25	1.4	1.6	32	15.2	1.2	33.2	19.8
A18329-108	71.1	34	0.2	1.3	36	18.3	1.4	36.0	19.0
A18344-171	72.2	26	2.8	1.4	35	18.5	1.3	34.4	19.7
A18346-14Y	69.5	39	-4.6	1.5	32	14.4	1.3	33.4	19.8
A18361-21	73.1	20	-0.3	1.1	29	15.7	1.3	34.0	19.5
A18361-123	75.6	11	-0.8	1.2	31	15.7	1.2	34.6	19.4
A18385-82	71.2	32	-0.8	1.7	35	14.7	1.4	35.0	18.6
CR21-01259	72.4	24	6.1	1.2	34	15.3	1.2	33.2	20.0
CR21-01370	76.0	9	7.0	1.8	38	15.2	1.3	34.0	19.3
CR21-01530	71.4	28	7.1	1.3	35	13.4	1.3	33.7	19.3
CR21-01659	75.7	10	5.6	1.1	33	15.6	1.2	33.9	20.1
CR21-01851	73.5	17	8.3	1.1	35	14.0	1.1	32.8	19.4
CR21-06067	70.4	36	8.2	1.6	36	15.7	1.1	33.7	20.0
E22407	71.1	33	2.5	2.3	35	15.1	1.8	33.0	20.4
E22415	72.9	21	3.2	2.3	36	15.3	1.7	32.9	20.4
E22416	71.4	29	2.2	2.4	35	15.2	1.8	33.3	20.3
LD21-6063	73.6	16	-0.5	1.4	36	14.0	1.2	32.7	20.4
LD21-6298	77.3	3	1.4	1.3	33	15.7	1.2	32.8	20.1
ORC 4023	71.3	30	3.6	2.7	35	18.0	1.3	33.9	20.2
ORC 4123	70.1	37	-2.2	1.3	31	19.2	1.1	34.9	19.3
ORC 4323	71.2	31	-1.1	1.4	34	19.2	1.4	36.3	18.4
U20-134367	73.8	14	1.3	1.4	33	15.8	1.0	32.7	19.8
U20-134372	78.0	2	4.7	1.2	35	15.1	1.2	32.9	19.7
U20-135373	79.0	1	2.8	1.2	36	16.6	1.1	33.2	19.9
U20-137350	73.3	19	2.6	1.1	36	15.0	1.2	32.9	20.1
U20-137354	76.3	8	3.5	1.2	36	15.0	1.2	33.2	20.2
U20-226190	72.8	22	2.4	1.3	36	14.7	1.1	32.7	20.1
U20-232079	70.0	38	0.9	1.1	34	14.7	1.3	33.7	19.7
U21-912098	73.7	15	3.7	1.3	35	15.5	1.2	32.0	20.0
U21-915158	76.8	6	5.5	1.1	37	15.4	1.2	31.8	20.1
Mean	73.4			1.5	34.4	15.7	1.3	33.6	19.8
C.V. (%)	7.7								
L.S.D. (5%)	3.3								

120.1 Days After Planting

**PRELIMINARY TEST II, 2024**

**YIELD (bu/a)**

Strain	Mean 11 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	73.4	90.2	59.3	68.8	58.7	83.1
LD17-2558 (SCN)	77.2	85.0	61.8	69.4	71.9	84.7
MN1905CN (E)	69.2	79.3	52.8	60.1	60.8	72.1
U14-910097 (SCN) (L)	77.2	86.8	68.3	66.1	69.3	97.8
A18110-47	74.2	80.9	63.8	66.8	62.6	87.9
A18112-98	76.7	74.6	63.8	70.1	65.2	90.5
A18119-117	70.9	79.1	46.7	69.2	67.0	84.2
A18124-23	72.8	83.8	53.2	71.7	64.7	80.1
A18271-108	74.9	76.0	69.3	71.5	66.2	79.0
A18274-34	71.5	73.3	57.1	61.8	57.1	82.8
A18277-42	72.2	76.4	59.4	63.5	71.5	80.3
A18329-108	71.1	75.4	58.9	61.4	54.5	76.6
A18344-171	72.2	82.0	47.2	65.4	66.7	85.6
A18346-14Y	69.5	79.4	51.0	69.2	59.2	75.6
A18361-21	73.1	79.6	64.4	66.7	59.9	80.4
A18361-123	75.6	74.1	64.3	63.4	58.6	88.0
A18385-82	71.2	80.2	57.1	59.5	61.4	76.4
CR21-01259	72.4	81.6	55.8	65.6	69.4	88.2
CR21-01370	76.0	84.1	57.9	59.3	72.5	79.1
CR21-01530	71.4	78.3	50.2	66.2	63.9	83.8
CR21-01659	75.7	86.7	64.3	63.6	67.3	86.4
CR21-01851	73.5	78.6	59.0	62.7	66.8	86.0
CR21-06067	70.4	70.8	53.5	64.8	58.9	82.6
E22407	71.1	84.9	59.9	68.2	61.0	79.2
E22415	72.9	84.4	52.4	68.5	61.9	87.4
E22416	71.4	82.7	55.2	67.2	65.6	81.2
LD21-6063	73.6	77.5	59.0	67.1	69.5	75.8
LD21-6298	77.3	85.2	44.9	66.4	72.5	86.2
ORC 4023	71.3	74.1	64.3	71.4	61.0	77.5
ORC 4123	70.1	76.7	64.0	61.7	52.4	75.6
ORC 4323	71.2	78.6	65.8	67.9	59.6	64.5
U20-134367	73.8	80.2	56.6	70.2	63.6	90.1
U20-134372	78.0	85.2	63.8	71.8	69.6	90.5
U20-135373	79.0	90.7	69.7	79.8	67.2	83.7
U20-137350	73.3	84.0	63.0	71.0	67.6	89.4
U20-137354	76.3	79.6	61.6	72.9	72.8	84.1
U20-226190	72.8	73.7	56.5	69.5	65.6	83.9
U20-232079	70.0	69.1	59.7	69.7	60.5	74.6
U21-912098	73.7	69.8	63.4	70.6	72.9	87.0
U21-915158	76.8	73.3	59.2	69.5	65.9	81.8
Location Mean		79.6	58.9	67.2	64.6	82.6
C.V. (%)		7.5	11.1	8.0	6.1	7.0
L.S.D. (5%)		12.1	13.2	10.9	7.9	11.7
Row Sp. (In.)		30	30	30	30	30
Rows/Plot		4	4	4	4	4
Reps		2	2	2	2	2

**PRELIMINARY TEST II, 2024**

**YIELD (bu/a)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	50.7	84.6	63.2	90.7	53.6	104.5
LD17-2558 (SCN)	64.6	88.5	71.7	89.7	56.4	105.5
MN1905CN (E)	61.8	84.8	69.2	83.8	47.6	89.2
U14-910097 (SCN) (L)	63.3	96.5	77.0	90.8	41.5	91.4
A18110-47	57.3	98.8	81.2	89.2	40.7	88.8
A18112-98	67.2	86.8	82.0	86.2	50.0	107.2
A18119-117	42.4	85.6	78.0	84.2	49.0	94.1
A18124-23	51.3	88.0	76.9	84.5	50.0	96.2
A18271-108	64.3	91.6	75.6	86.8	54.3	89.1
A18274-34	56.1	85.9	74.1	86.3	45.9	105.9
A18277-42	58.6	91.5	77.9	83.9	46.0	85.4
A18329-108	61.8	88.9	66.6	82.5	54.4	100.9
A18344-171	59.9	81.8	78.4	82.7	48.9	95.6
A18346-14Y	52.2	83.8	60.9	89.3	39.0	104.6
A18361-21	48.1	94.2	76.7	93.0	41.5	99.3
A18361-123	60.1	101.6	67.6	97.0	54.3	104.0
A18385-82	57.6	90.3	73.5	74.9	49.3	103.1
CR21-01259	56.5	86.7	72.7	69.0	49.0	102.0
CR21-01370	69.0	86.9	77.4	83.9	48.8	118.4
CR21-01530	55.5	89.4	73.1	81.4	39.1	104.9
CR21-01659	60.3	91.0	77.0	79.1	45.5	112.0
CR21-01851	50.7	88.9	79.3	85.2	52.1	99.2
CR21-06067	46.0	85.1	80.4	87.2	48.0	97.3
E22407	63.8	75.6	60.8	86.2	52.6	90.1
E22415	63.7	77.4	70.8	87.8	55.1	92.3
E22416	65.8	79.2	54.3	79.8	60.2	94.3
LD21-6063	56.7	90.1	73.2	91.7	56.4	92.3
LD21-6298	68.3	90.5	81.7	92.6	48.5	113.6
ORC 4023	56.6	77.4	61.2	80.2	58.5	102.6
ORC 4123	53.8	80.8	69.6	78.3	55.8	102.3
ORC 4323	67.1	82.9	64.6	82.1	61.9	88.8
U20-134367	51.5	96.5	89.4	81.3	56.3	76.3
U20-134372	61.5	99.9	89.3	93.2	44.3	88.7
U20-135373	67.3	96.5	77.2	87.0	51.4	99.1
U20-137350	54.4	86.0	79.0	88.0	39.2	84.4
U20-137354	66.3	92.6	84.8	82.5	50.4	92.1
U20-226190	62.7	91.4	81.8	81.5	52.8	81.7
U20-232079	49.0	91.1	77.9	81.5	40.9	96.5
U21-912098	64.7	88.1	69.1	81.8	49.2	94.0
U21-915158	61.5	102.6	84.4	82.0	59.6	105.2
Location Mean	58.7	88.7	74.5	85.0	50.0	97.3
C.V. (%)	11.3	6.0	6.9	5.4	9.8	7.1
L.S.D. (5%)	13.4	10.8	10.3	9.4	9.9	13.9
Row Sp. (In.)	15	30	30	30	8	17
Rows/Plot	6	4	4	4	8	5
Reps	2	2	2	2	2	2

PRELIMINARY TEST II, 2024

YIELD RANK

Strain	Yield Rank	Ames IA	Lucas IA	Sutherland IA	Urbana IL	West Lafayette IN
IA2102 (II)	18	2	20	17	36	21
LD17-2558 (SCN)	4	7	15	14	5	15
MN1905CN (E)	40	22	34	38	30	39
U14-910097 (SCN) (L)	5	3	3	27	10	1
A18110-47	13	16	11	23	25	8
A18112-98	7	32	11	10	21	2
A18119-117	35	23	39	15	14	16
A18124-23	23	12	33	4	22	28
A18271-108	12	30	2	5	17	31
A18274-34	27	37	26	35	38	22
A18277-42	25	29	19	32	6	27
A18329-108	34	31	24	37	39	33
A18344-171	26	14	38	29	16	14
A18346-14Y	39	21	36	15	34	36
A18361-21	20	19	5	24	32	26
A18361-123	11	33	6	33	37	7
A18385-82	32	17	27	39	27	34
CR21-01259	24	15	30	28	9	6
CR21-01370	9	10	25	40	4	30
CR21-01530	28	26	37	26	23	19
CR21-01659	10	4	6	31	12	11
CR21-01851	17	25	22	34	15	13
CR21-06067	36	38	32	30	35	23
E22407	33	8	17	19	28	29
E22415	21	9	35	18	26	9
E22416	29	13	31	21	20	25
LD21-6063	16	27	22	22	8	35
LD21-6298	3	5	40	25	3	12
ORC 4023	30	34	6	6	29	32
ORC 4123	37	28	9	36	40	36
ORC 4323	31	24	4	20	33	40
U20-134367	14	17	28	9	24	4
U20-134372	2	5	10	3	7	2
U20-135373	1	1	1	1	13	20
U20-137350	19	11	14	7	11	5
U20-137354	8	19	16	2	2	17
U20-226190	22	35	29	12	19	18
U20-232079	38	40	18	11	31	38
U21-912098	15	39	13	8	1	10
U21-915158	6	36	21	13	18	24

PRELIMINARY TEST II, 2024

YIELD RANK

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	36	32	36	7	13	10
LD17-2558 (SCN)	9	21	28	8	5	6
MN1905CN (E)	15	31	31	24	29	32
U14-910097 (SCN) (L)	13	5	19	6	34	30
A18110-47	24	4	8	10	37	35
A18112-98	4	25	5	17	20	4
A18119-117	40	29	13	21	23	25
A18124-23	34	23	20	20	19	22
A18271-108	10	10	22	15	12	33
A18274-34	28	28	23	16	31	5
A18277-42	22	11	14	22	30	37
A18329-108	16	20	34	26	10	16
A18344-171	21	35	12	25	25	23
A18346-14Y	32	33	38	9	40	9
A18361-21	38	8	21	3	35	17
A18361-123	20	2	33	1	11	11
A18385-82	23	16	24	39	21	12
CR21-01259	27	26	27	40	24	15
CR21-01370	1	24	16	23	26	1
CR21-01530	29	18	26	33	39	8
CR21-01659	19	14	18	37	32	3
CR21-01851	35	19	10	19	16	18
CR21-06067	39	30	9	13	28	20
E22407	11	40	39	18	15	31
E22415	12	39	29	12	9	27
E22416	7	37	40	36	2	24
LD21-6063	25	17	25	5	6	28
LD21-6298	2	15	7	4	27	2
ORC 4023	26	38	37	35	4	13
ORC 4123	31	36	30	38	8	14
ORC 4323	5	34	35	28	1	34
U20-134367	33	5	1	34	7	40
U20-134372	18	3	2	2	33	36
U20-135373	3	7	17	14	17	19
U20-137350	30	27	11	11	38	38
U20-137354	6	9	3	27	18	29
U20-226190	14	12	6	32	14	39
U20-232079	37	13	15	31	36	21
U21-912098	8	22	32	30	22	26
U21-915158	17	1	4	29	3	7

**PRELIMINARY TEST II, 2024**

**MATURITY (date)**

Strain	Mean 9 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	9/21	9/21	9/19		9/16	9/9
LD17-2558 (SCN)	3	2	1		4	4
MN1905CN (E)	-3	-8	-1		-2	-4
U14-910097 (SCN) (L)	7	4	4		8	8
A18110-47	2	1	2		4	3
A18112-98	5	3	3		6	6
A18119-117	2	0	2		4	4
A18124-23	0	-3	3		2	1
A18271-108	5	1	3		5	7
A18274-34	-3	-5	1		-2	-3
A18277-42	1	1	1		1	1
A18329-108	0	-3	2		-1	-1
A18344-171	3	0	1		3	3
A18346-14Y	-5	-6	-1		-6	-6
A18361-21	-0	-3	1		0	2
A18361-123	-1	-3	1		0	1
A18385-82	-1	-3	1		0	-1
CR21-01259	6	5	3		10	7
CR21-01370	7	5	4		10	8
CR21-01530	7	6	4		11	8
CR21-01659	6	5	2		10	7
CR21-01851	8	8	4		11	10
CR21-06067	8	7	4		11	9
E22407	3	1	2		2	6
E22415	3	2	2		5	6
E22416	2	1	1		2	5
LD21-6063	-1	-7	1		1	-1
LD21-6298	1	-1	2		4	2
ORC 4023	4	3	2		4	5
ORC 4123	-2	-4	1		-4	-3
ORC 4323	-1	-4	1		2	-1
U20-134367	1	2	1		2	2
U20-134372	5	3	2		4	5
U20-135373	3	-1	1		4	3
U20-137350	3	1	2		4	4
U20-137354	4	3	1		4	5
U20-226190	2	-1	2		4	4
U20-232079	1	-2	1		2	2
U21-912098	4	0	2		3	3
U21-915158	6	3	2		6	6
Date Planted	5/23	5/19	6/1		5/22	5/8
Days to Mature	120	125	110		117	124

PRELIMINARY TEST II, 2024

MATURITY (date)

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)		9/25	9/20	9/23	10/1	9/25
LD17-2558 (SCN)		8	2	1	5	4
MN1905CN (E)		-3	-4	-4	-2	-4
U14-910097 (SCN) (L)		8	7	3	12	8
A18110-47		4	1	-2	3	-1
A18112-98		5	5	2	5	11
A18119-117		3	1	0	6	1
A18124-23		1	-1	-2	3	-1
A18271-108		9	5	2	6	11
A18274-34		-3	-4	-4	-2	-4
A18277-42		3	1	-1	5	3
A18329-108		0	-2	-1	5	3
A18344-171		3	3	-1	7	8
A18346-14Y		-5	-6	-5	-3	-5
A18361-21		2	-3	-2	3	-3
A18361-123		1	-2	-2	0	-4
A18385-82		0	-2	-5	4	-2
CR21-01259		9	5	2	7	9
CR21-01370		10	7	3	6	12
CR21-01530		6	7	1	12	11
CR21-01659		9	4	2	8	5
CR21-01851		11	8	3	11	12
CR21-06067		10	7	3	12	13
E22407		4	2	2	5	1
E22415		4	3	0	4	5
E22416		4	1	0	4	3
LD21-6063		2	-1	-2	3	-1
LD21-6298		3	0	-2	4	1
ORC 4023		5	2	1	6	5
ORC 4123		2	-5	-3	-1	-3
ORC 4323		1	-3	-2	-1	-4
U20-134367		3	1	-2	5	-2
U20-134372		9	3	1	8	10
U20-135373		5	3	-1	7	3
U20-137350		3	3	-2	7	1
U20-137354		5	3	-1	6	7
U20-226190		5	2	0	3	5
U20-232079		1	-1	-3	3	5
U21-912098		9	3	2	6	6
U21-915158		10	4	2	10	8
Date Planted		5/28	5/18	5/29	6/12	5/16
Days to Mature		120	125	117	111	132

PRELIMINARY TEST II, 2024

LODGING (score)

Strain	Mean 9 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	2.1	2.0			2.0	3.5
LD17-2558 (SCN)	1.5	1.0			1.5	2.0
MN1905CN (E)	1.4	1.0			1.0	2.5
U14-910097 (SCN) (L)	1.9	2.0			2.0	2.5
A18110-47	1.2	1.0			1.0	1.5
A18112-98	1.2	1.0			1.0	2.0
A18119-117	1.7	1.5			2.0	2.0
A18124-23	1.4	1.0			1.0	2.0
A18271-108	1.6	1.0			1.0	1.5
A18274-34	1.3	1.0			1.0	1.5
A18277-42	1.6	1.5			1.5	2.0
A18329-108	1.3	1.0			1.0	1.0
A18344-171	1.4	1.5			1.0	2.0
A18346-14Y	1.5	1.0			1.0	2.0
A18361-21	1.1	1.0			1.0	1.0
A18361-123	1.2	1.0			1.0	2.0
A18385-82	1.7	1.5			1.0	2.0
CR21-01259	1.2	1.5			1.0	1.0
CR21-01370	1.8	2.0			1.0	2.0
CR21-01530	1.3	1.0			1.0	1.0
CR21-01659	1.1	1.0			1.0	1.5
CR21-01851	1.1	1.0			1.0	1.0
CR21-06067	1.6	1.5			1.0	2.0
E22407	2.3	3.0			2.0	3.0
E22415	2.3	2.5			2.5	3.0
E22416	2.4	3.5			2.5	2.5
LD21-6063	1.4	1.0			1.5	2.0
LD21-6298	1.3	1.0			1.0	1.0
ORC 4023	2.7	3.0			3.0	4.0
ORC 4123	1.3	1.0			1.0	1.5
ORC 4323	1.4	1.0			1.5	2.0
U20-134367	1.4	1.0			1.0	1.5
U20-134372	1.2	1.0			1.0	1.5
U20-135373	1.2	1.0			1.0	1.5
U20-137350	1.1	1.0			1.0	1.5
U20-137354	1.2	1.0			1.0	1.0
U20-226190	1.3	1.0			1.0	2.0
U20-232079	1.1	1.0			1.0	1.0
U21-912098	1.3	1.0			1.0	1.5
U21-915158	1.1	1.0			1.0	1.0

**PRELIMINARY TEST II, 2024**

**LODGING (score)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	1.0	1.3	3.0	2.0	1.0	3.5
LD17-2558 (SCN)	1.0	1.0	2.0	2.0	1.0	2.0
MN1905CN (E)	1.0	1.0	2.0	1.5	1.0	2.0
U14-910097 (SCN) (L)	1.5	1.0	2.5	2.0	1.0	3.0
A18110-47	1.0	1.0	2.0	1.5	1.0	1.0
A18112-98	1.0	1.0	1.0	1.0	1.0	2.0
A18119-117	1.0	1.0	1.5	2.0	1.0	3.0
A18124-23	1.0	1.0	2.0	1.5	1.0	2.0
A18271-108	1.0	1.0	2.5	2.0	1.0	3.0
A18274-34	1.0	1.0	1.5	2.0	1.0	2.0
A18277-42	1.0	1.0	2.0	2.0	1.0	2.0
A18329-108	1.0	1.0	2.0	1.0	1.0	3.0
A18344-171	1.0	1.0	1.0	1.5	1.0	2.5
A18346-14Y	1.0	1.0	2.0	2.0	1.0	2.5
A18361-21	1.0	1.0	1.5	1.0	1.0	1.5
A18361-123	1.0	1.0	1.0	1.0	1.0	1.5
A18385-82	1.0	1.3	2.5	2.0	1.0	3.0
CR21-01259	1.0	1.0	1.0	1.5	1.0	1.5
CR21-01370	1.0	1.3	3.0	1.5	1.0	3.5
CR21-01530	1.0	1.0	1.5	1.0	1.0	3.0
CR21-01659	1.0	1.0	1.0	1.0	1.0	1.5
CR21-01851	1.0	1.3	1.5	1.0	1.0	1.5
CR21-06067	1.0	1.3	1.5	2.0	1.0	3.0
E22407	1.5	1.3	3.5	2.0	1.0	3.5
E22415	2.0	1.5	3.0	2.0	1.0	3.5
E22416	2.5	1.3	2.5	2.0	1.0	4.0
LD21-6063	1.0	1.0	1.5	1.5	1.0	2.5
LD21-6298	1.0	1.0	1.5	1.0	1.0	3.0
ORC 4023	2.5	2.0	3.5	2.0	1.0	3.0
ORC 4123	1.0	1.0	1.5	1.0	1.0	2.5
ORC 4323	1.0	1.0	2.5	2.0	1.0	1.0
U20-134367	1.0	1.0	2.0	1.5	1.0	3.0
U20-134372	1.0	1.0	1.0	1.0	1.0	2.5
U20-135373	1.0	1.0	1.0	1.0	1.0	2.5
U20-137350	1.0	1.0	1.0	1.0	1.0	1.5
U20-137354	1.0	1.0	1.5	1.0	1.0	2.5
U20-226190	1.0	1.0	2.0	1.0	1.0	1.5
U20-232079	1.0	1.0	1.0	1.0	1.0	2.0
U21-912098	1.0	1.5	1.5	2.0	1.0	1.5
U21-915158	1.0	1.3	1.0	1.0	1.0	1.5

**PRELIMINARY TEST II, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 9 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	35	36			32	37
LD17-2558 (SCN)	35	35			33	37
MN1905CN (E)	34	33			33	36
U14-910097 (SCN) (L)	33	35			32	36
A18110-47	31	31			28	33
A18112-98	36	35			33	40
A18119-117	34	37			30	37
A18124-23	36	39			29	39
A18271-108	35	37			32	38
A18274-34	31	30			30	33
A18277-42	32	35			31	35
A18329-108	36	35			32	37
A18344-171	35	37			32	38
A18346-14Y	32	32			31	33
A18361-21	29	32			27	30
A18361-123	31	30			27	32
A18385-82	35	34			32	38
CR21-01259	34	35			31	39
CR21-01370	38	38			35	40
CR21-01530	35	36			31	39
CR21-01659	33	34			31	36
CR21-01851	35	36			33	37
CR21-06067	36	36			32	41
E22407	35	34			36	37
E22415	36	33			32	39
E22416	35	33			35	37
LD21-6063	36	35			32	36
LD21-6298	33	34			31	36
ORC 4023	35	34			33	37
ORC 4123	31	30			27	31
ORC 4323	34	35			30	35
U20-134367	33	31			32	36
U20-134372	35	34			33	35
U20-135373	36	38			33	38
U20-137350	36	36			33	38
U20-137354	36	35			34	41
U20-226190	36	36			32	38
U20-232079	34	32			31	36
U21-912098	35	36			33	37
U21-915158	37	37			32	38

**PRELIMINARY TEST II, 2024**

**PLANT HEIGHT (inches)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	31	38	35	41	23	43
LD17-2558 (SCN)	34	37	36	38	23	44
MN1905CN (E)	33	38	32	39	21	41
U14-910097 (SCN) (L)	33	35	33	37	20	39
A18110-47	30	34	32	34	19	36
A18112-98	36	39	38	41	20	45
A18119-117	29	35	34	40	22	45
A18124-23	36	38	37	40	21	47
A18271-108	34	36	39	38	23	44
A18274-34	31	32	31	33	20	40
A18277-42	30	35	31	37	20	35
A18329-108	36	40	39	40	24	46
A18344-171	33	37	37	39	21	46
A18346-14Y	30	36	32	37	19	43
A18361-21	25	33	29	35	19	37
A18361-123	30	33	32	36	21	39
A18385-82	37	37	36	40	20	42
CR21-01259	32	35	34	38	20	44
CR21-01370	37	43	40	38	23	45
CR21-01530	31	39	37	41	20	42
CR21-01659	32	39	34	35	20	41
CR21-01851	31	37	35	42	22	43
CR21-06067	32	39	37	41	22	43
E22407	36	36	32	41	24	41
E22415	36	41	35	40	23	45
E22416	33	39	32	40	25	41
LD21-6063	35	40	37	38	24	45
LD21-6298	31	35	32	36	22	45
ORC 4023	36	39	35	41	24	41
ORC 4123	28	34	31	34	20	45
ORC 4323	34	38	34	37	22	39
U20-134367	30	37	33	36	21	45
U20-134372	34	37	37	41	22	43
U20-135373	36	37	38	39	22	45
U20-137350	34	40	38	41	21	45
U20-137354	36	39	37	41	23	44
U20-226190	37	38	36	42	23	41
U20-232079	31	37	35	41	20	47
U21-912098	37	37	34	38	22	45
U21-915158	38	40	40	42	23	42

**PRELIMINARY TEST II, 2024**

**SEED SIZE (g/100)**

Strain	Mean 10 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	15.7	17.1	14.0	14.4	16.0	15.9
LD17-2558 (SCN)	16.1	17.3	13.7	14.8	16.5	17.4
MN1905CN (E)	16.4	17.2	13.9	15.7	16.5	18.0
U14-910097 (SCN) (L)	15.1	15.6	13.6	13.8	14.9	16.5
A18110-47	16.8	17.4	14.8	15.9	17.8	18.4
A18112-98	15.1	15.3	13.2	14.7	15.1	16.0
A18119-117	14.7	14.7	12.5	13.6	14.9	15.6
A18124-23	15.2	16.5	12.8	14.4	15.6	16.6
A18271-108	15.3	14.8	14.1	16.1	15.3	16.3
A18274-34	16.2	16.5	13.6	15.2	16.9	17.9
A18277-42	15.2	15.5	13.4	14.2	16.1	15.9
A18329-108	18.3	19.8	16.3	17.6	18.3	18.4
A18344-171	18.5	19.4	15.5	16.5	19.3	20.5
A18346-14Y	14.4	15.6	13.2	12.1	14.7	15.8
A18361-21	15.7	16.2	14.2	15.2	15.9	17.2
A18361-123	15.7	15.6	14.1	15.2	15.6	17.6
A18385-82	14.7	15.5	13.2	11.9	15.0	15.5
CR21-01259	15.3	15.7	12.9	13.8	15.8	16.6
CR21-01370	15.2	15.1	13.2	12.9	16.1	17.1
CR21-01530	13.4	13.6	11.0	12.7	13.8	14.5
CR21-01659	15.6	16.3	12.9	14.8	16.3	17.5
CR21-01851	14.0	14.2	12.2	12.6	14.9	15.3
CR21-06067	15.7	15.8	13.7	14.9	15.4	17.2
E22407	15.1	15.8	13.3	14.6	15.1	15.8
E22415	15.3	16.0	13.4	15.6	14.5	16.7
E22416	15.2	16.3	14.0	14.6	14.8	15.7
LD21-6063	14.0	13.7	12.9	12.5	14.3	14.5
LD21-6298	15.7	16.6	14.1	13.6	16.3	17.1
ORC 4023	18.0	18.6	17.6	18.0	17.6	18.9
ORC 4123	19.2	20.8	17.8	18.4	18.8	21.9
ORC 4323	19.2	19.4	18.3	18.3	19.0	21.3
U20-134367	15.8	16.5	14.6	15.1	15.4	16.1
U20-134372	15.1	15.0	13.6	15.1	15.5	16.1
U20-135373	16.6	16.8	14.2	16.7	16.5	17.3
U20-137350	15.0	14.8	12.6	15.4	16.1	16.1
U20-137354	15.0	14.5	13.4	15.1	15.6	15.4
U20-226190	14.7	14.2	13.3	15.0	15.5	15.4
U20-232079	14.7	14.0	13.2	14.0	14.7	15.9
U21-912098	15.5	13.9	13.1	15.0	16.0	17.2
U21-915158	15.4	14.6	13.4	15.5	15.5	15.3

**PRELIMINARY TEST II, 2024**

**SEED SIZE (g/100)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	14.3	16.9	16.4		13.1	19.2
LD17-2558 (SCN)	14.7	17.7	16.4		14.4	18.5
MN1905CN (E)	15.2	17.1	17.1		14.3	19.1
U14-910097 (SCN) (L)	14.4	15.5	15.0		14.7	16.9
A18110-47	15.1	18.1	17.1		15.4	18.0
A18112-98	13.6	15.9	15.6		13.3	17.8
A18119-117	13.8	15.9	13.9		13.6	18.4
A18124-23	13.9	16.0	15.3		12.7	18.0
A18271-108	14.1	16.1	14.8		14.1	17.5
A18274-34	14.7	17.3	16.5		14.8	18.9
A18277-42	13.5	16.2	15.0		14.2	17.8
A18329-108	16.9	19.4	17.9		16.4	21.8
A18344-171	16.3	20.2	18.9		16.5	22.3
A18346-14Y	12.7	15.5	14.3		12.6	17.8
A18361-21	13.7	16.7	16.0		14.4	17.8
A18361-123	15.0	17.0	16.2		13.6	17.5
A18385-82	13.7	15.6	15.5		13.2	17.9
CR21-01259	14.4	16.0	14.8		14.5	18.0
CR21-01370	15.1	16.3	15.1		13.5	17.8
CR21-01530	12.4	14.0	12.9		13.2	16.0
CR21-01659	14.1	16.6	15.2		14.7	17.1
CR21-01851	13.0	14.3	13.0		13.6	16.5
CR21-06067	14.2	16.1	15.0		15.9	18.8
E22407	15.0	15.3	15.4		13.2	17.7
E22415	14.8	15.9	14.9		13.2	18.4
E22416	14.7	15.5	15.8		12.9	18.1
LD21-6063	13.3	15.1	14.4		12.4	16.5
LD21-6298	14.5	17.3	15.3		13.4	18.3
ORC 4023	17.8	17.1	16.5		16.5	20.9
ORC 4123	17.5	20.1	17.7		17.4	21.6
ORC 4323	17.9	19.6	18.6		18.0	21.2
U20-134367	15.0	17.3	16.3		14.3	17.4
U20-134372	14.0	17.0	14.0		13.7	17.4
U20-135373	15.4	18.5	16.0		14.5	20.1
U20-137350	13.8	15.9	14.5		13.6	17.2
U20-137354	14.6	16.5	15.1		13.3	16.8
U20-226190	14.1	15.8	15.0		12.4	16.3
U20-232079	13.2	16.1	13.9		13.3	18.3
U21-912098	14.6	17.0	15.7		14.7	17.7
U21-915158	15.6	17.2	15.2		14.7	16.9

**PRELIMINARY TEST II, 2024**

**SEED QUALITY (score)**

Strain	Mean 9 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	1.2	1.0	1.0	1.0	2.0	1.0
LD17-2558 (SCN)	1.3	1.0	1.0	1.0	2.0	1.0
MN1905CN (E)	1.7	1.0	1.0	1.0	2.0	1.5
U14-910097 (SCN) (L)	1.2	1.0	1.0	1.0	2.0	1.0
A18110-47	1.3	1.0	1.0	1.0	2.0	1.0
A18112-98	1.3	1.0	1.0	1.0	1.0	1.5
A18119-117	1.4	1.0	1.0	1.0	2.0	1.5
A18124-23	1.3	1.0	1.0	1.0	2.0	1.0
A18271-108	1.2	1.0	1.0	1.0	1.0	1.0
A18274-34	1.4	1.0	1.0	1.0	2.0	1.0
A18277-42	1.2	1.0	1.0	1.0	1.0	1.0
A18329-108	1.4	1.0	1.0	1.0	2.0	1.5
A18344-171	1.3	1.0	1.0	1.0	2.0	1.5
A18346-14Y	1.3	1.0	1.0	1.0	2.0	1.0
A18361-21	1.3	1.0	1.0	1.0	1.0	1.5
A18361-123	1.2	1.0	1.0	1.0	1.0	1.5
A18385-82	1.4	1.0	1.0	1.0	2.0	1.5
CR21-01259	1.2	1.0	1.0	1.0	1.0	1.0
CR21-01370	1.3	1.0	1.0	1.0	2.0	1.5
CR21-01530	1.3	1.0	1.0	1.0	2.0	1.0
CR21-01659	1.2	1.0	1.0	1.0	1.0	1.5
CR21-01851	1.1	1.0	1.0	1.0	2.0	1.0
CR21-06067	1.1	1.0	1.0	1.0	2.0	1.0
E22407	1.8	1.0	1.0	1.0	2.0	1.5
E22415	1.7	1.0	1.0	1.0	2.0	1.0
E22416	1.8	1.0	1.0	1.0	3.0	1.5
LD21-6063	1.2	1.0	1.0	1.0	1.0	1.0
LD21-6298	1.2	1.0	1.0	1.0	2.0	1.0
ORC 4023	1.3	1.0	1.0	1.0	2.0	2.0
ORC 4123	1.1	1.0	1.0	1.0	1.0	1.0
ORC 4323	1.4	1.0	1.0	1.0	2.0	2.0
U20-134367	1.0	1.0	1.0	1.0	1.0	1.0
U20-134372	1.2	1.0	1.0	1.0	2.0	1.0
U20-135373	1.1	1.0	1.0	1.0	2.0	1.0
U20-137350	1.2	1.0	1.0	1.0	2.0	1.0
U20-137354	1.2	1.0	1.0	1.0	2.0	1.0
U20-226190	1.1	1.0	1.0	1.0	1.0	1.0
U20-232079	1.3	1.0	1.0	1.0	1.0	1.5
U21-912098	1.2	1.0	1.0	1.0	1.0	1.0
U21-915158	1.2	1.0	1.0	1.0	1.0	2.0

**PRELIMINARY TEST II, 2024**

**SEED QUALITY (score)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	1.0	1.0	1.0			1.5
LD17-2558 (SCN)	2.5	1.0	1.0			1.0
MN1905CN (E)	2.0	1.0	1.0			5.0
U14-910097 (SCN) (L)	1.5	1.0	1.0			1.5
A18110-47	2.0	1.0	1.0			1.5
A18112-98	2.0	1.0	1.0			2.0
A18119-117	2.5	1.0	1.0			1.5
A18124-23	2.5	1.0	1.0			1.5
A18271-108	2.0	1.0	1.0			1.5
A18274-34	2.0	1.0	1.0			3.0
A18277-42	2.0	1.0	1.0			2.0
A18329-108	1.5	1.0	1.0			3.0
A18344-171	1.5	1.0	1.0			2.0
A18346-14Y	2.0	1.0	1.0			2.0
A18361-21	1.5	1.0	1.0			2.5
A18361-123	1.5	1.0	1.0			2.0
A18385-82	2.0	1.0	1.0			2.0
CR21-01259	2.0	1.0	1.0			1.5
CR21-01370	2.5	1.0	1.0			1.0
CR21-01530	2.5	1.0	1.0			1.0
CR21-01659	2.5	1.0	1.0			1.0
CR21-01851	1.0	1.0	1.0			1.0
CR21-06067	1.0	1.0	1.0			1.0
E22407	2.5	1.0	1.0			5.0
E22415	2.0	1.0	1.0			5.0
E22416	2.0	1.0	1.0			5.0
LD21-6063	3.0	1.0	1.0			1.0
LD21-6298	2.0	1.0	1.0			1.0
ORC 4023	2.0	1.0	1.0			1.0
ORC 4123	2.0	1.0	1.0			1.0
ORC 4323	2.0	1.0	1.0			1.5
U20-134367	1.0	1.0	1.0			1.0
U20-134372	2.0	1.0	1.0			1.0
U20-135373	1.0	1.0	1.0			1.0
U20-137350	1.5	1.0	1.0			1.0
U20-137354	2.0	1.0	1.0			1.0
U20-226190	1.5	1.0	1.0			1.0
U20-232079	3.0	1.0	1.0			1.0
U21-912098	2.5	1.5	1.0			1.0
U21-915158	2.0	1.0	1.0			1.0

**PRELIMINARY TEST II, 2024**

**PROTEIN (%)**

Strain	Mean 10 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	34.0	34.4	35.0	34.5	33.5	34.8
LD17-2558 (SCN)	33.1	34.5	33.9	33.6	31.9	33.4
MN1905CN (E)	33.7	33.7	33.6	34.2	33.0	35.2
U14-910097 (SCN) (L)	32.5	35.3	32.7	31.9	30.8	32.9
A18110-47	33.4	41.4	32.2	33.0	32.1	33.5
A18112-98	34.2	33.7	34.4	34.4	33.6	34.5
A18119-117	32.7	34.1	33.0	33.2	31.5	32.6
A18124-23	33.7	34.0	34.3	33.2	33.3	34.0
A18271-108	33.2	33.5	33.4	34.5	32.4	32.3
A18274-34	34.8	35.1	35.4	34.8	34.8	35.5
A18277-42	33.2	33.7	34.0	34.1	32.5	32.8
A18329-108	36.0	36.7	37.0	36.0	36.1	36.1
A18344-171	34.4	33.6	34.3	33.9	33.0	35.1
A18346-14Y	33.4	33.5	33.5	33.9	32.8	34.9
A18361-21	34.0	33.5	34.9	34.0	33.1	34.6
A18361-123	34.6	33.9	35.2	34.1	33.2	34.7
A18385-82	35.0	35.9	35.0	36.6	34.7	34.8
CR21-01259	33.2	34.2	34.4	34.5	33.3	30.7
CR21-01370	34.0	33.7	33.9	35.9	33.3	33.5
CR21-01530	33.7	34.0	33.5	33.3	33.7	34.6
CR21-01659	33.9	34.3	35.0	34.7	33.7	34.7
CR21-01851	32.8	32.9	34.3	34.0	32.3	32.8
CR21-06067	33.7	33.6	34.9	34.5	33.0	34.8
E22407	33.0	34.7	31.7	32.4	32.6	34.2
E22415	32.9	33.6	32.8	33.4	32.2	33.4
E22416	33.3	33.2	33.2	33.9	32.7	32.9
LD21-6063	32.7	33.0	34.1	33.9	31.4	32.8
LD21-6298	32.8	33.0	32.4	34.0	32.1	33.0
ORC 4023	33.9	34.4	33.9	34.0	33.0	34.8
ORC 4123	34.9	36.1	34.1	35.6	35.2	37.3
ORC 4323	36.3	36.3	36.8	36.5	35.1	38.2
U20-134367	32.7	33.3	33.5	32.6	31.3	32.5
U20-134372	32.9	33.7	34.0	34.1	31.9	33.0
U20-135373	33.2	33.5	34.5	34.2	32.5	33.0
U20-137350	32.9	33.0	33.5	33.5	31.8	34.3
U20-137354	33.2	33.8	34.4	33.9	31.5	32.7
U20-226190	32.7	33.1	33.7	33.2	32.2	32.0
U20-232079	33.7	33.8	34.1	33.3	33.4	34.9
U21-912098	32.0	32.0	32.8	32.5	32.0	32.4
U21-915158	31.8	32.1	32.9	32.4	31.1	31.8

**PRELIMINARY TEST II, 2024**

**PROTEIN (%)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	32.7	32.6	34.1		34.6	34.2
LD17-2558 (SCN)	31.2	33.3	33.0		33.5	33.0
MN1905CN (E)	34.9	32.7	32.2		33.9	33.6
U14-910097 (SCN) (L)	31.2	32.6	32.9		32.8	32.3
A18110-47	32.3	33.1	31.5		33.1	32.3
A18112-98	34.5	33.7	34.3		34.7	34.0
A18119-117	30.1	33.8	32.1		32.8	33.8
A18124-23	32.0	33.8	33.9		33.8	34.2
A18271-108	34.2	33.1	32.2		33.5	33.2
A18274-34	33.8	34.3	34.8		35.7	34.1
A18277-42	32.1	33.0	32.4		34.3	33.0
A18329-108	33.2	35.8	35.9		36.1	36.6
A18344-171	34.0	35.6	34.5		34.6	35.6
A18346-14Y	31.1	33.8	33.2		33.9	33.4
A18361-21	32.6	34.9	34.2		34.8	33.8
A18361-123	34.3	35.6	34.9		35.9	34.0
A18385-82	33.8	34.2	34.7		36.6	33.8
CR21-01259	32.7	32.7	32.2		33.7	33.8
CR21-01370	34.6	33.7	33.1		34.7	33.9
CR21-01530	34.0	33.9	32.4		34.0	33.4
CR21-01659	32.6	34.1	32.5		33.9	33.9
CR21-01851	31.6	30.2	32.7		34.7	32.5
CR21-06067	32.9	33.4	32.6		34.0	33.7
E22407	32.3	33.6	32.1		33.2	33.0
E22415	33.1	32.1	33.6		32.1	32.9
E22416	33.7	34.5	33.8		32.3	33.3
LD21-6063	30.7	32.5	32.2		32.7	33.4
LD21-6298	32.8	32.6	32.3		32.2	33.4
ORC 4023	34.3	33.2	33.2		34.4	34.1
ORC 4123	33.4	32.1	35.0		35.4	34.8
ORC 4323	37.0	36.3	36.9		35.5	34.9
U20-134367	32.3	32.5	32.2		34.1	32.8
U20-134372	31.4	32.8	32.2		33.2	32.9
U20-135373	31.5	33.0	32.3		33.9	33.4
U20-137350	30.8	32.9	32.4		33.6	33.2
U20-137354	33.7	33.3	31.4		34.1	33.1
U20-226190	31.6	32.9	31.7		33.3	33.2
U20-232079	34.0	33.0	33.2		33.6	33.7
U21-912098	31.3	31.6	31.3		32.2	31.5
U21-915158	30.0	32.3	31.5		32.5	31.8

**PRELIMINARY TEST II, 2024**

**OIL (%)**

Strain	Mean 10 Tests	Ames IA	Lucas IA	Suther- land IA	Urbana IL	West Lafayette IN
IA2102 (II)	19.3	18.9	19.9	18.7	20.1	19.5
LD17-2558 (SCN)	19.8	19.8	20.2	19.4	20.5	20.3
MN1905CN (E)	20.2	20.2	20.5	20.0	20.8	20.4
U14-910097 (SCN) (L)	20.7	20.6	21.0	20.6	21.7	20.8
A18110-47	20.2	20.2	20.5	19.5	20.8	20.5
A18112-98	19.7	20.2	20.3	19.3	20.3	19.7
A18119-117	20.4	20.2	20.9	19.5	21.2	21.0
A18124-23	20.5	20.5	20.7	20.3	21.2	20.8
A18271-108	20.1	20.3	20.8	19.5	21.0	20.9
A18274-34	19.2	19.1	19.7	19.0	19.8	19.3
A18277-42	19.8	20.0	20.3	18.8	20.3	20.5
A18329-108	19.0	18.6	19.2	18.4	20.4	19.5
A18344-171	19.7	20.1	20.3	19.4	20.9	19.5
A18346-14Y	19.8	19.4	20.4	18.9	20.6	20.0
A18361-21	19.5	19.5	20.1	19.2	20.4	19.9
A18361-123	19.4	19.7	19.7	19.5	20.4	19.5
A18385-82	18.6	18.3	18.9	17.3	19.3	19.4
CR21-01259	20.0	19.5	20.4	19.3	20.9	20.2
CR21-01370	19.3	19.8	20.2	17.8	20.2	20.0
CR21-01530	19.3	19.4	20.3	18.8	19.9	19.4
CR21-01659	20.1	19.9	20.4	19.4	21.0	20.0
CR21-01851	19.4	19.6	20.1	18.4	20.4	20.1
CR21-06067	20.0	20.3	20.3	19.3	20.7	20.0
E22407	20.4	19.8	21.2	20.5	21.1	20.0
E22415	20.4	20.2	21.3	20.1	21.1	20.3
E22416	20.3	19.9	21.2	20.2	21.1	20.3
LD21-6063	20.4	20.1	20.5	19.4	21.2	21.1
LD21-6298	20.1	20.0	21.0	18.8	20.9	20.7
ORC 4023	20.2	20.2	20.6	19.4	20.6	20.3
ORC 4123	19.3	18.7	20.1	18.3	20.2	18.6
ORC 4323	18.4	18.0	19.0	17.7	19.3	18.3
U20-134367	19.8	19.7	20.2	19.2	20.3	20.5
U20-134372	19.7	19.7	19.9	18.7	20.6	20.1
U20-135373	19.9	19.8	19.9	19.3	20.7	20.7
U20-137350	20.1	20.0	20.6	19.4	20.9	20.5
U20-137354	20.2	20.3	20.3	19.3	21.3	20.8
U20-226190	20.1	20.2	20.3	19.4	20.4	20.6
U20-232079	19.7	19.9	20.0	19.9	20.3	19.8
U21-912098	20.0	19.9	20.3	19.3	20.2	20.4
U21-915158	20.1	19.9	20.3	19.4	20.8	20.4

**PRELIMINARY TEST II, 2024**

**OIL (%)**

Strain	East Lansing MI	Cotes- field NE	Mead NE	Phillips NE	Hoyt- ville OH	Chatham ONT
IA2102 (II)	19.7	19.3	19.4		20.0	18.0
LD17-2558 (SCN)	20.4	19.2	19.9		19.6	18.9
MN1905CN (E)	19.4	19.5	20.7		20.4	19.9
U14-910097 (SCN) (L)	21.0	19.7	20.6		20.2	20.4
A18110-47	20.1	19.4	20.3		20.5	19.8
A18112-98	19.3	19.4	19.8		19.8	18.8
A18119-117	21.5	19.6	20.9		20.5	19.1
A18124-23	21.0	20.2	20.7		20.3	19.8
A18271-108	19.6	19.5	20.7		20.3	18.8
A18274-34	19.5	18.8	19.3		19.4	18.4
A18277-42	20.2	18.9	19.8		19.7	19.8
A18329-108	20.1	17.9	19.2		19.0	17.7
A18344-171	19.9	19.0	19.9		19.8	18.3
A18346-14Y	20.5	19.3	19.9		20.1	19.1
A18361-21	20.1	18.4	19.7		19.8	18.5
A18361-123	19.3	18.3	19.3		19.3	18.9
A18385-82	19.1	18.4	19.1		18.3	18.1
CR21-01259	20.2	19.8	21.0		20.0	18.8
CR21-01370	18.5	18.7	19.6		19.1	19.1
CR21-01530	18.5	18.7	20.2		19.4	18.6
CR21-01659	20.4	19.6	20.5		20.2	19.3
CR21-01851	19.9	17.8	19.8		18.9	18.7
CR21-06067	20.3	19.4	20.4		19.8	19.9
E22407	20.7	19.8	21.2		20.7	19.2
E22415	19.9	19.9	20.4		21.4	19.0
E22416	19.8	19.6	20.4		21.3	19.0
LD21-6063	20.9	19.8	20.4		20.4	19.8
LD21-6298	19.6	19.5	20.8		20.4	19.2
ORC 4023	21.6	19.7	20.4		19.7	20.0
ORC 4123	19.6	19.2	19.1		19.4	19.6
ORC 4323	17.9	18.1	18.5		18.7	18.5
U20-134367	19.8	19.4	20.0		19.8	19.5
U20-134372	20.5	18.9	20.3		19.7	18.8
U20-135373	20.7	19.4	20.5		19.6	18.9
U20-137350	21.0	19.6	20.3		19.6	18.8
U20-137354	19.4	19.7	21.1		19.7	19.9
U20-226190	20.6	19.2	20.2		20.2	19.8
U20-232079	19.1	19.5	19.6		20.1	18.7
U21-912098	20.1	19.8	20.5		19.9	19.7
U21-915158	20.8	19.1	20.4		20.0	19.6

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**Northern Regional Uniform Test  
Uniform Test III, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	LD11-2170 (III)	Syngenta 03JR313108	LD05-3171	Monteverde	9	F5	SCN, Rps1k
2	LD18-6596	U11-616086	LD11-2170	Monteverde	2	F5	SCN, Rps1k
3	LD07-3395bf (SCN) (L)	LD07-3395 Reselection		Monteverde	9	F5	SCN
4	U14-910097 (SCN) (E)	U09-105007	LD07-3419	Graef	6	F6	SCN (HR, HR)
5	A17102-209	U14-924158	DSN11-12119	Singh	23 PT III A	F5	Rps1c, SCN
6	A17111-146	SA13-1385	DSN11-12119	Singh	23 PT III A	F5	Rps1c, SCN
7	A17112-133	U14-924158	U14-910097	Singh	23 PT III A	F5	SCN
8	A17112-226	U14-924158	U14-910097	Singh	23 PT III A	F5	SCN
9	A17204-16	DSN11-12119 / T112 8466	U14-924158	Singh	23 SCN P III	F5	
10	CR183142	4J105-3-9	LD00-3309	Rainey	2	F6	SCN
11	CR183198	4J105-3-9	LD00-3309	Rainey	2	F6	SCN
12	CR184506	U09-133021	AR11-214001	Rainey	2	F6	H-Rps1a
13	CR191241	PI22S06-1364043	DS11-15053	Rainey	23 UT II	F5	H-Rps1k, SCN
14	CR194692	6J114-2-2	5J097-1-17-1	Rainey	1	F5	SCN
15	CR20-5111			Rainey	23 PT III B		
16	CR20-5340			Rainey	23 PT III B		
17	CR20-5633			Rainey	23 PT III B		
18	CR20-5933			Rainey	23 PT III B		
19	LD20-0902	LD14-6099a	LD11-2170	Monteverde	23 PT III B	F5	SCN, Rps1k
20	LD20-11526	LD12-3903	LD11-2170	Monteverde	1	F4	SCN, H-Rps1c+H-Rps1k
21	LD20-11665	LD12-3903	LD11-2170	Monteverde	23 PT III B	F5	SCN, Rps1k
22	LD20-1683	LD11-2170	LD12-3903	Monteverde	23 PT III B	F5	SCN
23	LD20-1791	LD11-2170	LD12-3903	Monteverde	23 PT III B	F5	SCN
24	LD20-5413	U14-925152	LD12-3903	Monteverde	23 SCN P III	F5	SCN (rhg1,4), Rps1c
25	LD20-5433	LD11-2170	LD12-3903	Monteverde	23 PT III B	F5	SCN, Rps1k
26	LG19-4084	LD10-10226	LG10-12237	Mahan	1	F6	Diversity, SCN
27	LG19-5656	LG10-13149	LG11-2963	Mahan	23 PT IV	F6	Genetic Diversity, SCN, H-Rps1c
28	SA19-10016	SA13-1310	LD11-2170	Scaboo	1	F5	Rhg1b, Rps1k, SC
29	SA19-10545	SA13-2699	LD11-2170	Scaboo	23 PT III B	F5	Rhg1-b, H-Rps1k, Rdc3, BSR
30	SA19-12541	U14-924158	LD11-2170	Scaboo	1	F5	Rhg1a, Rhg4, BSR, SC
31	SA21-4164	SA14-9653	LD15-5776793	Scaboo	23 PT III B	F5	SCN, Rps1a
32	U19-244132	U14-925152	U16-905090	Graef	23 PT III A	F5	IDC, H-Rps1k
33	U19-274052	U16-610243	U16-905090	Graef	23 PT III A	F5	Rps1k + Rps6
34	U19-274107	U14-910097	U16-903131	Graef	23 PT III A	F5	SCN, Rps
35	U19-274119	U14-910097	U16-903131	Graef	23 PT III A	F5	SCN
36	U19-277150	U14-222063	U16-610243	Graef	23 PT III A	F5	Rps6
37	U19-604203	U14-910097	LD11-2170	Graef	23 SCN U III	F5	Rps1k, SCN
38	U20-612185	U14-910097	U16-928123	Graef	23 PT III A	F5	SCN, Rps1c
39	U20-612253	LD14-3702	U16-609059	Graef	23 PT III A	F5	SCN, IDC, H-Rps1a+H-Rps1k
40	U20-914165	LD14-3702	U16-322178	Graef	23 PT III A	F5	SCN, Rps

**UNIFORM TEST III, 2024**  
**DESCRIPTIVE AND DISEASE DATA**

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Strain	Descriptive Code
LD11-2170 (III)	PLtBDYBrI
LD18-6596	WLtBDYYI
LD07-3395bf (SCN) (L)	WGTDYBfI
U14-910097 (SCN) (E)	PGTDYBfI
A17102-209	PTTDYBI
A17111-146	WTTDYBI
A17112-133	PLtTDYBI
A17112-226	PGTDYBfI
A17204-16	PGBDYIbI
CR183142	WLtTSYBI
CR183198	PTTSYBI
CR184506	PLtBSYBI
CR191241	PLtTDYBI
CR194692	WLtBSYBI
CR20-5111	PGBSYHI
CR20-5340	PGBDYIYI
CR20-5633	WGBSYBfI
CR20-5933	PGTSYIbI
LD20-0902	PGBDYHI
LD20-11526	PLtBDYBI
LD20-11665	PLtBDYBrI
LD20-1683	PLtBDYBrI
LD20-1791	PLtBDYBrI
LD20-5413	PGBDYIbI
LD20-5433	PLtBDYBI
LG19-4084	PGTDYBfI
LG19-5656	PTTDYBI
SA19-10016	PLtTDYBI
SA19-10545	PLtBDYBrI
SA19-12541	PLtTDYBrI
SA21-4164	PLtBSYBI
U19-244132	PLtBSYBI
U19-274052	PLtBDYBI
U19-274107	PLtBSYBrI
U19-274119	PGB+TSYBfI
U19-277150	PLtBDYBI
U19-604203	PLtBDYBrI
U20-612185	WGTDYBfI
U20-612253	PLtBSYBrI
U20-914165	PLtBDYBI

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**UNIFORM TEST III, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield 14 bu/a	Rank 14 No.	Maturity 13 Date	Lodging 13 Score	Plant Height 12 In.	Seed Size 13 g/100	Seed Quality 12 Score	<u>Composition</u>	
								Protein 14 %	Oil 14 %
LD11-2170 (III)	77.8	19	9/22	1.4	35	15.6	1.2	33.6	20.6
LD18-6596	78.1	17	4.0	1.3	33	15.1	1.2	33.0	20.3
LD07-3395bf (SCN) (L)	77.7	22	4.9	1.6	33	15.8	1.2	31.4	21.0
U14-910097 (SCN) (E)	77.2	24	0.8	2.3	33	14.8	1.2	32.7	20.8
A17102-209	79.4	8	1.0	1.6	35	14.7	1.1	30.8	20.6
A17111-146	78.4	12	5.2	2.1	39	13.9	1.2	32.1	20.3
A17112-133	80.7	2	2.8	1.6	34	14.4	1.0	31.5	20.9
A17112-226	81.0	1	1.7	1.7	34	16.9	1.4	32.2	20.8
A17204-16	79.0	9	3.0	1.9	39	14.8	1.2	32.4	21.0
CR183142	72.8	34	3.4	1.6	36	14.3	1.2	34.0	19.4
CR183198	70.8	39	1.3	1.4	34	14.4	1.3	34.1	19.8
CR184506	75.3	29	2.4	1.7	34	15.8	1.3	33.7	19.9
CR191241	70.0	40	1.9	2.0	37	16.4	1.3	33.6	19.8
CR194692	76.4	25	1.4	1.9	36	17.3	1.2	32.9	20.2
CR20-5111	72.8	35	2.4	1.1	32	17.9	1.2	32.8	20.2
CR20-5340	77.7	21	-0.7	1.9	35	15.6	1.2	32.5	20.4
CR20-5633	72.5	37	3.8	2.3	41	13.9	1.1	32.9	20.1
CR20-5933	74.9	31	0.0	1.8	36	13.4	1.2	33.7	19.8
LD20-0902	79.6	6	2.0	1.3	33	14.8	1.3	31.9	20.8
LD20-11526	78.3	15	4.7	2.0	37	15.0	1.1	33.5	20.5
LD20-11665	77.7	20	0.7	1.4	34	15.7	1.3	33.7	20.6
LD20-1683	79.5	7	0.9	1.5	35	17.0	1.1	33.2	20.7
LD20-1791	78.7	10	1.5	1.4	35	16.2	1.2	33.9	20.2
LD20-5413	77.9	18	1.4	1.4	33	14.9	1.2	32.8	20.7
LD20-5433	78.3	15	2.2	1.7	35	14.4	1.2	33.4	20.5
LG19-4084	80.1	5	0.9	2.5	33	15.5	1.3	32.7	20.6
LG19-5656	75.0	30	4.4	1.6	34	14.6	1.2	35.1	18.8
SA19-10016	78.4	13	3.4	1.4	37	13.9	1.2	33.4	20.4
SA19-10545	76.2	27	2.4	1.9	36	13.9	1.2	33.5	19.8
SA19-12541	72.7	36	3.4	1.3	34	12.8	1.2	31.3	21.2
SA21-4164	77.2	23	3.5	1.4	33	16.1	1.0	33.5	20.0
U19-244132	76.2	26	3.0	1.4	36	15.0	1.2	32.7	20.3
U19-274052	74.7	32	0.6	1.2	33	13.6	1.3	32.5	21.1
U19-274107	80.4	3	4.4	2.1	37	16.2	1.2	32.7	20.9
U19-274119	78.3	14	1.8	1.7	34	16.1	1.3	33.2	20.5
U19-277150	74.7	33	3.7	2.1	39	13.0	1.3	32.7	20.2
U19-604203	80.2	4	3.1	2.0	35	14.4	1.2	33.5	20.5
U20-612185	75.7	28	1.7	2.0	35	14.0	1.1	32.6	20.4
U20-612253	72.1	38	5.2	1.1	35	15.3	1.1	33.4	19.6
U20-914165	78.5	11	3.9	1.6	37	14.6	1.2	33.0	20.5
Mean	76.8			1.7	35.1	15.0	1.2	33.0	20.4
C.V. (%)	7.4								
L.S.D. (5%)	2.4								

118.8 Days After Planting

**UNIFORM TEST III, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	26 bu/a	26 No.	24 Date	25 Score	23 Height In.	24 Size g/100	23 Quality Score	25 Protein %	25 Oil %
LD11-2170 (III)	78.1	7	9/23	1.3	35	15.7	1.2	34.0	20.4
LD18-6596	80.6	2	3.2	1.2	34	15.2	1.3	33.0	20.1
LD07-3395bf (SCN) (L)	78.1	6	4.4	1.5	34	16.1	1.2	31.5	20.9
U14-910097 (SCN) (E)	78.2	5	0.5	2.2	33	15.5	1.3	32.8	20.7
CR183142	74.5	11	2.8	1.5	37	14.6	1.2	34.2	19.2
CR183198	71.5	12	1.2	1.3	35	14.7	1.3	34.4	19.5
CR184506	74.8	10	2.4	1.6	35	16.1	1.3	33.8	19.8
CR194692	76.8	8	1.0	1.6	36	17.6	1.3	33.2	20.0
LD20-11526	78.9	4	4.5	1.8	38	15.1	1.1	33.6	20.4
LG19-4084	81.0	1	1.0	2.4	33	15.9	1.2	32.9	20.5
SA19-10016	79.5	3	2.9	1.3	38	14.1	1.2	33.5	20.3
SA19-12541	76.3	9	3.3	1.2	35	13.1	1.3	31.4	20.9

122.9 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	39	39	35	35	33	34	33	34	34
LD11-2170 (III)	74.8	4	9/25	1.2	34	15.8	1.3	33.9	20.4
LD18-6596	77.4	1	3.5	1.3	33	15.3	1.4	32.9	20.0
LD07-3395bf (SCN) (L)	75.8	3	4.7	1.5	33	16.1	1.3	31.5	20.8
U14-910097 (SCN) (E)	75.9	2	0.4	2.0	33	15.5	1.4	32.6	20.7
CR183142	70.8	5	3.2	1.4	36	14.7	1.3	34.2	19.1
CR183198	67.4	7	1.3	1.2	34	14.8	1.3	34.4	19.5
CR184506	70.5	6	2.1	1.5	34	15.9	1.3	33.6	19.9

121.6 Days After Planting

**UNIFORM TEST III, 2024**

**YIELD (bu/a)**

Strain	Mean 14 Tests	Ames IA	Lucas IA	Perry IL*	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	77.8	88.9	58.1	45.2	80.5	67.5	81.7	81.9
LD18-6596	78.1	84.7	65.1	46.5	81.9	71.1	81.8	77.1
LD07-3395bf (SCN) (L)	77.7	85.8	59.5	34.2	79.3	61.1	89.5	80.4
U14-910097 (SCN) (E)	77.2	88.3	61.5	46.1	79.4	73.4	72.0	82.4
A17102-209	79.4	91.9	56.9	36.5	76.7	77.4	80.5	75.3
A17111-146	78.4	88.7	58.8	37.5	76.6	82.4	81.0	81.7
A17112-133	80.7	92.6	56.3	41.8	71.8	77.6	86.3	74.8
A17112-226	81.0	94.5	69.1	41.7	80.9	81.5	74.8	74.1
A17204-16	79.0	90.0	58.9	41.1	77.3	75.1	83.5	80.7
CR183142	72.8	78.9	53.7	37.2	71.5	67.1	85.0	76.0
CR183198	70.8	80.4	50.2	36.5	67.8	63.2	78.5	79.5
CR184506	75.3	78.3	56.9	49.5	79.9	68.3	79.7	80.2
CR191241	70.0	81.3	49.4	39.2	70.8	66.9	77.9	81.2
CR194692	76.4	80.3	56.4	38.0	75.9	78.5	83.7	82.9
CR20-5111	72.8	79.8	57.3	44.3	66.2	56.5	86.0	70.6
CR20-5340	77.7	92.8	55.0	43.5	85.1	72.2	82.8	83.7
CR20-5633	72.5	74.2	54.9	40.9	81.4	67.7	82.4	79.6
CR20-5933	74.9	74.8	59.4	39.8	83.0	65.6	77.3	78.8
LD20-0902	79.6	86.4	55.4	40.8	79.8	73.0	85.0	80.6
LD20-11526	78.3	84.3	56.9	47.1	87.4	82.9	81.5	81.4
LD20-11665	77.7	86.0	54.8	39.7	79.7	72.2	83.6	76.4
LD20-1683	79.5	93.1	61.5	45.2	81.2	75.1	84.2	83.1
LD20-1791	78.7	86.3	59.4	38.1	84.5	73.6	83.4	84.5
LD20-5413	77.9	87.8	54.7	42.5	77.3	68.0	84.5	82.1
LD20-5433	78.3	88.1	53.0	44.8	85.1	77.1	80.7	76.6
LG19-4084	80.1	92.0	65.5	41.0	85.1	82.5	72.0	79.3
LG19-5656	75.0	79.2	59.3	36.8	75.7	66.3	85.3	73.3
SA19-10016	78.4	85.3	64.1	36.4	79.3	71.3	84.1	78.7
SA19-10545	76.2	83.4	58.7	45.6	81.5	69.4	85.5	76.4
SA19-12541	72.7	65.2	51.4	41.6	75.6	70.8	74.6	74.2
SA21-4164	77.2	83.3	59.7	36.9	78.6	75.1	76.8	76.5
U19-244132	76.2	90.0	56.0	45.7	83.4	68.2	86.7	84.1
U19-274052	74.7	77.0	52.3	39.2	76.9	65.1	82.7	77.9
U19-274107	80.4	89.0	56.8	41.4	80.4	78.2	79.1	75.7
U19-274119	78.3	87.9	63.7	42.6	78.7	65.4	90.0	76.2
U19-277150	74.7	82.6	56.4	45.8	74.0	66.9	83.3	75.4
U19-604203	80.2	93.2	58.3	40.0	91.3	86.8	79.1	67.4
U20-612185	75.7	67.5	58.3	40.1	76.8	59.4	79.3	81.2
U20-612253	72.1	78.5	54.3	37.0	72.6	56.2	84.5	78.3
U20-914165	78.5	71.8	55.5	44.0	80.9	71.9	84.4	93.3
Location Mean		84.1	57.6	41.3	78.8	71.2	81.8	78.8
C.V. (%)		6.5	9.8	16.3	6.5	8.1	6.0	8.0
L.S.D. (5%)		8.9	9.1	13.6	10.3	11.7	9.9	12.8
Row Sp. (In.)		30	30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4	4
Reps		3	3	2	2	2	2	2

\* Data not included in mean.

**UNIFORM TEST III, 2024**

**YIELD (bu/a)**

Strain	West Lafayette IN	Man- hattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	88.6	76.4	79.0	80.2	87.0	82.4	73.3	65.3
LD18-6596	85.5	77.9	80.2	79.0	86.5	87.3	68.4	64.9
LD07-3395bf (SCN) (L)	93.7	73.2	86.7	78.4	88.0	85.9	67.0	60.5
U14-910097 (SCN) (E)	89.5	72.8	83.6	81.4	96.3	87.3	55.3	59.8
A17102-209	86.7	75.6	87.7	79.6	96.3	83.3	75.9	70.0
A17111-146	92.0	69.4	77.6	81.0	88.2	83.0	67.1	72.0
A17112-133	96.6	75.5	82.2	84.6	105.7	90.3	68.8	69.2
A17112-226	86.2	74.6	82.9	79.1	105.1	91.0	77.8	64.5
A17204-16	88.2	69.4	80.6	80.0	95.8	86.2	69.7	73.1
CR183142	85.2	64.2	73.2	72.9	90.3	78.1	64.5	65.0
CR183198	82.8	66.9	75.6	65.8	82.3	74.0	70.1	55.2
CR184506	86.4	70.4	75.2	72.8	83.4	91.2	65.9	64.4
CR191241	83.1	59.8	69.0	68.2	67.6	82.6	59.8	64.1
CR194692	88.5	66.5	71.8	75.8	90.0	84.8	56.0	74.7
CR20-5111	83.2	68.0	76.9	76.3	75.6	84.2	71.7	68.4
CR20-5340	94.8	72.7	78.9	71.8	88.7	86.3	63.1	61.7
CR20-5633	79.6	67.1	72.6	73.2	75.4	77.0	61.8	67.7
CR20-5933	76.0	70.1	78.7	78.8	88.4	83.7	67.2	62.1
LD20-0902	96.4	76.9	83.4	81.2	94.2	91.0	68.9	64.8
LD20-11526	88.3	70.3	75.1	80.6	89.9	85.6	67.4	66.0
LD20-11665	88.2	70.8	80.0	81.4	85.1	89.5	74.2	68.1
LD20-1683	85.3	71.6	79.2	81.9	90.8	87.9	69.9	70.3
LD20-1791	91.2	72.9	84.6	79.2	87.8	85.8	67.8	62.9
LD20-5413	88.5	71.5	83.8	75.9	97.2	88.1	63.4	70.5
LD20-5433	91.8	71.9	82.2	82.8	93.9	85.6	66.6	66.7
LG19-4084	96.9	73.7	84.4	80.1	100.7	87.4	52.6	70.7
LG19-5656	88.4	70.2	75.9	73.3	83.6	81.9	72.1	67.4
SA19-10016	91.0	72.3	76.7	79.9	87.1	84.7	77.9	67.3
SA19-10545	88.3	70.0	76.2	83.2	89.3	83.8	64.4	59.0
SA19-12541	92.2	76.5	74.5	83.7	78.5	84.2	62.1	55.6
SA21-4164	91.6	74.1	79.7	78.7	86.0	78.0	77.4	65.0
U19-244132	81.6	68.4	78.0	73.0	88.9	83.2	65.1	62.8
U19-274052	82.9	71.2	73.0	73.3	96.7	89.3	65.6	63.5
U19-274107	94.0	73.8	82.4	85.7	98.0	86.8	74.0	73.3
U19-274119	90.8	74.9	83.1	74.6	96.9	88.3	66.9	65.9
U19-277150	73.2	69.4	73.3	74.2	91.4	86.7	72.8	67.4
U19-604203	96.0	74.6	82.4	79.7	96.0	85.9	68.4	65.8
U20-612185	85.4	74.2	77.9	75.7	95.7	90.7	68.9	71.5
U20-612253	82.9	68.4	67.9	66.7	87.6	79.2	67.8	71.0
U20-914165	84.1	73.9	76.2	81.0	93.9	94.1	69.3	67.2
Location Mean	87.9	71.6	78.6	77.6	90.0	85.4	67.7	66.1
C.V. (%)	6.7	3.7	6.3	6.1	6.7	5.0	10.3	6.9
L.S.D. (5%)	11.9	4.3	8.0	7.7	14.8	8.6	14.1	7.4
Row Sp. (In.)	30	30	30	30	30	30	30	8
Rows/Plot	4	4	4	4	4	4	4	8
Reps	2	3	3	3	2	2	2	3

**UNIFORM TEST III, 2024**

**YIELD RANK**

Strain	Yield Rank	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler-ville IN	Wanatah IN
LD11-2170 (III)	19	11	18	8	15	28	24	9
LD18-6596	17	22	3	3	9	21	23	25
LD07-3395bf (SCN) (L)	22	20	9	40	21	37	2	16
U14-910097 (SCN) (E)	24	13	6	4	20	15	39	7
A17102-209	8	7	21	37	29	9	28	34
A17111-146	12	12	14	32	30	4	26	10
A17112-133	2	5	26	16	36	8	4	35
A17112-226	1	1	1	17	14	5	37	37
A17204-16	9	8	13	20	26	12	17	14
CR183142	34	32	35	33	37	29	8	31
CR183198	39	28	39	38	39	36	33	19
CR184506	29	34	20	1	17	24	29	17
CR191241	40	27	40	28	38	31	34	13
CR194692	25	29	25	31	31	6	15	6
CR20-5111	35	30	19	11	40	39	5	39
CR20-5340	21	4	30	13	5	17	20	4
CR20-5633	37	37	31	22	11	27	22	18
CR20-5933	31	36	10	26	8	33	35	21
LD20-0902	6	17	29	23	18	16	9	15
LD20-11526	15	23	22	2	2	2	25	11
LD20-11665	20	19	32	27	19	18	16	28
LD20-1683	7	3	7	8	12	11	13	5
LD20-1791	10	18	11	30	6	14	18	2
LD20-5413	18	16	33	15	25	26	10	8
LD20-5433	15	14	36	10	3	10	27	26
LG19-4084	5	6	2	21	3	3	40	20
LG19-5656	30	31	12	36	32	32	7	38
SA19-10016	13	21	4	39	22	20	14	22
SA19-10545	27	24	15	7	10	23	6	28
SA19-12541	36	40	38	18	33	22	38	36
SA21-4164	23	25	8	35	24	12	36	27
U19-244132	26	9	27	6	7	25	3	3
U19-274052	32	35	37	29	27	35	21	24
U19-274107	3	10	23	19	16	7	31	32
U19-274119	14	15	5	14	23	34	1	30
U19-277150	33	26	24	5	34	30	19	33
U19-604203	4	2	16	25	1	1	32	40
U20-612185	28	39	17	24	28	38	30	12
U20-612253	38	33	34	34	35	40	10	23
U20-914165	11	38	28	12	13	19	12	1

**UNIFORM TEST III, 2024**

**YIELD RANK**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	16	4	19	13	30	34	7	23
LD18-6596	27	1	15	21	31	13	18	26
LD07-3395bf (SCN) (L)	7	15	2	24	26	20	25	36
U14-910097 (SCN) (E)	15	17	6	7	9	14	39	37
A17102-209	24	5	1	18	8	30	4	10
A17111-146	9	31	24	10	25	32	24	4
A17112-133	2	6	12	2	1	6	17	11
A17112-226	26	8	9	20	2	4	2	28
A17204-16	23	31	14	15	11	18	13	3
CR183142	30	39	35	35	18	37	31	25
CR183198	36	37	30	40	36	40	11	40
CR184506	25	25	31	36	35	2	28	29
CR191241	33	40	39	38	40	33	37	30
CR194692	17	38	38	27	19	24	38	1
CR20-5111	32	35	25	25	38	26	10	12
CR20-5340	5	18	20	37	23	17	34	35
CR20-5633	38	36	37	33	39	39	36	14
CR20-5933	39	28	21	22	24	29	23	34
LD20-0902	3	2	7	9	13	3	15	27
LD20-11526	20	26	32	12	20	23	22	20
LD20-11665	22	24	16	8	33	7	5	13
LD20-1683	29	21	18	6	17	11	12	9
LD20-1791	12	16	3	19	27	21	20	32
LD20-5413	17	22	5	26	5	10	33	8
LD20-5433	10	20	12	5	15	22	27	19
LG19-4084	1	14	4	14	3	12	40	7
LG19-5656	19	27	29	31	34	35	9	15
SA19-10016	13	19	26	16	29	25	1	17
SA19-10545	20	29	28	4	21	28	32	38
SA19-12541	8	3	33	3	37	27	35	39
SA21-4164	11	11	17	23	32	38	3	24
U19-244132	37	33	22	34	22	31	30	33
U19-274052	34	23	36	32	7	8	29	31
U19-274107	6	13	11	1	4	15	6	2
U19-274119	14	7	8	29	6	9	26	21
U19-277150	40	30	34	30	16	16	8	16
U19-604203	4	8	10	17	10	19	19	22
U20-612185	28	10	23	28	12	5	16	5
U20-612253	34	34	40	39	28	36	21	6
U20-914165	31	12	27	10	14	1	14	18

**UNIFORM TEST III, 2024**

**MATURITY (date)**

Strain	Mean 13 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	9/22	9/23	9/20		9/25	9/23	9/16	9/12
LD18-6596	4	3	2		6	6	2	5
LD07-3395bf (SCN) (L)	5	6	-0		6	6	6	5
U14-910097 (SCN) (E)	1	3	-2		-1	2	2	-1
A17102-209	1	3	1		-3	0	0	-3
A17111-146	5	6	0		9	8	5	4
A17112-133	3	3	1		1	4	2	1
A17112-226	2	3	-1		3	1	3	-2
A17204-16	3	4	1		5	4	3	1
CR183142	3	4	-1		7	4	3	5
CR183198	1	3	-0		5	0	0	1
CR184506	2	2	1		6	5	2	2
CR191241	2	3	0		3	0	2	2
CR194692	1	-0	-0		3	4	0	-1
CR20-5111	2	4	1		2	2	3	2
CR20-5340	-1	0	-1		-1	-3	-2	-2
CR20-5633	4	3	1		7	1	4	5
CR20-5933	0	1	-2		1	-2	-1	-1
LD20-0902	2	4	0		5	1	1	2
LD20-11526	5	3	1		8	8	5	4
LD20-11665	1	1	-1		2	2	0	-2
LD20-1683	1	2	0		2	1	0	1
LD20-1791	2	3	-0		7	3	-1	0
LD20-5413	1	0	0		5	1	2	1
LD20-5433	2	0	1		7	4	3	2
LG19-4084	1	1	0		2	0	3	-2
LG19-5656	4	6	1		6	5	6	4
SA19-10016	3	5	-0		6	3	3	3
SA19-10545	2	4	-1		7	2	1	3
SA19-12541	3	1	1		7	4	4	2
SA21-4164	3	6	-0		7	4	2	3
U19-244132	3	4	0		2	2	2	5
U19-274052	1	1	-1		1	2	-1	1
U19-274107	4	4	1		7	6	4	1
U19-274119	2	3	-0		2	1	3	-1
U19-277150	4	4	-0		5	4	4	6
U19-604203	3	4	0		6	7	2	0
U20-612185	2	-2	0		-1	0	3	1
U20-612253	5	6	1		8	7	6	4
U20-914165	4	2	-1		6	4	3	6
Date Planted	5/26	5/19	6/1		5/23	5/22	5/30	5/6
Days to Mature	119	127	111		125	124	109	129

**UNIFORM TEST III, 2024**

**MATURITY (date)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	9/16	9/29	9/19	10/4	9/21		9/23	10/4
LD18-6596	5	2	3	4	5		4	7
LD07-3395bf (SCN) (L)	7	1	4	6	5		3	11
U14-910097 (SCN) (E)	1	-1	-1	1	1		0	6
A17102-209	-1	1	2	5	3		1	4
A17111-146	8	4	3	5	5		3	8
A17112-133	5	1	2	3	5		3	7
A17112-226	1	-1	1	3	4		3	5
A17204-16	3	2	3	3	3		3	5
CR183142	5	1	3	2	5		1	7
CR183198	2	-0	1	3	1		1	3
CR184506	-1	1	2	1	3		3	6
CR191241	2	1	2	2	2		4	3
CR194692	1	-1	2	2	1		1	8
CR20-5111	4	0	2	2	2		4	6
CR20-5340	-1	-1	-1	0	1		1	0
CR20-5633	2	4	2	4	5		6	6
CR20-5933	0	-1	2	0	3		-1	1
LD20-0902	2	0	2	2	3		2	3
LD20-11526	5	3	4	3	6		5	7
LD20-11665	1	0	1	2	2		0	1
LD20-1683	0	-0	2	0	1		2	2
LD20-1791	3	-0	0	3	1		1	2
LD20-5413	-1	-1	-1	2	4		1	5
LD20-5433	3	0	1	2	4		0	4
LG19-4084	1	-1	2	2	2		1	2
LG19-5656	8	1	2	3	4		4	8
SA19-10016	5	1	3	2	4		4	6
SA19-10545	5	1	1	3	2		1	5
SA19-12541	5	1	2	4	4		4	8
SA21-4164	5	0	2	3	4		3	8
U19-244132	4	2	3	4	5		2	6
U19-274052	0	-2	2	2	0		1	3
U19-274107	6	3	3	4	6		5	9
U19-274119	1	1	2	3	5		2	3
U19-277150	4	1	2	3	6		5	6
U19-604203	4	1	2	2	4		3	6
U20-612185	1	3	2	3	3		3	6
U20-612253	6	3	6	2	6		5	9
U20-914165	4	3	6	5	3		3	7
Date Planted	5/8	6/10	5/30	6/11	5/23		5/30	6/12
Days to Mature	131	111	112	115	121		116	114

**UNIFORM TEST III, 2024**

**LODGING (score)**

Strain	Mean 13 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	1.4	1.0		1.0	1.0	1.0	2.0	1.0
LD18-6596	1.3	0.9		1.0	1.0	1.0	1.0	1.5
LD07-3395bf (SCN) (L)	1.6	1.0		1.0	1.0	1.0	2.5	1.5
U14-910097 (SCN) (E)	2.3	1.0		1.0	1.3	2.5	4.0	2.0
A17102-209	1.6	1.3		1.0	1.0	1.5	1.5	2.0
A17111-146	2.1	1.3		1.0	1.0	2.0	3.5	2.0
A17112-133	1.6	1.0		1.0	1.5	1.5	2.0	1.5
A17112-226	1.7	1.0		1.0	1.0	1.5	2.5	1.5
A17204-16	1.9	1.3		1.0	1.0	2.0	2.5	1.0
CR183142	1.6	1.0		1.0	1.0	1.0	2.5	1.0
CR183198	1.4	1.0		1.0	1.0	1.0	2.0	1.0
CR184506	1.7	1.0		1.0	1.0	1.0	2.5	1.0
CR191241	2.0	1.3		1.0	1.3	1.0	2.5	2.0
CR194692	1.9	1.7		1.0	1.8	1.5	2.5	2.0
CR20-5111	1.1	1.0		1.0	1.0	1.0	1.0	1.0
CR20-5340	1.9	1.0		1.0	1.0	1.5	3.0	2.0
CR20-5633	2.3	2.0		1.0	1.0	1.5	3.0	2.0
CR20-5933	1.8	1.0		1.0	1.0	1.0	2.5	1.5
LD20-0902	1.3	1.0		1.0	1.0	1.0	1.5	1.0
LD20-11526	2.0	1.3		1.0	1.0	1.5	3.0	1.5
LD20-11665	1.4	1.0		1.0	1.0	1.0	2.5	1.0
LD20-1683	1.5	1.0		1.0	1.0	1.0	2.0	1.0
LD20-1791	1.4	1.0		1.0	1.0	1.0	2.0	1.0
LD20-5413	1.4	1.0		1.0	1.0	1.0	2.0	1.0
LD20-5433	1.7	1.0		1.0	1.0	1.0	2.0	1.0
LG19-4084	2.5	2.0		1.0	2.0	2.5	3.5	2.0
LG19-5656	1.6	1.7		1.0	1.0	1.0	2.0	1.0
SA19-10016	1.4	1.0		1.0	1.0	1.0	3.0	1.0
SA19-10545	1.9	1.0		1.0	1.0	1.0	2.0	1.5
SA19-12541	1.3	1.0		1.0	1.0	1.0	2.0	1.0
SA21-4164	1.4	1.0		1.0	1.0	1.0	1.5	1.5
U19-244132	1.4	1.0		1.0	1.0	1.0	2.0	1.0
U19-274052	1.2	1.0		1.0	1.0	1.0	1.5	1.0
U19-274107	2.1	1.7		1.0	1.5	1.5	2.5	2.0
U19-274119	1.7	1.3		1.0	1.0	1.5	2.5	1.5
U19-277150	2.1	1.3		1.0	1.5	2.0	2.5	2.0
U19-604203	2.0	1.0		1.0	1.8	2.5	2.0	1.0
U20-612185	2.0	1.0		1.0	1.0	1.5	2.5	2.0
U20-612253	1.1	1.0		1.0	1.0	1.0	1.5	1.0
U20-914165	1.6	1.0		1.0	1.0	1.0	3.0	2.0

**UNIFORM TEST III, 2024**

**LODGING (score)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	1.0	1.7	2.0	1.5	2.8		1.5	1.0
LD18-6596	1.0	1.0	2.0	2.0	1.8		2.0	1.0
LD07-3395bf (SCN) (L)	1.5	2.0	1.5	1.5	2.3		2.5	1.0
U14-910097 (SCN) (E)	2.0	3.0	3.0	2.0	3.8		3.0	1.0
A17102-209	2.0	1.7	2.0	1.5	2.3		1.5	1.0
A17111-146	2.0	2.7	3.0	1.5	3.5		2.5	1.0
A17112-133	1.0	2.0	2.0	2.0	3.3		1.5	1.0
A17112-226	1.0	2.0	2.5	1.5	3.3		2.0	1.0
A17204-16	1.5	2.7	3.0	2.0	3.3		3.0	1.0
CR183142	1.0	2.0	2.0	1.5	3.0		3.0	1.0
CR183198	1.0	1.3	1.0	1.5	2.3		2.5	1.0
CR184506	1.0	2.3	2.0	1.5	3.8		2.5	1.0
CR191241	2.0	3.0	3.0	1.5	3.5		3.5	1.0
CR194692	1.0	2.7	1.5	1.5	3.5		3.0	1.0
CR20-5111	1.0	1.0	1.0	1.5	1.5		1.5	1.0
CR20-5340	2.0	2.0	2.0	1.5	2.3		4.0	1.0
CR20-5633	2.0	4.0	2.5	2.0	4.5		4.0	1.0
CR20-5933	1.5	2.3	2.0	1.5	3.5		3.5	1.0
LD20-0902	1.0	1.0	2.0	1.5	2.5		1.0	1.0
LD20-11526	1.5	2.7	2.5	2.0	3.8		3.0	1.0
LD20-11665	1.0	1.3	1.5	1.5	3.0		1.5	1.0
LD20-1683	1.0	1.7	2.0	1.5	2.8		2.5	1.0
LD20-1791	1.0	1.0	2.5	1.5	2.5		1.5	1.0
LD20-5413	1.0	1.7	1.5	1.5	2.8		2.0	1.0
LD20-5433	2.0	2.0	3.0	1.5	3.3		2.5	1.0
LG19-4084	3.0	3.3	2.5	2.0	3.8		4.0	1.0
LG19-5656	1.0	1.3	1.5	2.0	3.8		2.5	1.0
SA19-10016	1.0	1.7	2.0	1.5	2.5		1.0	1.0
SA19-10545	2.0	1.7	4.0	2.0	3.3		3.0	1.0
SA19-12541	1.0	1.0	1.5	2.0	1.5		2.0	1.0
SA21-4164	1.0	1.0	1.5	2.0	3.3		2.0	1.0
U19-244132	1.5	1.3	1.5	1.5	2.5		2.5	1.0
U19-274052	1.0	1.0	1.5	1.5	1.5		1.5	1.0
U19-274107	2.0	2.7	2.0	2.0	4.0		3.5	1.0
U19-274119	2.0	2.0	1.5	1.5	2.8		2.0	1.0
U19-277150	2.0	2.3	3.0	2.0	3.3		3.0	1.0
U19-604203	2.0	2.7	2.5	1.5	3.8		3.0	1.0
U20-612185	2.0	2.3	4.0	2.0	3.3		2.0	1.0
U20-612253	1.0	1.0	1.0	1.5	1.5		1.0	1.0
U20-914165	1.0	1.7	2.0	1.5	2.8		1.5	1.0

**UNIFORM TEST III, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	35	35			36	32	35	36
LD18-6596	33	36			34	30	32	32
LD07-3395bf (SCN) (L)	33	36			34	26	37	33
U14-910097 (SCN) (E)	33	35			33	30	35	36
A17102-209	35	37			36	34	37	34
A17111-146	39	40			41	34	44	42
A17112-133	34	35			34	30	37	34
A17112-226	34	37			35	33	36	34
A17204-16	39	41			43	38	45	38
CR183142	36	38			36	33	39	36
CR183198	34	36			35	32	35	36
CR184506	34	36			36	32	35	35
CR191241	37	38			38	35	38	39
CR194692	36	38			37	34	40	37
CR20-5111	32	35			31	29	33	32
CR20-5340	35	36			36	35	38	36
CR20-5633	41	43			43	37	44	44
CR20-5933	36	37			37	33	35	37
LD20-0902	33	33			36	30	35	33
LD20-11526	37	39			38	35	40	38
LD20-11665	34	35			35	33	35	33
LD20-1683	35	37			36	31	35	37
LD20-1791	35	35			36	33	35	36
LD20-5413	33	36			31	32	36	35
LD20-5433	35	35			36	34	35	36
LG19-4084	33	35			35	31	36	34
LG19-5656	34	36			34	31	37	33
SA19-10016	37	37			37	36	39	38
SA19-10545	36	38			37	33	37	38
SA19-12541	34	35			37	34	36	35
SA21-4164	33	35			32	31	35	35
U19-244132	36	38			38	34	38	38
U19-274052	33	35			35	28	34	34
U19-274107	37	38			39	37	38	39
U19-274119	34	36			37	34	39	31
U19-277150	39	40			42	36	41	40
U19-604203	35	37			35	36	34	36
U20-612185	35	38			36	33	39	36
U20-612253	35	35			36	29	38	37
U20-914165	37	37			39	35	40	39

**UNIFORM TEST III, 2024**

**PLANT HEIGHT (inches)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	38	35	33	33	42		35	27
LD18-6596	35	33	35	32	42		34	23
LD07-3395bf (SCN) (L)	38	35	32	28	41		35	23
U14-910097 (SCN) (E)	36	33	31	31	39		32	25
A17102-209	38	34	35	31	44		35	28
A17111-146	43	38	35	35	47		37	29
A17112-133	38	36	33	35	44		33	27
A17112-226	36	33	34	33	43		35	24
A17204-16	41	39	38	35	44		36	30
CR183142	41	35	34	32	42		36	27
CR183198	37	35	32	32	43		36	24
CR184506	37	37	30	32	43		34	25
CR191241	42	36	34	33	43		36	30
CR194692	38	37	33	34	42		36	27
CR20-5111	35	32	30	28	41		34	25
CR20-5340	38	35	34	32	39		36	25
CR20-5633	46	39	37	37	46		41	33
CR20-5933	39	35	32	34	43		37	28
LD20-0902	38	33	32	31	42		33	24
LD20-11526	42	37	37	36	43		35	29
LD20-11665	38	34	32	30	42		36	27
LD20-1683	37	35	34	33	42		36	27
LD20-1791	38	36	34	32	42		34	26
LD20-5413	35	35	34	28	41		32	25
LD20-5433	39	34	30	34	42		35	27
LG19-4084	36	32	32	30	39		32	26
LG19-5656	38	35	30	32	42		36	27
SA19-10016	43	36	35	35	44		38	27
SA19-10545	40	34	35	33	43		36	23
SA19-12541	38	35	34	33	42		33	23
SA21-4164	36	34	32	31	42		35	25
U19-244132	40	35	37	35	43		36	27
U19-274052	37	34	33	32	42		33	24
U19-274107	44	37	35	35	43		34	29
U19-274119	38	35	34	28	41		34	26
U19-277150	42	36	37	36	46		37	30
U19-604203	38	34	35	34	43		33	25
U20-612185	39	35	33	35	42		33	25
U20-612253	40	37	34	32	43		36	27
U20-914165	39	37	35	34	44		36	29

**UNIFORM TEST III, 2024**

**SEED SIZE (g/100)**

Strain	Mean 13 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	15.6	15.7	12.5		16.3	16.8	15.7	15.0
LD18-6596	15.1	15.3	13.6		16.2	15.6	15.3	14.2
LD07-3395bf (SCN) (L)	15.8	16.4	13.2		16.0	16.3	17.0	13.1
U14-910097 (SCN) (E)	14.8	15.3	12.8		14.7	15.8	15.4	13.2
A17102-209	14.7	15.3	12.6		14.7	15.9	15.1	13.2
A17111-146	13.9	14.3	11.8		13.9	15.0	15.1	12.3
A17112-133	14.4	15.1	12.1		14.0	15.6	15.3	12.5
A17112-226	16.9	17.3	14.4		17.1	18.6	17.2	13.7
A17204-16	14.8	16.0	12.5		14.6	16.5	15.9	12.6
CR183142	14.3	15.1	12.3		14.7	15.2	15.3	13.0
CR183198	14.4	15.5	12.7		14.9	14.1	14.7	12.6
CR184506	15.8	15.7	14.0		16.5	16.2	15.4	15.2
CR191241	16.4	16.8	14.2		16.3	16.8	18.0	14.8
CR194692	17.3	18.5	14.9		17.7	18.2	19.2	14.8
CR20-5111	17.9	18.7	15.7		18.5	19.4	18.8	16.5
CR20-5340	15.6	16.2	13.9		15.9	15.8	16.3	12.7
CR20-5633	13.9	14.0	11.9		14.8	14.4	15.8	12.4
CR20-5933	13.4	13.4	11.4		14.7	14.3	13.7	12.2
LD20-0902	14.8	14.9	12.1		15.4	16.1	15.2	13.9
LD20-11526	15.0	15.3	12.1		15.5	16.6	16.0	14.1
LD20-11665	15.7	16.2	13.0		16.3	16.9	16.6	14.2
LD20-1683	17.0	17.9	14.8		17.2	17.9	17.5	16.2
LD20-1791	16.2	16.4	13.8		17.1	17.1	16.1	15.0
LD20-5413	14.9	15.0	12.2		15.1	15.8	15.7	13.8
LD20-5433	14.4	14.7	11.9		14.8	16.1	15.1	13.1
LG19-4084	15.5	16.0	13.1		15.2	16.4	15.9	13.7
LG19-5656	14.6	16.2	12.5		14.6	14.8	15.5	13.1
SA19-10016	13.9	14.5	11.9		14.4	14.5	15.2	12.4
SA19-10545	13.9	14.7	11.4		14.7	14.7	14.4	12.7
SA19-12541	12.8	12.2	11.0		13.8	13.5	13.5	11.9
SA21-4164	16.1	17.0	14.2		17.1	17.0	15.7	15.0
U19-244132	15.0	16.1	12.9		15.1	15.5	15.5	14.1
U19-274052	13.6	14.2	11.9		13.3	14.2	15.2	12.9
U19-274107	16.2	16.7	13.8		16.2	17.2	16.7	13.5
U19-274119	16.1	16.7	13.9		16.9	17.1	15.5	14.2
U19-277150	13.0	13.7	11.2		13.2	13.7	14.5	11.9
U19-604203	14.4	14.9	12.1		15.2	16.3	14.0	12.0
U20-612185	14.0	13.1	12.4		14.3	13.7	15.8	12.5
U20-612253	15.3	15.9	13.4		16.1	15.6	15.7	13.2
U20-914165	14.6	14.2	12.9		15.2	14.6	15.0	13.9

**UNIFORM TEST III, 2024**

**SEED SIZE (g/100)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	16.8	16.9	15.7	16.5	15.0		15.7	13.9
LD18-6596	15.9	16.1	14.3	16.2	14.7		15.0	13.9
LD07-3395bf (SCN) (L)	16.8	16.6	15.6	17.4	16.5		15.9	14.6
U14-910097 (SCN) (E)	16.4	15.1	14.3	15.6	15.6		13.9	14.5
A17102-209	16.6	15.3	14.9	15.6	14.5		13.9	13.1
A17111-146	15.0	14.1	13.7	15.2	13.5		12.9	13.3
A17112-133	16.0	14.2	14.1	16.7	15.6		13.3	13.2
A17112-226	18.9	16.9	17.1	18.6	17.4		17.0	15.0
A17204-16	15.2	14.5	14.4	16.2	14.3		15.0	14.2
CR183142	14.9	13.5	14.3	15.2	14.8		14.3	13.5
CR183198	15.1	14.6	15.0	15.5	13.6		14.8	13.9
CR184506	16.7	16.9	15.6	16.7	15.3		15.7	15.1
CR191241	17.5	16.4	16.6	17.0	15.2		16.5	16.5
CR194692	17.5	18.0	17.4	18.8	17.5		15.4	16.6
CR20-5111	19.9	16.9	17.8	19.4	15.8		18.2	17.3
CR20-5340	17.0	16.7	16.9	16.5	16.2		15.5	12.7
CR20-5633	14.2	14.5	13.5	15.4	13.6		13.8	13.0
CR20-5933	14.3	13.9	14.3	14.7	13.2		12.9	11.6
LD20-0902	15.8	15.6	14.7	16.0	14.6		14.0	13.7
LD20-11526	15.8	14.6	14.9	16.3	14.7		14.7	14.4
LD20-11665	16.0	16.3	15.9	16.3	14.7		15.6	15.6
LD20-1683	17.8	16.9	17.4	18.7	16.6		16.5	15.7
LD20-1791	17.5	16.8	16.3	17.3	15.7		16.1	15.1
LD20-5413	15.1	14.1	15.2	17.5	14.4		14.1	15.1
LD20-5433	15.4	13.8	14.6	16.4	13.8		13.6	13.5
LG19-4084	17.4	15.6	16.7	16.1	16.6		14.5	13.7
LG19-5656	15.2	13.8	14.4	15.8	14.9		14.2	14.6
SA19-10016	13.2	14.0	13.9	15.3	13.9		13.8	13.3
SA19-10545	14.7	14.2	14.3	15.0	14.0		13.3	13.2
SA19-12541	13.6	13.4	12.2	14.2	12.0		12.7	12.2
SA21-4164	17.1	16.4	16.2	17.6	15.8		15.9	14.5
U19-244132	14.8	16.2	14.6	16.2	15.3		15.1	14.1
U19-274052	13.3	14.3	13.3	14.8	13.6		13.1	12.4
U19-274107	17.1	16.4	16.7	18.6	15.7		15.5	16.6
U19-274119	17.6	16.0	16.0	17.7	16.6		15.9	15.3
U19-277150	12.2	13.3	12.6	14.1	13.6		13.3	12.1
U19-604203	15.1	15.6	15.0	15.2	14.7		13.8	13.8
U20-612185	14.5	14.6	14.3	15.3	15.0		13.6	13.1
U20-612253	15.9	16.2	14.9	16.3	15.6		14.0	15.8
U20-914165	15.1	15.3	14.2	16.4	15.1		14.0	14.2

**UNIFORM TEST III, 2024**

**SEED QUALITY (score)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	1.2	1.0	1.0		1.0	2.0	1.0	1.0
LD18-6596	1.2	1.0	1.0		1.5	2.0	1.0	1.0
LD07-3395bf (SCN) (L)	1.2	1.0	1.0		1.5	1.0	1.0	1.0
U14-910097 (SCN) (E)	1.2	1.0	1.0		1.0	2.0	1.0	1.0
A17102-209	1.1	1.0	1.0		1.0	2.0	1.0	1.0
A17111-146	1.2	1.0	1.0		1.5	2.0	1.0	1.0
A17112-133	1.0	1.0	1.0		1.0	1.0	1.0	1.0
A17112-226	1.4	1.0	1.0		2.0	2.0	1.0	1.0
A17204-16	1.2	1.0	1.0		1.5	1.0	1.0	1.0
CR183142	1.2	1.0	1.0		1.0	2.0	1.0	1.0
CR183198	1.3	1.0	1.0		1.5	2.0	1.0	1.5
CR184506	1.3	1.0	1.0		2.0	2.0	1.0	1.0
CR191241	1.3	1.0	1.0		1.5	1.0	1.0	1.5
CR194692	1.2	1.0	1.0		1.0	1.0	1.0	1.0
CR20-5111	1.2	1.0	1.3		1.5	2.0	1.0	1.0
CR20-5340	1.2	1.0	1.0		1.0	2.0	1.0	1.0
CR20-5633	1.1	1.0	1.0		1.0	1.0	1.0	1.0
CR20-5933	1.2	1.0	1.0		1.0	2.0	1.0	1.0
LD20-0902	1.3	1.0	1.0		1.5	2.0	1.0	1.0
LD20-11526	1.1	1.0	1.0		1.0	2.0	1.0	1.0
LD20-11665	1.3	1.0	1.0		1.5	2.0	1.0	1.5
LD20-1683	1.1	1.0	1.0		1.0	1.0	1.0	1.0
LD20-1791	1.2	1.0	1.0		1.0	2.0	1.0	1.0
LD20-5413	1.2	1.0	1.0		1.5	2.0	1.0	1.0
LD20-5433	1.2	1.0	1.0		1.0	2.0	1.0	1.0
LG19-4084	1.3	1.0	1.0		1.5	2.0	2.0	1.0
LG19-5656	1.2	1.0	1.0		1.5	2.0	1.0	1.0
SA19-10016	1.2	1.0	1.0		1.5	2.0	1.5	1.0
SA19-10545	1.2	1.0	1.0		1.5	2.0	1.0	1.0
SA19-12541	1.2	1.0	1.0		1.5	1.0	1.0	1.0
SA21-4164	1.0	1.0	1.0		1.5	1.0	1.0	1.0
U19-244132	1.2	1.0	1.0		1.0	2.0	1.0	1.0
U19-274052	1.3	1.0	1.0		1.0	2.0	1.0	2.0
U19-274107	1.2	1.0	1.0		1.0	2.0	1.0	1.0
U19-274119	1.3	1.0	1.0		1.0	2.0	1.0	1.0
U19-277150	1.3	1.0	1.0		1.5	2.0	1.0	1.0
U19-604203	1.2	1.0	1.0		1.0	2.0	1.0	1.0
U20-612185	1.1	1.0	1.0		1.0	1.0	1.5	1.0
U20-612253	1.1	1.0	1.0		1.5	2.0	1.0	1.0
U20-914165	1.2	1.0	1.0		1.0	2.0	1.0	1.0

**UNIFORM TEST III, 2024**

**SEED QUALITY (score)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	1.0	2.0	1.0	1.0	1.0		1.0	
LD18-6596	1.0	2.0	1.0	1.0	1.0		1.0	
LD07-3395bf (SCN) (L)	1.0	2.0	1.0	2.0	1.0		1.0	
U14-910097 (SCN) (E)	1.5	2.0	1.0	1.0	1.0		1.0	
A17102-209	1.5	1.0	1.0	1.0	1.0		1.0	
A17111-146	1.0	2.0	1.0	1.0	1.0		1.0	
A17112-133	1.5	1.0	1.0	1.0	1.0		1.0	
A17112-226	1.5	3.0	1.0	1.0	1.0		1.0	
A17204-16	1.5	2.0	1.0	1.0	1.0		1.0	
CR183142	1.0	2.0	1.0	1.0	1.0		1.0	
CR183198	1.0	2.0	1.0	1.0	1.0		1.0	
CR184506	1.0	2.0	1.0	1.0	1.0		1.0	
CR191241	1.5	3.0	1.0	1.0	1.0		1.0	
CR194692	1.5	2.0	1.0	2.0	1.0		1.0	
CR20-5111	1.0	2.0	1.0	1.0	1.0		1.0	
CR20-5340	1.0	2.0	1.0	1.5	1.0		1.0	
CR20-5633	1.0	2.0	1.0	1.0	1.0		1.0	
CR20-5933	2.0	1.0	1.0	1.0	1.0		1.0	
LD20-0902	1.5	2.0	1.0	1.0	1.0		1.0	
LD20-11526	1.0	1.0	1.0	1.0	1.0		1.0	
LD20-11665	1.0	2.0	1.0	1.0	1.0		1.0	
LD20-1683	1.0	2.0	1.0	1.0	1.0		1.0	
LD20-1791	1.0	2.0	1.0	1.0	1.0		1.0	
LD20-5413	1.0	2.0	1.0	1.0	1.0		1.0	
LD20-5433	1.0	2.0	1.0	1.0	1.0		1.0	
LG19-4084	1.0	2.0	1.0	1.0	1.0		1.0	
LG19-5656	1.0	2.0	1.0	1.0	1.0		1.0	
SA19-10016	1.0	1.0	1.0	1.5	1.0		1.0	
SA19-10545	1.0	2.0	1.0	1.0	1.0		1.0	
SA19-12541	1.0	3.0	1.0	1.0	1.0		1.0	
SA21-4164	1.0	1.0	1.0	1.0	1.0		1.0	
U19-244132	1.0	2.0	1.0	1.0	1.0		1.0	
U19-274052	1.0	2.0	1.0	1.0	1.0		1.0	
U19-274107	1.5	2.0	1.0	1.0	1.0		1.0	
U19-274119	1.0	3.0	1.0	1.0	1.0		1.0	
U19-277150	1.0	2.0	1.0	2.0	1.0		1.0	
U19-604203	1.0	2.0	1.0	1.0	1.0		1.0	
U20-612185	1.0	2.0	1.0	1.0	1.0		1.0	
U20-612253	1.0	1.0	1.0	1.0	1.0		1.0	
U20-914165	1.0	2.0	1.0	1.0	1.0		1.0	

**UNIFORM TEST III, 2024**

**PROTEIN (%)**

Strain	Mean 14 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	33.6	33.4	33.7	33.3	31.1	32.7	34.2	33.6
LD18-6596	33.0	34.5	33.6	33.0	33.0	32.6	34.1	33.4
LD07-3395bf (SCN) (L)	31.4	32.1	31.4	32.9	29.8	30.1	32.5	31.8
U14-910097 (SCN) (E)	32.7	33.0	33.6	33.3	30.7	32.9	33.5	32.4
A17102-209	30.8	31.0	30.4	32.0	28.9	31.0	31.4	30.9
A17111-146	32.1	32.4	32.9	32.8	30.2	32.3	33.3	31.2
A17112-133	31.5	31.8	32.5	32.6	28.4	30.8	32.8	31.5
A17112-226	32.2	32.1	32.0	32.6	30.5	32.0	35.2	31.1
A17204-16	32.4	32.9	31.2	32.7	31.1	31.7	34.6	32.5
CR183142	34.0	34.3	33.8	33.6	33.2	33.1	35.5	33.8
CR183198	34.1	34.4	34.6	33.7	32.2	33.4	36.2	34.2
CR184506	33.7	33.5	34.4	33.2	32.3	34.1	35.5	33.2
CR191241	33.6	34.7	33.7	33.3	31.2	32.9	35.2	33.1
CR194692	32.9	34.0	33.0	32.9	32.9	32.2	35.0	32.2
CR20-5111	32.8	32.8	33.2	32.0	30.8	32.8	35.3	32.1
CR20-5340	32.5	33.4	32.0	33.3	30.2	31.7	34.5	31.6
CR20-5633	32.9	33.1	33.7	33.8	32.8	32.1	34.2	33.0
CR20-5933	33.7	34.5	34.4	31.5	32.7	33.9	34.7	33.3
LD20-0902	31.9	32.9	32.0	32.1	30.2	31.7	33.0	31.7
LD20-11526	33.5	34.0	33.4	33.2	31.0	34.7	34.6	33.5
LD20-11665	33.7	33.1	34.3	33.8	32.0	32.9	35.3	34.0
LD20-1683	33.2	33.4	33.2	32.5	31.4	33.2	34.6	33.4
LD20-1791	33.9	34.1	33.4	33.6	33.1	33.6	35.1	34.6
LD20-5413	32.8	33.6	35.0	32.4	31.0	32.0	33.3	33.4
LD20-5433	33.4	33.2	34.2	33.5	31.5	32.9	33.9	33.3
LG19-4084	32.7	33.3	32.7	32.7	31.8	31.0	33.0	32.7
LG19-5656	35.1	35.5	37.0	35.4	34.0	34.1	36.2	35.0
SA19-10016	33.4	34.0	32.7	33.5	32.6	32.5	34.3	34.0
SA19-10545	33.5	34.0	33.6	33.9	32.3	32.0	34.8	32.7
SA19-12541	31.3	31.8	31.2	32.5	31.7	29.9	33.1	30.8
SA21-4164	33.5	33.8	34.0	33.8	33.1	32.4	34.1	33.4
U19-244132	32.7	34.5	32.2	31.9	31.9	31.9	34.9	32.5
U19-274052	32.5	33.8	32.1	32.6	28.9	32.5	33.5	32.2
U19-274107	32.7	33.7	32.8	32.9	30.3	32.5	35.2	32.1
U19-274119	33.2	33.3	32.0	32.6	32.2	33.4	35.4	33.2
U19-277150	32.7	33.5	32.4	32.5	31.4	32.2	34.4	31.0
U19-604203	33.5	33.5	33.5	34.2	32.1	33.6	34.8	32.9
U20-612185	32.6	33.6	33.2	32.6	29.9	31.5	34.7	32.3
U20-612253	33.4	33.7	33.5	34.0	32.2	33.1	34.6	33.3
U20-914165	33.0	33.6	32.9	32.9	31.8	32.2	35.5	32.1

**UNIFORM TEST III, 2024**

**PROTEIN (%)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	33.4	34.1	34.5	33.2	33.2		35.5	33.8
LD18-6596	32.3	32.4	33.6	31.1	32.1		33.5	32.7
LD07-3395bf (SCN) (L)	31.5	32.7	31.2	30.8	32.0		31.9	29.6
U14-910097 (SCN) (E)	33.0	33.5	33.4	30.7	32.7		32.8	32.9
A17102-209	31.6	31.6	31.5	29.1	30.0		31.1	30.3
A17111-146	31.3	34.0	32.9	31.2	30.3		33.2	31.9
A17112-133	31.5	31.7	31.7	29.4	31.3		32.9	31.8
A17112-226	32.1	32.3	32.7	32.0	32.0		32.4	32.2
A17204-16	31.7	33.6	32.5	31.9	31.8		32.7	32.1
CR183142	34.2	35.5	34.5	32.3	33.5		35.4	34.2
CR183198	34.4	35.1	34.4	32.5	33.5		34.3	34.6
CR184506	34.3	34.3	34.4	31.7	33.1		34.6	33.3
CR191241	33.9	35.3	34.0	32.3	32.6		34.3	33.6
CR194692	32.5	33.9	33.2	31.3	31.8		32.8	32.8
CR20-5111	33.8	34.0	32.9	32.2	32.4		32.1	32.9
CR20-5340	31.9	33.5	33.3	31.0	32.5		33.3	33.4
CR20-5633	32.3	32.9	33.6	31.0	31.8		33.7	32.9
CR20-5933	33.7	34.7	34.4	31.8	33.6		35.0	34.0
LD20-0902	31.5	32.5	32.3	30.7	31.3		32.9	31.1
LD20-11526	33.4	33.2	34.5	31.8	34.0		33.8	33.5
LD20-11665	33.5	34.3	34.2	32.7	33.1		35.1	33.7
LD20-1683	33.2	34.1	33.8	32.4	32.6		33.9	33.6
LD20-1791	33.7	33.8	35.0	33.4	32.6		33.7	35.1
LD20-5413	31.8	33.2	34.3	30.8	31.4		33.5	33.1
LD20-5433	33.6	34.7	33.8	31.9	32.8		34.5	33.2
LG19-4084	33.9	32.9	34.1	30.9	32.7		33.5	32.7
LG19-5656	34.6	34.8	35.4	34.4	34.3		35.6	35.4
SA19-10016	33.9	35.2	33.7	32.7	32.4		33.6	32.7
SA19-10545	33.9	34.4	33.3	33.5	33.1		34.0	33.1
SA19-12541	30.2	32.4	32.0	29.9	30.8		32.2	30.3
SA21-4164	33.4	33.8	33.9	33.0	32.6		34.3	32.8
U19-244132	32.0	33.8	33.0	31.5	32.4		33.8	32.2
U19-274052	32.8	33.7	32.7	30.9	31.9		33.9	33.0
U19-274107	33.3	32.9	33.1	32.1	31.7		33.7	32.2
U19-274119	33.4	33.8	33.5	32.4	33.9		34.0	32.6
U19-277150	32.8	34.1	33.1	32.0	33.1		33.1	32.0
U19-604203	33.0	34.2	34.3	31.9	33.1		33.4	34.1
U20-612185	31.3	33.8	33.6	30.7	32.9		33.6	32.7
U20-612253	33.7	34.1	34.4	32.0	32.1		34.1	32.7
U20-914165	32.8	33.5	33.8	32.1	31.3		34.5	33.2

**UNIFORM TEST III, 2024**

**OIL (%)**

Strain	Mean 14 Tests	Ames IA	Lucas IA	Perry IL	Savoy IL	Urbana IL	Butler- ville IN	Wanatah IN
LD11-2170 (III)	20.6	19.9	20.8	22.0	21.1	20.7	20.7	19.9
LD18-6596	20.3	19.5	20.2	21.6	20.1	20.7	20.2	19.8
LD07-3395bf (SCN) (L)	21.0	20.5	21.5	21.8	21.2	21.6	21.1	20.3
U14-910097 (SCN) (E)	20.8	20.3	21.0	22.0	21.3	21.0	20.9	20.5
A17102-209	20.6	20.0	20.9	21.5	21.2	20.1	21.3	20.5
A17111-146	20.3	19.8	20.2	21.4	20.6	20.5	20.2	19.8
A17112-133	20.9	20.6	20.7	21.8	21.8	20.8	21.2	20.3
A17112-226	20.8	20.6	21.0	22.1	21.0	20.7	20.1	20.6
A17204-16	21.0	20.4	21.6	22.2	21.0	21.0	20.6	20.4
CR183142	19.4	19.1	19.8	21.1	19.2	19.7	19.3	18.8
CR183198	19.8	19.5	19.7	21.2	20.1	19.7	19.4	19.3
CR184506	19.9	19.4	19.6	21.8	20.2	20.0	19.5	19.8
CR191241	19.8	19.0	20.0	21.1	20.2	19.9	19.4	19.5
CR194692	20.2	19.3	20.4	21.9	20.2	20.3	19.8	20.2
CR20-5111	20.2	20.0	20.1	21.7	20.6	20.4	19.7	20.0
CR20-5340	20.4	19.6	21.0	21.4	21.1	20.8	20.6	20.3
CR20-5633	20.1	19.6	19.8	20.9	19.9	20.8	20.4	19.4
CR20-5933	19.8	19.3	19.7	21.7	19.8	19.5	20.1	19.5
LD20-0902	20.8	20.1	21.2	22.4	21.0	20.4	20.8	20.3
LD20-11526	20.5	19.8	20.7	22.3	21.0	20.2	20.8	20.2
LD20-11665	20.6	20.2	20.7	21.9	21.2	21.0	20.6	20.6
LD20-1683	20.7	20.4	20.4	22.8	21.1	20.7	21.0	19.9
LD20-1791	20.2	19.8	20.3	21.1	20.6	20.3	20.4	19.5
LD20-5413	20.7	20.2	19.8	22.3	21.0	20.9	21.0	20.1
LD20-5433	20.5	20.3	20.5	21.8	20.9	20.6	20.8	20.2
LG19-4084	20.6	20.1	20.8	22.1	20.6	20.8	20.7	20.2
LG19-5656	18.8	18.4	17.8	19.7	18.9	19.4	18.8	18.3
SA19-10016	20.4	20.1	21.1	22.0	20.3	20.6	20.4	19.5
SA19-10545	19.8	19.3	19.7	21.1	19.8	20.3	20.3	19.4
SA19-12541	21.2	20.7	20.9	22.5	20.9	21.8	20.8	21.1
SA21-4164	20.0	19.7	20.2	20.7	19.8	20.6	20.4	19.7
U19-244132	20.3	19.2	20.8	22.3	20.6	20.5	20.2	19.9
U19-274052	21.1	20.5	21.2	22.5	21.8	21.1	20.4	20.6
U19-274107	20.9	20.4	21.2	22.3	21.6	21.2	20.7	20.5
U19-274119	20.5	19.9	20.9	22.0	20.7	20.6	20.2	20.3
U19-277150	20.2	19.6	20.5	21.4	20.7	20.3	20.0	20.2
U19-604203	20.5	20.0	20.6	21.5	20.6	20.4	21.4	19.8
U20-612185	20.4	19.5	20.2	21.8	21.2	20.7	20.2	20.0
U20-612253	19.6	19.3	19.9	20.6	20.1	20.1	19.5	19.4
U20-914165	20.5	19.9	20.4	22.1	20.7	20.9	19.8	20.1

**UNIFORM TEST III, 2024**

**OIL (%)**

Strain	West Lafayette IN	Manhattan KS	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoytville OH
LD11-2170 (III)	20.5	20.2	20.7	20.8	20.5		20.0	20.2
LD18-6596	20.2	19.9	20.3	20.7	20.5		20.1	20.1
LD07-3395bf (SCN) (L)	20.6	20.2	21.7	21.2	20.6		20.9	21.4
U14-910097 (SCN) (E)	20.7	20.3	20.8	21.7	20.2		20.7	20.4
A17102-209	19.9	19.6	20.4	21.1	20.5		20.4	20.4
A17111-146	20.2	19.5	20.2	21.1	21.2		19.6	20.1
A17112-133	20.8	20.5	20.9	21.7	20.7		20.0	20.3
A17112-226	20.7	20.4	21.1	21.3	20.6		20.7	20.8
A17204-16	20.8	20.3	20.9	21.7	20.8		20.8	20.8
CR183142	19.3	18.5	19.5	20.0	19.3		18.9	19.1
CR183198	19.4	19.0	20.0	20.5	19.6		20.0	19.4
CR184506	19.5	20.1	19.8	20.9	19.5		19.2	19.5
CR191241	19.4	19.0	20.2	20.3	19.4		19.5	19.8
CR194692	20.2	19.7	20.4	20.6	20.1		20.1	19.7
CR20-5111	19.6	19.4	20.5	20.2	20.2		21.0	19.9
CR20-5340	20.4	19.4	20.5	20.8	20.1		19.5	19.9
CR20-5633	20.3	19.9	20.6	21.1	20.1		19.9	19.4
CR20-5933	19.8	19.0	19.9	20.7	19.6		19.2	19.2
LD20-0902	20.4	20.7	21.0	21.1	20.4		20.9	20.9
LD20-11526	20.1	20.8	20.3	21.1	20.0		20.3	20.0
LD20-11665	20.4	20.4	20.7	20.9	20.3		20.0	20.2
LD20-1683	20.7	20.4	21.1	21.1	20.3		19.9	20.2
LD20-1791	19.9	20.3	20.3	20.5	20.4		20.0	19.7
LD20-5413	21.2	20.5	21.1	21.5	20.5		20.4	20.0
LD20-5433	20.4	19.9	20.7	21.2	20.4		19.6	20.0
LG19-4084	19.9	20.3	20.6	21.5	20.1		20.4	20.9
LG19-5656	18.6	18.6	18.9	19.3	18.9		18.5	18.7
SA19-10016	20.0	19.9	20.9	20.4	20.6		20.2	20.1
SA19-10545	19.3	19.5	20.1	19.1	20.1		19.4	19.7
SA19-12541	21.2	20.7	21.4	21.4	21.1		20.9	21.2
SA21-4164	20.0	19.8	20.1	20.2	20.1		19.7	19.3
U19-244132	20.4	20.0	20.5	20.8	20.0		19.5	20.1
U19-274052	21.0	20.6	21.1	21.8	21.1		20.7	20.5
U19-274107	20.2	20.3	21.1	21.0	20.9		20.4	20.9
U19-274119	20.7	20.0	20.8	20.9	20.0		20.1	20.4
U19-277150	20.1	19.7	20.5	20.7	19.7		20.3	19.6
U19-604203	20.6	19.4	20.7	21.0	20.3		20.1	20.3
U20-612185	20.7	19.8	20.4	21.1	20.1		20.0	20.3
U20-612253	19.2	19.1	19.7	19.8	19.8		19.2	19.0
U20-914165	20.4	20.1	20.7	20.9	20.4		19.8	20.4

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**Northern Regional Uniform Test  
Preliminary Test IIIA, 2024**

Ent.	Strain	Parentage		Seed Source	Gen. Comp.	Unique Traits
		Female	Male			
1	LD11-2170 (III)	Syngenta 03JR313108	LD05-3171	Monteverde	F5	SCN, Rps1k
2	LD18-6596	U11-616086	LD11-2170	Monteverde	F5	SCN, Rps1k
3	LD07-3395bf (SCN) (L)	LD07-3395 Reselection		Monteverde	F5	SCN
4	U14-910097 (SCN) (E)	U09-105007	LD07-3419	Graef	F6	SCN (HR, HR)
5	A18101-29	A14001-101	LD14-3090	Singh	F5	
6	A18105-151	A14004-58	E15339	Singh	F5	
7	A18112-171	U14-213255	A14011-77	Singh	F5	
8	A18328-145Y	A14056-187	A14004-58	Singh	F5	
9	A18344-156Y	A14050-101	A14004-58	Singh	F5	
10	A18361-172	A14011-77	DSN11-12119/R11-8346	Singh	F5	
11	A18385-130	A14058-113	A14050-101	Singh	F5	
12	LD21-1222	LD12-459	LD14-1429	Monteverde	F5	SCN
13	LD21-2156	LD15-5776793	LD14-3702	Monteverde	F5	SCN
14	LD21-2688	U14-211226	LD12-3903	Monteverde	F5	SCN
15	LD21-7234	LD15-456	LD15-8459	Monteverde	F5	SCN
16	LD21-7338	LD15-5776793	LD14-3702	Monteverde	F5	SCN
17	LD21-7350	LD15-5776793	LD14-3702	Monteverde	F5	SCN
18	U20-212170	U16-216354	U17-609217	Graef	F5	SCN
19	U20-222161	LD14-3702	U16-932015	Graef	F5	SCN, Rps
20	U20-225189	U17-609217	U16-932015	Graef	F5	SCN
21	U20-237239	LD14-3702	U16-932015	Graef	F5	
22	U20-304290	U17-609217	U16-928123	Graef	F5	SCN
23	U20-306316	U14-910097	U16-603132	Graef	F5	Rps
24	U20-306320	U14-910097	U16-603132	Graef	F5	SCN
25	U20-307318	U14-910097	U16-603132	Graef	F5	SCN
26	U21-907129	U15-606207	LD15-5776793	Graef	F5	SCN
27	U21-913162	U17-238027	LD15-5776793	Graef	F5	SCN, Rps
28	U21-916129	U16-322148	U15-606207	Graef	F5	SCN
29	U21-920106	U16-322148	LD15-8459	Graef	F5	SCN
30	U21-935155	U17-322103	LD15-8459	Graef	F5	SCN, Rps

PRELIMINARY TEST IIIA, 2024

DESCRIPTIVE AND DISEASE DATA

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Strain	Descriptive Code
LD11-2170 (III)	PLtBDYBrI
LD18-6596	WLtBDYYI
LD07-3395bf (SCN) (L)	WGTDYBfI
U14-910097 (SCN) (E)	PGTDYBfI
A18101-29	WGBDYYI
A18105-151	PGBSYYI
A18112-171	PGBSYYI
A18328-145Y	WLtTSYYI
A18344-156Y	PGBDYYI
A18361-172	PLtBSYHI
A18385-130	PLtBDYYI
LD21-1222	PLt+GTSYHI
LD21-2156	PLtBDYBI
LD21-2688	PLtBDYBI
LD21-7234	PLtBDYBI
LD21-7338	PLtBSYBI
LD21-7350	PLtBSYBI
U20-212170	WLtBDYBI
U20-222161	PLtBDYBrI
U20-225189	P+WGBDYBfI
U20-237239	PLtBDYBI
U20-304290	WGBDYBfI
U20-306316	WGB+TDYBfI
U20-306320	P+WLt+GTDYHI
U20-307318	WLtBSYBrI
U21-907129	PLtBDYBrI
U21-913162	PLtBDYBI
U21-916129	PLtBDYBrI
U21-920106	PLtBSYBI
U21-935155	PT+LtBDYBI

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**PRELIMINARY TEST IIIA, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	11 bu/a	11 No.	10 Date	9 Score	Height 9 In.	Size 10 g/100	Quality 9 Score	Protein 10 %	Oil 10 %
LD11-2170 (III)	73.1	22	9/23	1.2	33	15.0	1.1	33.8	20.5
LD18-6596	76.7	7	4.8	1.6	33	15.1	1.3	33.3	20.2
LD07-3395bf (SCN) (L)	75.9	12	5.0	1.6	34	15.7	1.4	31.4	20.9
U14-910097 (SCN) (E)	77.4	2	1.3	2.5	32	14.7	1.3	32.6	20.7
A18101-29	73.4	19	2.2	1.6	34	16.6	1.3	33.1	20.5
A18105-151	70.8	26	0.9	1.7	35	13.3	1.2	33.3	20.1
A18112-171	76.1	10	1.3	1.4	34	14.1	1.1	34.4	19.0
A18328-145Y	72.2	23	4.1	1.6	35	16.5	1.3	34.7	19.4
A18344-156Y	70.7	27	-0.2	1.4	34	16.4	1.3	34.5	19.6
A18361-172	73.3	20	5.1	2.2	37	15.1	1.5	36.6	18.7
A18385-130	70.6	28	1.8	1.7	34	17.7	1.3	35.0	19.6
LD21-1222	76.3	9	3.7	1.2	32	16.0	1.4	31.7	19.6
LD21-2156	75.8	14	3.6	1.7	38	15.7	1.0	31.9	19.8
LD21-2688	79.9	1	3.2	1.3	35	15.4	1.2	31.9	20.7
LD21-7234	75.8	13	1.4	1.7	35	15.5	1.3	33.8	20.0
LD21-7338	76.7	6	5.6	1.7	36	15.7	1.2	31.8	20.7
LD21-7350	77.1	3	5.8	1.3	35	14.0	1.1	33.3	19.8
U20-212170	69.7	30	2.0	1.4	37	13.2	1.1	32.0	20.6
U20-222161	75.9	11	2.4	1.4	35	15.6	1.3	32.9	20.4
U20-225189	70.3	29	-0.4	1.1	36	14.1	1.1	32.2	20.2
U20-237239	73.2	21	5.8	1.6	37	14.1	1.2	33.8	19.5
U20-304290	72.1	24	3.2	1.6	36	15.4	1.2	33.3	20.4
U20-306316	75.1	17	6.5	1.8	36	14.4	1.2	32.1	20.3
U20-306320	76.6	8	6.5	1.3	35	17.3	1.3	32.8	20.3
U20-307318	77.0	4	4.5	2.0	35	16.5	1.3	32.0	21.0
U21-907129	74.5	18	3.6	1.6	36	14.7	1.2	33.1	20.7
U21-913162	75.3	15	2.3	1.3	34	16.2	1.2	33.8	20.4
U21-916129	76.9	5	3.5	1.5	34	16.2	1.2	32.7	20.4
U21-920106	75.2	16	1.0	1.5	36	15.1	1.3	32.8	20.1
U21-935155	71.9	25	4.8	1.9	38	15.4	1.4	33.7	20.1
Mean	74.5			1.6	35.1	15.4	1.2	33.1	20.2
C.V. (%)	8.3								
L.S.D. (5%)	3.7								

120.4 Days After Planting

**PRELIMINARY TEST IIIA, 2024**

**YIELD (bu/a)**

Strain	Mean	Ames IA	Lucas IA	Savoy IL	Urbana IL	West
	11 Tests					Lafayette IN
LD11-2170 (III)	73.1	81.7	60.3	73.8	71.6	81.6
LD18-6596	76.7	83.8	63.7	74.7	75.1	94.0
LD07-3395bf (SCN) (L)	75.9	89.2	69.3	72.3	72.7	89.0
U14-910097 (SCN) (E)	77.4	92.7	55.5	77.8	81.4	88.3
A18101-29	73.4	83.6	62.6	67.7	70.7	84.6
A18105-151	70.8	76.5	53.8	64.3	67.8	87.6
A18112-171	76.1	87.9	65.1	79.6	68.4	89.4
A18328-145Y	72.2	80.4	56.9	70.0	70.1	85.7
A18344-156Y	70.7	81.2	67.7	63.9	66.8	90.3
A18361-172	73.3	84.8	54.1	73.9	76.7	81.7
A18385-130	70.6	83.8	50.5	69.0	67.9	85.6
LD21-1222	76.3	95.7	57.6	75.9	75.3	82.2
LD21-2156	75.8	89.4	58.0	80.4	71.4	87.2
LD21-2688	79.9	92.1	71.1	81.8	72.8	95.5
LD21-7234	75.8	94.0	51.6	74.6	73.2	94.0
LD21-7338	76.7	82.5	59.7	78.8	77.8	84.1
LD21-7350	77.1	78.1	60.2	83.3	80.9	88.5
U20-212170	69.7	67.7	46.0	70.9	65.4	81.5
U20-222161	75.9	88.9	62.9	68.8	68.3	84.1
U20-225189	70.3	82.1	61.6	73.7	52.7	81.6
U20-237239	73.2	84.4	55.8	75.3	76.4	75.4
U20-304290	72.1	71.4	53.3	71.6	61.6	86.4
U20-306316	75.1	75.7	51.7	73.4	67.9	84.2
U20-306320	76.6	74.5	59.0	70.8	65.6	86.9
U20-307318	77.0	88.4	65.9	77.7	63.7	91.0
U21-907129	74.5	91.6	62.8	67.6	73.3	82.9
U21-913162	75.3	88.0	56.4	76.3	71.5	86.4
U21-916129	76.9	89.1	62.8	71.6	76.2	97.1
U21-920106	75.2	86.5	50.7	77.5	74.9	91.0
U21-935155	71.9	71.2	60.6	78.1	63.4	78.4
Location Mean		83.9	58.9	73.8	70.7	86.5
C.V. (%)		14.7	8.4	6.4	8.3	6.8
L.S.D. (5%)		25.2	10.1	9.6	12.0	12.0
Row Sp. (In.)		30	30	30	30	30
Rows/Plot		4	4	4	4	4
Reps		2	2	2	2	2

**PRELIMINARY TEST IIIA, 2024**

**YIELD (bu/a)**

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	75.7	84.1	81.0	80.6	57.7	57.6
LD18-6596	77.7	83.5	86.6	86.3	63.1	55.3
LD07-3395bf (SCN) (L)	70.9	82.8	84.8	86.3	59.5	59.7
U14-910097 (SCN) (E)	74.2	77.0	92.1	85.8	64.7	61.7
A18101-29	70.9	73.1	93.5	84.6	51.7	64.9
A18105-151	80.8	64.1	85.8	84.0	59.1	55.4
A18112-171	74.1	75.8	94.0	83.1	63.1	56.2
A18328-145Y	70.5	70.4	93.3	86.8	50.0	59.9
A18344-156Y	63.0	66.2	88.9	80.9	46.5	61.9
A18361-172	66.0	76.6	86.7	84.8	59.4	63.0
A18385-130	68.4	68.8	85.1	86.0	54.7	57.3
LD21-1222	80.8	87.4	86.5	78.9	65.3	55.4
LD21-2156	74.2	85.9	78.2	87.6	59.6	61.6
LD21-2688	74.3	87.7	91.8	83.3	67.0	61.4
LD21-7234	77.0	68.0	96.7	87.6	60.8	58.6
LD21-7338	78.1	82.8	85.4	84.6	58.4	71.8
LD21-7350	71.7	82.7	81.8	85.4	67.2	68.4
U20-212170	80.1	70.2	90.4	82.4	52.2	59.6
U20-222161	75.9	79.7	98.3	86.7	65.6	56.6
U20-225189	81.1	67.2	82.2	87.2	50.0	54.3
U20-237239	72.0	77.3	78.2	81.0	65.8	64.0
U20-304290	72.7	85.5	89.0	80.2	59.2	62.1
U20-306316	75.8	83.3	87.6	82.7	66.8	76.7
U20-306320	77.4	86.9	100.1	91.8	71.1	60.6
U20-307318	73.3	82.9	89.1	89.3	61.0	64.8
U21-907129	72.5	83.2	88.6	86.7	48.8	61.4
U21-913162	72.9	79.5	94.2	83.2	62.3	57.8
U21-916129	71.2	75.6	96.4	86.7	59.6	60.2
U21-920106	73.8	78.2	89.5	86.7	63.7	54.5
U21-935155	66.7	83.8	76.5	82.0	64.4	65.9
Location Mean	73.8	78.3	88.4	84.8	59.9	61.0
C.V. (%)	3.4	5.7	5.7	4.6	13.3	5.9
L.S.D. (5%)	5.2	9.2	10.4	7.9	16.3	7.4
Row Sp. (In.)	30	30	30	30	30	8
Rows/Plot	4	4	4	4	4	8
Reps	2	2	2	2	2	2

PRELIMINARY TEST IIIA, 2024

YIELD RANK

Strain	Yield Rank	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN
LD11-2170 (III)	22	21	13	16	14	27
LD18-6596	7	17	6	13	8	3
LD07-3395bf (SCN) (L)	12	7	2	19	13	9
U14-910097 (SCN) (E)	2	3	22	7	1	11
A18101-29	19	18	10	27	17	19
A18105-151	26	25	24	29	23	12
A18112-171	10	12	5	4	19	8
A18328-145Y	23	23	19	24	18	17
A18344-156Y	27	22	3	30	24	7
A18361-172	20	14	23	15	4	25
A18385-130	28	16	29	25	22	18
LD21-1222	9	1	18	11	7	24
LD21-2156	14	6	17	3	16	13
LD21-2688	1	4	1	2	12	2
LD21-7234	13	2	27	14	11	4
LD21-7338	6	19	15	5	3	21
LD21-7350	3	24	14	1	2	10
U20-212170	30	30	30	22	26	28
U20-222161	11	9	7	26	20	21
U20-225189	29	20	11	17	30	26
U20-237239	21	15	21	12	5	30
U20-304290	24	28	25	21	29	15
U20-306316	17	26	26	18	21	20
U20-306320	8	27	16	23	25	14
U20-307318	4	10	4	8	27	5
U21-907129	18	5	8	28	10	23
U21-913162	15	11	20	10	15	15
U21-916129	5	8	9	20	6	1
U21-920106	16	13	28	9	9	5
U21-935155	25	29	12	6	28	29

PRELIMINARY TEST IIIA, 2024

YIELD RANK

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	11	6	27	28	23	22
LD18-6596	6	8	19	11	11	28
LD07-3395bf (SCN) (L)	24	12	24	12	18	18
U14-910097 (SCN) (E)	13	19	9	14	8	11
A18101-29	25	23	7	17	26	5
A18105-151	3	30	21	19	21	26
A18112-171	15	21	6	22	12	25
A18328-145Y	26	24	8	6	27	17
A18344-156Y	30	29	15	27	30	10
A18361-172	29	20	18	16	19	8
A18385-130	27	26	23	13	24	23
LD21-1222	2	2	20	30	7	27
LD21-2156	13	4	29	3	16	12
LD21-2688	12	1	10	20	3	14
LD21-7234	8	27	3	4	15	20
LD21-7338	5	13	22	18	22	2
LD21-7350	22	14	26	15	2	3
U20-212170	4	25	11	24	25	19
U20-222161	9	15	2	7	6	24
U20-225189	1	28	25	5	28	30
U20-237239	21	18	28	26	5	7
U20-304290	19	5	14	29	20	9
U20-306316	10	9	17	23	4	1
U20-306320	7	3	1	1	1	15
U20-307318	17	11	13	2	14	6
U21-907129	20	10	16	9	29	13
U21-913162	18	16	5	21	13	21
U21-916129	23	22	4	7	17	16
U21-920106	16	17	12	9	10	29
U21-935155	28	7	30	25	9	4

PRELIMINARY TEST IIIA, 2024

MATURITY (date)

Strain	Mean	Ames	Lucas	Savoy	Urbana	West
	10 Tests	IA	IA	IL	IL	Lafayette IN
LD11-2170 (III)	9/23	9/23	9/20	9/25	9/24	9/16
LD18-6596	5	4	3	6	5	6
LD07-3395bf (SCN) (L)	5	6	3	6	2	7
U14-910097 (SCN) (E)	1	3	1	2	0	0
A18101-29	2	2	2	3	2	2
A18105-151	1	0	1	1	0	1
A18112-171	1	0	1	4	1	2
A18328-145Y	4	1	3	7	3	3
A18344-156Y	-0	-3	1	-2	-3	-1
A18361-172	5	4	3	7	8	8
A18385-130	2	1	1	5	0	1
LD21-1222	4	5	2	6	4	5
LD21-2156	4	5	2	7	2	1
LD21-2688	3	5	2	6	4	2
LD21-7234	1	4	2	3	1	0
LD21-7338	6	5	3	7	9	6
LD21-7350	6	7	3	6	7	5
U20-212170	2	-1	1	4	1	2
U20-222161	2	4	2	3	3	0
U20-225189	-0	-1	1	-1	-2	-1
U20-237239	6	2	4	8	6	6
U20-304290	3	-1	2	2	2	3
U20-306316	6	3	4	7	7	7
U20-306320	6	5	3	7	6	8
U20-307318	4	3	3	7	4	3
U21-907129	4	3	3	7	3	2
U21-913162	2	4	1	7	2	1
U21-916129	3	3	2	6	4	3
U21-920106	1	1	1	5	0	2
U21-935155	5	3	3	7	3	6
Date Planted	5/26	5/19	6/1	5/23	5/22	5/8
Days to Mature	120	127	111	125	125	131

PRELIMINARY TEST IIIA, 2024

MATURITY (date)

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	9/28	9/18	9/20		9/23	10/7
LD18-6596	5	7	6		4	4
LD07-3395bf (SCN) (L)	6	5	5		2	9
U14-910097 (SCN) (E)	1	0	2		-1	6
A18101-29	2	3	4		1	3
A18105-151	1	1	4		1	0
A18112-171	1	1	1		1	3
A18328-145Y	7	5	5		3	5
A18344-156Y	1	1	1		2	1
A18361-172	5	4	5		3	5
A18385-130	2	4	4		1	1
LD21-1222	4	4	3		-1	6
LD21-2156	5	5	2		2	6
LD21-2688	2	3	2		1	6
LD21-7234	1	2	3		-1	1
LD21-7338	7	7	7		3	3
LD21-7350	7	8	8		3	6
U20-212170	3	3	6		-1	3
U20-222161	3	4	3		0	3
U20-225189	1	-1	0		-1	1
U20-237239	9	8	7		4	6
U20-304290	6	5	4		3	6
U20-306316	7	9	7		5	11
U20-306320	9	7	7		4	11
U20-307318	6	7	6		1	7
U21-907129	6	4	4		1	4
U21-913162	1	3	3		1	1
U21-916129	4	2	5		1	7
U21-920106	2	1	2		-1	0
U21-935155	7	7	6		2	6
Date Planted	6/10	5/29	5/23		5/20	6/12
Days to Mature	110	112	120		126	117

PRELIMINARY TEST IIIA, 2024

LODGING (score)

Strain	Mean	Ames	Lucas	Savoy	Urbana	West
	9 Tests	IA	IA	IL	IL	Lafayette IN
LD11-2170 (III)	1.2	1.0		1.0	1.0	1.0
LD18-6596	1.6	1.0		1.0	2.0	1.5
LD07-3395bf (SCN) (L)	1.6	1.5		1.0	1.0	2.0
U14-910097 (SCN) (E)	2.5	1.0		1.0	3.0	2.5
A18101-29	1.6	1.0		1.0	1.0	2.0
A18105-151	1.7	1.0		1.0	1.0	2.0
A18112-171	1.4	1.0		1.0	1.0	1.0
A18328-145Y	1.6	1.0		1.0	1.0	2.0
A18344-156Y	1.4	1.0		1.0	1.0	2.0
A18361-172	2.2	1.5		1.0	1.5	2.0
A18385-130	1.7	1.0		1.0	1.0	2.0
LD21-1222	1.2	1.0		1.0	1.0	1.0
LD21-2156	1.7	1.0		1.0	1.0	2.0
LD21-2688	1.3	1.0		1.0	1.0	1.5
LD21-7234	1.7	1.0		1.0	1.0	1.5
LD21-7338	1.7	1.0		1.0	1.5	1.5
LD21-7350	1.3	1.0		1.0	1.0	1.0
U20-212170	1.4	1.0		1.0	1.0	1.5
U20-222161	1.4	1.0		1.0	1.0	1.5
U20-225189	1.1	1.0		1.0	1.0	1.0
U20-237239	1.6	1.0		1.3	1.0	1.5
U20-304290	1.6	1.0		1.0	1.0	2.0
U20-306316	1.8	1.0		1.0	1.0	2.0
U20-306320	1.3	1.0		1.0	1.0	1.5
U20-307318	2.0	1.0		1.0	2.0	2.0
U21-907129	1.6	1.0		1.0	1.0	1.5
U21-913162	1.3	1.0		1.0	1.0	1.5
U21-916129	1.5	1.0		1.0	1.5	2.0
U21-920106	1.5	1.0		1.0	1.0	1.5
U21-935155	1.9	1.0		1.0	1.5	2.0

PRELIMINARY TEST IIIA, 2024

LODGING (score)

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	1.0	1.5	2.0		1.5	1.0
LD18-6596	1.0	1.5	3.3		2.0	1.0
LD07-3395bf (SCN) (L)	2.0	1.5	2.3		2.5	1.0
U14-910097 (SCN) (E)	4.0	3.0	3.8		3.5	1.0
A18101-29	1.0	1.5	3.3		3.0	1.0
A18105-151	2.0	2.0	3.5		2.0	1.0
A18112-171	1.0	2.0	2.5		2.0	1.0
A18328-145Y	1.3	2.0	3.5		2.0	1.0
A18344-156Y	2.0	1.5	2.5		1.0	1.0
A18361-172	2.0	3.5	3.5		3.5	1.0
A18385-130	1.5	1.5	3.8		2.5	1.0
LD21-1222	1.0	1.5	1.5		1.5	1.0
LD21-2156	2.0	1.5	3.3		2.5	1.0
LD21-2688	1.0	1.0	2.8		1.5	1.0
LD21-7234	2.0	2.5	3.0		2.0	1.0
LD21-7338	2.0	1.5	3.3		2.5	1.0
LD21-7350	1.0	1.5	2.8		1.5	1.0
U20-212170	1.0	1.5	2.8		2.0	1.0
U20-222161	1.0	1.5	2.3		2.0	1.0
U20-225189	1.0	1.5	1.5		1.0	1.0
U20-237239	1.5	1.5	3.0		3.0	1.0
U20-304290	2.0	1.5	2.5		2.5	1.0
U20-306316	1.5	2.0	3.8		2.5	1.0
U20-306320	1.0	1.5	2.0		1.5	1.0
U20-307318	2.5	1.5	4.0		3.0	1.0
U21-907129	2.0	2.0	2.5		2.5	1.0
U21-913162	1.0	1.5	2.3		1.5	1.0
U21-916129	1.0	1.5	3.0		1.5	1.0
U21-920106	1.0	1.5	3.3		2.0	1.0
U21-935155	2.0	2.0	3.8		2.5	1.0

**PRELIMINARY TEST IIIA, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean	Ames IA	Lucas IA	Savoy IL	Urbana IL	West
	9 Tests					Lafayette IN
LD11-2170 (III)	33	33		33	32	38
LD18-6596	33	33		31	32	39
LD07-3395bf (SCN) (L)	34	41		34	32	37
U14-910097 (SCN) (E)	32	35		32	31	36
A18101-29	34	38		35	33	38
A18105-151	35	35		35	34	41
A18112-171	34	37		36	32	38
A18328-145Y	35	35		35	35	41
A18344-156Y	34	35		31	32	39
A18361-172	37	39		37	36	41
A18385-130	34	38		34	32	38
LD21-1222	32	36		34	29	36
LD21-2156	38	44		38	36	42
LD21-2688	35	37		35	32	41
LD21-7234	35	41		36	35	40
LD21-7338	36	40		36	36	40
LD21-7350	35	36		35	33	40
U20-212170	37	37		37	34	40
U20-222161	35	40		34	35	41
U20-225189	36	39		37	31	41
U20-237239	37	40		39	38	40
U20-304290	36	36		39	33	42
U20-306316	36	38		35	33	41
U20-306320	35	35		37	33	38
U20-307318	35	36		34	31	41
U21-907129	36	40		34	32	38
U21-913162	34	38		34	32	38
U21-916129	34	37		33	32	38
U21-920106	36	38		35	34	41
U21-935155	38	41		39	35	40

**PRELIMINARY TEST IIIA, 2024**

**PLANT HEIGHT (inches)**

Strain	Man- hattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	32	35	44		32	22
LD18-6596	35	33	42		31	20
LD07-3395bf (SCN) (L)	35	34	41		34	22
U14-910097 (SCN) (E)	33	34	40		33	21
A18101-29	35	30	43		34	24
A18105-151	37	33	43		33	23
A18112-171	34	33	41		33	21
A18328-145Y	37	34	44		34	23
A18344-156Y	35	34	43		34	23
A18361-172	37	37	42		35	27
A18385-130	35	32	42		35	22
LD21-1222	33	30	37		36	21
LD21-2156	40	34	43		37	26
LD21-2688	36	34	43		36	23
LD21-7234	37	33	42		34	23
LD21-7338	38	35	41		36	27
LD21-7350	35	35	42		36	24
U20-212170	37	37	48		37	23
U20-222161	34	33	44		36	23
U20-225189	38	37	45		36	24
U20-237239	36	37	46		36	25
U20-304290	38	39	43		35	24
U20-306316	36	38	44		36	26
U20-306320	39	34	42		35	24
U20-307318	36	35	43		34	23
U21-907129	37	38	42		34	26
U21-913162	37	32	42		34	23
U21-916129	35	34	42		33	22
U21-920106	36	34	43		37	22
U21-935155	39	39	46		37	26

PRELIMINARY TEST IIIA, 2024

SEED SIZE (g/100)

Strain	Mean	Ames IA	Lucas IA	Savoy IL	Urbana IL	West
	10 Tests					Lafayette IN
LD11-2170 (III)	15.0	15.2	12.9	15.5	16.1	16.1
LD18-6596	15.1	15.6	13.5	15.3	16.1	15.8
LD07-3395bf (SCN) (L)	15.7	16.0	14.6	14.9	16.3	17.3
U14-910097 (SCN) (E)	14.7	15.0	11.9	15.3	15.6	15.9
A18101-29	16.6	17.0	15.1	16.3	17.5	17.7
A18105-151	13.3	12.7	11.2	13.8	14.3	13.8
A18112-171	14.1	15.0	12.6	14.7	14.6	14.5
A18328-145Y	16.5	17.2	14.2	16.9	17.7	17.6
A18344-156Y	16.4	16.2	14.4	18.0	18.1	14.5
A18361-172	15.1	15.6	12.5	15.2	16.8	15.3
A18385-130	17.7	18.4	14.4	19.0	19.4	19.4
LD21-1222	16.0	17.4	13.5	16.3	17.2	16.7
LD21-2156	15.7	16.0	13.3	16.5	16.7	16.8
LD21-2688	15.4	16.1	14.0	15.8	16.7	16.4
LD21-7234	15.5	15.6	13.6	16.7	17.0	15.9
LD21-7338	15.7	16.7	13.0	16.3	16.9	16.2
LD21-7350	14.0	14.3	12.4	15.0	15.1	14.4
U20-212170	13.2	12.9	10.9	13.5	13.1	14.6
U20-222161	15.6	17.0	13.7	15.5	15.7	16.2
U20-225189	14.1	14.2	12.3	15.3	14.2	14.8
U20-237239	14.1	15.4	12.6	14.8	14.9	14.1
U20-304290	15.4	14.2	13.8	16.0	16.1	16.5
U20-306316	14.4	14.9	11.9	14.6	14.5	14.9
U20-306320	17.3	17.4	16.0	18.1	17.0	17.3
U20-307318	16.5	16.1	14.9	17.4	16.8	17.0
U21-907129	14.7	15.3	12.2	15.2	15.7	15.9
U21-913162	16.2	17.3	13.8	17.1	17.6	17.2
U21-916129	16.2	15.6	13.3	16.4	16.9	17.1
U21-920106	15.1	15.9	12.8	16.2	16.4	14.8
U21-935155	15.4	15.7	13.8	16.3	15.7	16.3

**PRELIMINARY TEST IIIA, 2024**

**SEED SIZE (g/100)**

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	16.9	15.5	13.1		14.3	14.5
LD18-6596	15.9	14.9	15.4		14.4	14.1
LD07-3395bf (SCN) (L)	16.7	15.6	16.2		14.8	14.6
U14-910097 (SCN) (E)	16.4	14.6	14.7		14.2	13.7
A18101-29	17.8	17.1	16.6		15.6	15.3
A18105-151	15.5	13.7	13.0		12.4	12.3
A18112-171	15.5	13.9	14.0		13.8	12.6
A18328-145Y	18.5	15.9	17.7		14.2	15.2
A18344-156Y	19.0	16.6	16.5		16.3	14.3
A18361-172	17.0	15.9	15.7		14.4	13.0
A18385-130	20.9	16.3	18.1		16.2	14.6
LD21-1222	18.0	17.0	15.8		14.1	14.2
LD21-2156	17.3	15.9	14.3		14.6	15.5
LD21-2688	16.8	15.2	13.8		14.4	14.8
LD21-7234	17.8	16.0	14.6		13.6	14.0
LD21-7338	17.2	15.9	15.3		13.8	15.8
LD21-7350	14.1	14.1	13.6		13.0	13.9
U20-212170	15.3	12.5	13.7		12.3	13.1
U20-222161	17.4	15.1	15.9		14.5	14.5
U20-225189	16.3	14.1	14.1		13.0	12.6
U20-237239	15.6	14.2	13.8		12.7	13.2
U20-304290	16.7	16.1	15.3		14.3	14.6
U20-306316	15.9	14.7	14.7		12.5	15.0
U20-306320	19.6	17.5	16.2		16.0	17.8
U20-307318	18.2	16.5	15.7		14.7	17.3
U21-907129	15.8	14.6	13.8		13.7	14.3
U21-913162	17.7	15.7	16.5		14.8	14.4
U21-916129	17.4	16.3	16.6		15.3	16.9
U21-920106	16.5	15.2	15.3		14.6	13.4
U21-935155	16.6	16.3	15.9		14.5	13.1

**PRELIMINARY TEST IIIA, 2024**

**SEED QUALITY (score)**

Strain	Mean	Ames IA	Lucas IA	Savoy IL	Urbana IL	West
	9 Tests					Lafayette IN
LD11-2170 (III)	1.1	1.0	1.0	1.0	1.0	1.0
LD18-6596	1.3	1.0	1.0	2.0	2.0	1.0
LD07-3395bf (SCN) (L)	1.4	1.5	1.5	1.5	2.0	1.0
U14-910097 (SCN) (E)	1.3	1.0	1.0	1.5	2.0	1.0
A18101-29	1.3	1.0	1.0	1.5	2.0	1.0
A18105-151	1.2	1.0	1.0	1.0	2.0	1.0
A18112-171	1.1	1.0	1.0	1.5	1.0	1.0
A18328-145Y	1.3	1.0	1.0	1.5	2.0	1.0
A18344-156Y	1.3	1.0	1.0	1.5	2.0	1.0
A18361-172	1.5	1.0	1.0	1.5	3.0	1.0
A18385-130	1.3	1.0	1.0	2.0	2.0	1.0
LD21-1222	1.4	1.0	1.0	2.0	2.0	1.5
LD21-2156	1.0	1.0	1.0	1.0	1.0	1.0
LD21-2688	1.2	1.0	1.0	1.0	2.0	1.0
LD21-7234	1.3	1.0	1.0	1.5	2.0	1.0
LD21-7338	1.2	1.0	1.0	1.5	1.0	1.0
LD21-7350	1.1	1.0	1.0	1.0	2.0	1.0
U20-212170	1.1	1.0	1.0	1.0	1.0	1.0
U20-222161	1.3	1.0	1.0	2.0	2.0	1.0
U20-225189	1.1	1.0	1.0	1.0	1.0	1.0
U20-237239	1.2	1.0	1.0	1.5	1.0	1.0
U20-304290	1.2	1.0	1.0	1.0	1.0	1.0
U20-306316	1.2	1.0	1.0	1.0	2.0	1.0
U20-306320	1.3	1.0	1.0	2.0	2.0	1.0
U20-307318	1.3	1.0	1.0	1.5	2.0	1.0
U21-907129	1.2	1.0	1.0	1.0	2.0	1.0
U21-913162	1.2	1.0	1.0	2.0	2.0	1.0
U21-916129	1.2	1.0	1.0	1.0	2.0	1.0
U21-920106	1.3	1.0	1.0	1.5	2.0	1.0
U21-935155	1.4	1.0	1.0	1.5	2.0	1.0

**PRELIMINARY TEST IIIA, 2024**

**SEED QUALITY (score)**

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	2.0	1.0	1.0		1.0	
LD18-6596	2.0	1.0	1.0		1.0	
LD07-3395bf (SCN) (L)	2.0	1.0	1.0		1.0	
U14-910097 (SCN) (E)	2.0	1.0	1.0		1.0	
A18101-29	2.0	1.0	1.0		1.0	
A18105-151	2.0	1.0	1.0		1.0	
A18112-171	1.0	1.0	1.0		1.0	
A18328-145Y	2.0	1.0	1.0		1.0	
A18344-156Y	2.0	1.0	1.0		1.0	
A18361-172	3.0	1.0	1.0		1.0	
A18385-130	2.0	1.0	1.0		1.0	
LD21-1222	2.0	1.0	1.0		1.0	
LD21-2156	1.0	1.0	1.0		1.0	
LD21-2688	2.0	1.0	1.0		1.0	
LD21-7234	2.0	1.0	1.0		1.0	
LD21-7338	2.0	1.0	1.0		1.0	
LD21-7350	1.0	1.0	1.0		1.0	
U20-212170	2.0	1.0	1.0		1.0	
U20-222161	2.0	1.0	1.0		1.0	
U20-225189	2.0	1.0	1.0		1.0	
U20-237239	2.0	1.0	1.0		1.0	
U20-304290	2.0	1.0	2.0		1.0	
U20-306316	2.0	1.0	1.0		1.0	
U20-306320	2.0	1.0	1.0		1.0	
U20-307318	2.0	1.0	1.0		1.0	
U21-907129	2.0	1.0	1.0		1.0	
U21-913162	1.0	1.0	1.0		1.0	
U21-916129	2.0	1.0	1.0		1.0	
U21-920106	2.0	1.0	1.0		1.0	
U21-935155	2.0	2.0	1.0		1.0	

**PRELIMINARY TEST IIIA, 2024**

**PROTEIN (%)**

Strain	Mean 10 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN
LD11-2170 (III)	33.8	34.5	34.3	32.4	32.9	33.2
LD18-6596	33.3	33.7	33.1	32.5	34.9	33.9
LD07-3395bf (SCN) (L)	31.4	33.3	30.8	30.2	31.2	32.3
U14-910097 (SCN) (E)	32.6	33.1	32.6	31.7	32.1	32.9
A18101-29	33.1	33.1	33.3	31.2	33.5	33.5
A18105-151	33.3	33.0	33.2	34.1	32.8	33.6
A18112-171	34.4	35.0	34.6	33.9	32.7	34.4
A18328-145Y	34.7	34.1	36.0	32.7	34.4	34.3
A18344-156Y	34.5	34.6	33.8	34.4	34.0	35.2
A18361-172	36.6	36.4	35.9	36.0	37.5	36.5
A18385-130	35.0	35.7	34.1	35.0	33.7	34.7
LD21-1222	31.7	32.0	32.4	30.3	31.1	31.8
LD21-2156	31.9	32.3	32.1	31.3	31.0	32.0
LD21-2688	31.9	32.2	29.6	30.0	33.3	31.0
LD21-7234	33.8	33.5	34.2	31.9	34.8	33.5
LD21-7338	31.8	32.6	32.8	30.5	31.8	31.0
LD21-7350	33.3	33.6	33.7	32.6	32.5	32.3
U20-212170	32.0	33.0	32.4	31.8	30.6	32.4
U20-222161	32.9	33.5	34.0	32.1	32.1	32.0
U20-225189	32.2	32.8	32.9	31.3	29.9	30.8
U20-237239	33.8	34.1	33.9	34.7	34.1	33.3
U20-304290	33.3	34.2	33.0	33.2	33.0	33.2
U20-306316	32.1	32.0	31.8	32.1	32.0	32.0
U20-306320	32.8	33.6	32.3	31.9	31.2	33.8
U20-307318	32.0	32.6	31.9	30.8	31.3	30.5
U21-907129	33.1	35.2	32.3	32.2	32.7	33.4
U21-913162	33.8	33.9	33.9	31.9	34.1	33.9
U21-916129	32.7	33.2	32.6	32.0	32.9	33.5
U21-920106	32.8	32.9	32.6	32.3	32.5	32.9
U21-935155	33.7	34.1	34.0	31.9	31.5	33.7

**PRELIMINARY TEST IIIA, 2024**

**PROTEIN (%)**

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	34.2	34.4	34.2		33.6	34.5
LD18-6596	32.6	33.5	32.4		32.7	33.5
LD07-3395bf (SCN) (L)	30.1	31.8	30.6		32.9	30.3
U14-910097 (SCN) (E)	31.7	33.6	32.3		34.0	32.4
A18101-29	34.2	32.8	33.0		33.4	33.2
A18105-151	34.0	32.8	31.7		34.2	33.7
A18112-171	33.5	34.7	34.3		35.4	35.5
A18328-145Y	33.4	35.7	35.2		36.1	35.0
A18344-156Y	34.9	34.7	33.5		34.6	35.3
A18361-172	36.7	36.8	35.9		37.0	36.9
A18385-130	36.5	33.9	34.8		35.8	35.7
LD21-1222	30.5	32.1	30.5		34.1	31.9
LD21-2156	30.4	32.3	31.9		32.9	32.7
LD21-2688	33.7	32.8	31.7		32.8	31.5
LD21-7234	33.8	33.4	32.4		35.9	34.4
LD21-7338	30.8	32.5	31.6		32.5	31.8
LD21-7350	33.2	34.0	33.1		34.8	33.0
U20-212170	31.6	32.5	30.4		33.3	32.4
U20-222161	32.7	32.9	31.4		35.0	33.7
U20-225189	32.8	32.6	32.0		33.8	33.4
U20-237239	33.5	34.1	32.6		35.1	33.1
U20-304290	33.2	33.4	32.8		33.9	32.7
U20-306316	32.5	32.1	31.6		33.2	31.8
U20-306320	32.7	33.1	32.9		33.1	32.9
U20-307318	32.2	32.5	31.8		33.7	32.3
U21-907129	33.1	33.1	32.2		33.7	32.8
U21-913162	34.5	34.5	32.9		34.8	34.1
U21-916129	32.1	33.1	31.7		34.1	32.2
U21-920106	33.7	32.2	32.1		34.0	33.0
U21-935155	34.3	34.5	33.9		35.3	33.3

**PRELIMINARY TEST IIIA, 2024**

**OIL (%)**

Strain	Mean 10 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN
LD11-2170 (III)	20.5	20.5	20.8	21.1	20.9	20.4
LD18-6596	20.2	20.0	20.3	20.4	20.8	19.8
LD07-3395bf (SCN) (L)	20.9	20.0	21.8	21.3	21.2	20.7
U14-910097 (SCN) (E)	20.7	20.2	21.0	21.1	21.0	20.6
A18101-29	20.5	20.4	20.8	20.6	20.2	20.4
A18105-151	20.1	20.3	20.4	20.0	20.0	20.0
A18112-171	19.0	18.5	19.1	19.0	19.6	19.1
A18328-145Y	19.4	19.1	19.4	19.5	19.7	19.9
A18344-156Y	19.6	19.2	20.2	19.5	19.6	19.2
A18361-172	18.7	18.8	19.2	18.8	18.6	18.8
A18385-130	19.6	19.1	20.3	19.3	19.9	19.9
LD21-1222	19.6	19.2	19.7	20.0	20.0	19.6
LD21-2156	19.8	19.1	20.2	19.9	20.3	20.1
LD21-2688	20.7	20.3	20.7	20.9	21.6	20.8
LD21-7234	20.0	20.1	20.3	20.3	19.8	20.2
LD21-7338	20.7	20.5	20.5	21.2	21.0	21.2
LD21-7350	19.8	19.9	20.2	19.9	19.5	20.2
U20-212170	20.6	20.1	20.8	20.8	21.1	20.3
U20-222161	20.4	20.0	20.1	21.0	20.9	21.1
U20-225189	20.2	19.8	20.4	20.5	21.1	20.6
U20-237239	19.5	19.1	19.9	19.3	19.4	19.9
U20-304290	20.4	20.1	20.7	20.7	20.9	20.3
U20-306316	20.3	20.3	20.8	20.1	20.3	20.3
U20-306320	20.3	20.1	20.7	20.5	21.2	19.9
U20-307318	21.0	20.7	21.1	21.5	21.4	21.5
U21-907129	20.7	20.5	21.2	21.0	20.6	20.5
U21-913162	20.4	20.3	20.5	20.6	20.6	20.4
U21-916129	20.4	20.2	20.6	20.9	20.6	20.1
U21-920106	20.1	20.0	20.6	19.9	20.3	20.0
U21-935155	20.1	20.0	20.2	20.7	21.1	19.9

**PRELIMINARY TEST IIIA, 2024**

**OIL (%)**

Strain	Manhattan KS	Novelty MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	20.3	20.8	19.8		20.6	20.0
LD18-6596	20.2	20.5	20.1		20.6	19.7
LD07-3395bf (SCN) (L)	20.7	21.1	20.7		20.6	21.1
U14-910097 (SCN) (E)	20.8	20.9	20.8		20.5	20.3
A18101-29	19.9	21.0	20.4		20.8	20.2
A18105-151	19.8	21.1	20.3		19.6	19.9
A18112-171	19.4	19.4	18.6		19.0	18.3
A18328-145Y	20.0	19.8	19.1		18.6	19.1
A18344-156Y	19.5	20.0	19.9		20.2	19.2
A18361-172	19.0	19.2	19.0		18.3	17.7
A18385-130	19.0	20.5	19.7		19.4	19.0
LD21-1222	19.9	20.2	19.9		18.6	19.4
LD21-2156	19.6	20.1	19.9		19.6	19.0
LD21-2688	21.5	20.6	20.2		20.4	20.4
LD21-7234	20.3	20.5	20.2		19.1	19.1
LD21-7338	21.1	20.7	20.6		20.0	20.2
LD21-7350	20.3	20.2	19.9		19.1	19.2
U20-212170	20.9	21.0	20.8		20.0	20.1
U20-222161	20.8	20.8	20.9		19.4	19.4
U20-225189	20.2	21.0	19.9		19.4	19.5
U20-237239	19.8	20.2	19.4		19.2	19.0
U20-304290	20.6	20.9	20.0		20.2	20.0
U20-306316	20.4	20.5	20.2		20.4	19.5
U20-306320	20.2	20.4	20.1		20.2	20.0
U20-307318	21.0	21.1	20.9		20.3	20.3
U21-907129	20.3	21.1	20.9		20.3	20.4
U21-913162	20.4	20.7	20.4		20.2	20.0
U21-916129	20.8	20.9	19.8		20.4	19.8
U21-920106	19.7	20.3	20.0		20.1	20.1
U21-935155	20.0	20.2	20.0		19.6	19.6

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**Northern Regional Uniform Test  
Preliminary Test IIB, 2024**

Ent.	Strain	Parentage		Seed Source	Gen. Comp.	Unique Traits
		Female	Male			
1	LD11-2170 (III)	Syngenta 03JR313108	LD05-3171	Monteverde	F5	SCN, Rps1k
2	LD18-6596	U11-616086	LD11-2170	Monteverde	F5	SCN, Rps1k
3	LD07-3395bf (SCN) (L)	LD07-3395 Reselection		Monteverde	F5	SCN
4	U14-910097 (SCN) (E)	U09-105007	LD07-3419	Graef	F6	SCN (HR, HR)
5	CR21-01765			Rainey		
6	CR21-01770			Rainey		
7	CR21-01830			Rainey		
8	CR21-01910			Rainey		
9	CR21-02165			Rainey		
10	CR21-02230			Rainey		
11	CR21-02238			Rainey		
12	CR21-02797			Rainey		
13	CR21-05126			Rainey		
14	CR21-05897			Rainey		
15	HM21-52092	HM11-G011	HM11-G011 x PI424522	McHale	F4	
16	HM21-52131	HM11-G011	HM11-G011 x PI424522	McHale	F4	
17	HM21-52134	HM11-G011	HM11-G011 x PI424522	McHale	F4	
18	HM21-52137	HM11-G011	HM11-G011 x PI424522	McHale	F4	
19	HM21-52138	HM11-G011	HM11-G011 x PI424522	McHale	F4	
20	LG19-5848	LG11-2963	LD06-7620	Mahan	F6	Genetic Diversity, SCN
21	LG21-2513	LD07-3395bf	LG11-6760	Mahan	F6	25% exotic pedigree
22	LG21-2680	LG11-10931	LG13-4038	Mahan	F6	18% exotic pedigree
23	LG21-2735	LG11-2963	LD10-10198	Mahan	F6	
24	LG21-2736	LG11-2963	LD10-10198	Mahan	F6	
25	LG21-2809	LG11-2963	U11-614119	Mahan	F6	
26	LG21-2818	LG11-2963	U11-614119	Mahan	F6	
27	SA21-1879	SA10-8471	U15-606207	Scaboo	F5	rhg1-a, rhg2, Rhg4, Rps6, Rdc3
28	SA21-1921	SA10-8471	U15-606207	Scaboo	F5	rhg1-a, rhg2, Rhg4, Rps6, Rdc3
29	SA21-3651	SA13-2699	LD15-5776793	Scaboo	F5	Rhg1-b, BSR, Rdc3
30	SA21-5178	SA13-1385	SA17-15804	Scaboo	F5	Rps1c, BSR, Rdc3
31	SA21-6770	SA17-15865	LD15-5776793	Scaboo	F5	Rps1c, BSR, Rdc3
32	SA21-6839	SA17-15865	LD15-5776793	Scaboo	F5	BSR, Rdc3
33	SA22-3531	JTN-5516	LD11-2170	Scaboo	F5	rhg1-a, rhg2, Rhg4
34	SA22-3617	JTN-5516	LD11-2170	Scaboo	F5	rhg1-a, rhg2, Rhg4
35	SA22-5514	SA17-20063	SA18-13443	Scaboo	F5	

PRELIMINARY TEST IIIB, 2024

DESCRIPTIVE AND DISEASE DATA

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Strain	Descriptive Code
LD11-2170 (III)	PLtBDYBrI
LD18-6596	WLtBDYYI
LD07-3395bf (SCN) (L)	WGTDYBfI
U14-910097 (SCN) (E)	PGTDYBfI
CR21-01765	WLtBSYBI
CR21-01770	WGBDYHI
CR21-01830	WGBSYHI
CR21-01910	WGBSYBfI
CR21-02165	PGTDYGI
CR21-02230	WGBSYBfI
CR21-02238	P+WLtBSYGI
CR21-02797	WLtBSYGI
CR21-05126	PLtTDYBI
CR21-05897	WGBSYBfI
HM21-52092	PGTDYIbI
HM21-52131	PGTSYIbI
HM21-52134	PGTSYIbI
HM21-52137	PGTSYIbI
HM21-52138	PGTSYIbI
LG19-5848	PLtBSYBI
LG21-2513	WGTDYBfI
LG21-2680	PLtBDYBrI
LG21-2735	PGBSYGI
LG21-2736	PGBSYIbI
LG21-2809	PGTDYIbI
LG21-2818	WTBSYBI
SA21-1879	PGTDYBfI
SA21-1921	PGTDYBfI
SA21-3651	PGB+TDYIbI
SA21-5178	PGBDYIbI
SA21-6770	P+WGBSYHI
SA21-6839	PGBDYIbI
SA22-3531	PLtBSYBrI
SA22-3617	PLtB+TSYHI
SA22-5514	PLt+GBDYHI

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**PRELIMINARY TEST IIIB, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	12 bu/a	12 No.	11 Date	10 Score	Height 10 In.	Size 11 g/100	Quality 10 Score	Protein 11 %	Oil 11 %
LD11-2170 (III)	78.0	5	9/24	1.4	34	15.6	1.3	33.7	20.6
LD18-6596	75.2	8	4.3	1.5	33	15.1	1.5	32.5	20.2
LD07-3395bf (SCN) (L)	77.6	6	3.7	1.7	35	15.9	1.2	31.0	21.1
U14-910097 (SCN) (E)	79.1	2	0.5	2.4	33	15.3	1.1	32.6	20.7
CR21-01765	73.2	14	2.5	1.9	38	15.3	1.4	32.8	19.7
CR21-01770	72.0	19	-0.0	1.9	37	15.1	1.5	33.6	20.0
CR21-01830	67.6	30	1.1	2.0	36	15.7	1.4	32.8	20.2
CR21-01910	70.0	27	4.0	2.0	40	16.4	1.2	33.2	19.5
CR21-02165	71.3	23	2.4	2.3	39	12.9	1.4	33.5	19.3
CR21-02230	73.2	15	4.5	1.4	36	17.6	1.3	32.5	20.0
CR21-02238	71.3	23	2.3	2.5	40	13.4	1.3	33.4	19.4
CR21-02797	71.9	20	1.8	1.5	38	13.9	1.5	33.7	19.4
CR21-05126	72.1	18	4.6	2.0	41	15.4	1.2	33.0	20.1
CR21-05897	71.2	25	4.2	2.0	41	14.0	1.3	34.1	19.3
HM21-52092	66.4	35	-0.6	2.3	39	17.7	1.3	32.2	20.4
HM21-52131	66.8	33	-0.7	2.2	38	17.6	1.7	32.4	20.4
HM21-52134	66.5	34	0.0	2.2	38	17.6	1.4	32.3	20.3
HM21-52137	67.3	32	0.0	2.3	39	17.8	1.4	32.6	20.2
HM21-52138	67.6	31	-0.7	2.2	39	17.8	1.5	32.4	20.4
LG19-5848	73.3	13	4.3	1.9	38	16.7	1.4	34.4	19.2
LG21-2513	80.0	1	3.4	1.4	37	14.6	1.1	32.5	20.3
LG21-2680	78.1	3	-0.3	1.3	34	15.7	1.2	33.2	20.9
LG21-2735	74.2	9	1.9	1.9	38	15.0	1.3	33.5	19.3
LG21-2736	74.1	10	1.7	1.7	37	15.0	1.2	34.7	18.8
LG21-2809	78.1	4	0.4	2.3	38	14.5	1.0	33.2	19.0
LG21-2818	74.0	11	5.1	1.8	41	15.2	1.2	34.2	19.0
SA21-1879	71.4	22	5.1	1.4	38	14.5	1.1	32.2	20.8
SA21-1921	67.7	29	6.0	2.0	37	14.6	1.3	32.9	20.5
SA21-3651	75.6	7	4.6	1.4	37	15.5	1.1	34.5	19.5
SA21-5178	71.1	26	6.1	1.7	40	15.1	1.3	33.8	19.8
SA21-6770	72.5	16	5.6	1.4	36	14.2	1.1	32.2	19.7
SA21-6839	73.4	12	4.0	1.6	39	15.4	1.3	33.7	19.6
SA22-3531	69.3	28	4.8	1.7	41	14.5	1.4	33.0	19.3
SA22-3617	71.4	21	5.4	2.0	40	14.7	1.2	33.1	19.7
SA22-5514	72.5	17	4.4	1.4	43	15.7	1.1	32.8	20.0
Mean	72.4			1.8	37.9	15.5	1.3	33.1	19.9
C.V. (%)	7.1								
L.S.D. (5%)	2.9								

119.4 Days After Planting

**PRELIMINARY TEST IIIB, 2024**

**YIELD (bu/a)**

Strain	Mean 12 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	78.0	92.3	62.4	78.3	77.7	87.3	72.7
LD18-6596	75.2	84.4	62.7	67.7	64.3	87.4	77.9
LD07-3395bf (SCN) (L)	77.6	91.8	60.0	77.3	68.7	89.5	77.8
U14-910097 (SCN) (E)	79.1	88.1	68.5	82.4	72.9	86.3	84.7
CR21-01765	73.2	77.0	56.5	77.8	63.1	74.5	69.6
CR21-01770	72.0	86.4	54.9	80.4	70.7	80.2	71.2
CR21-01830	67.6	78.4	52.4	77.8	59.4	77.5	69.2
CR21-01910	70.0	78.5	55.9	68.8	59.6	81.9	67.6
CR21-02165	71.3	75.4	55.8	75.3	68.4	78.2	70.9
CR21-02230	73.2	91.4	59.5	73.7	64.8	82.1	72.3
CR21-02238	71.3	82.6	49.1	70.4	70.0	86.8	63.5
CR21-02797	71.9	77.7	56.7	73.8	70.6	81.4	68.6
CR21-05126	72.1	73.2	43.2	71.4	71.0	86.9	68.1
CR21-05897	71.2	74.9	50.7	74.7	70.9	80.1	67.3
HM21-52092	66.4	82.0	62.2	65.8	59.0	72.0	61.4
HM21-52131	66.8	78.3	59.1	65.1	66.0	80.5	65.0
HM21-52134	66.5	83.1	56.9	64.4	64.2	74.5	68.1
HM21-52137	67.3	84.1	51.8	64.7	56.8	72.8	61.7
HM21-52138	67.6	76.4	59.7	67.4	59.3	73.8	67.4
LG19-5848	73.3	87.8	54.4	75.5	65.8	84.3	66.7
LG21-2513	80.0	90.1	62.2	87.1	78.9	81.5	77.5
LG21-2680	78.1	83.3	60.7	81.3	75.4	86.3	73.2
LG21-2735	74.2	83.2	57.1	75.4	73.7	87.9	68.8
LG21-2736	74.1	88.2	52.3	70.8	69.5	89.0	67.7
LG21-2809	78.1	85.6	60.7	81.2	73.4	89.1	73.0
LG21-2818	74.0	79.9	56.8	75.5	78.0	85.0	66.2
SA21-1879	71.4	74.5	57.9	72.9	72.8	82.6	65.9
SA21-1921	67.7	71.0	51.7	70.0	63.9	75.8	68.9
SA21-3651	75.6	91.5	57.7	73.4	65.7	85.7	73.2
SA21-5178	71.1	79.0	53.1	64.8	64.1	83.1	68.3
SA21-6770	72.5	91.6	59.0	73.2	62.2	80.5	65.3
SA21-6839	73.4	78.1	63.8	63.7	63.5	84.6	68.7
SA22-3531	69.3	78.7	51.8	70.9	65.6	80.3	69.3
SA22-3617	71.4	79.7	56.8	77.2	69.3	84.1	76.2
SA22-5514	72.5	89.8	57.3	73.4	61.3	77.0	69.6
Location Mean		82.5	56.9	73.2	67.4	82.0	69.8
C.V. (%)		8.4	5.9	3.8	7.6	6.4	3.2
L.S.D. (5%)		14.1	6.8	5.6	10.4	10.6	4.5
Row Sp. (In.)		30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4
Reps		2	2	2	2	2	2

PRELIMINARY TEST IIIB, 2024

YIELD (bu/a)

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	84.6	78.5	86.9	84.8	67.0	65.5
LD18-6596	80.2	83.3	90.2	79.2	63.7	61.6
LD07-3395bf (SCN) (L)	83.5	76.4	91.6	83.1	66.0	65.8
U14-910097 (SCN) (E)	76.1	78.2	96.6	83.8	74.7	56.5
CR21-01765	79.6	72.7	95.4	77.6	63.5	71.2
CR21-01770	74.6	67.9	78.6	77.3	53.4	67.9
CR21-01830	70.8	71.0	70.8	85.1	48.1	51.1
CR21-01910	70.0	75.0	81.3	83.8	56.6	63.2
CR21-02165	73.7	72.1	74.3	87.4	60.4	64.1
CR21-02230	68.2	72.4	81.2	82.9	63.7	66.3
CR21-02238	65.3	71.6	85.0	76.5	65.8	69.5
CR21-02797	74.3	70.4	82.9	84.1	65.2	58.4
CR21-05126	75.9	80.6	88.7	75.5	57.0	73.8
CR21-05897	76.5	68.2	93.4	74.7	55.1	68.0
HM21-52092	71.0	57.7	77.2	69.9	54.8	63.9
HM21-52131	74.8	59.9	68.7	84.2	43.4	56.9
HM21-52134	68.6	61.9	61.6	76.6	52.9	65.0
HM21-52137	78.6	62.2	70.9	77.7	55.9	70.8
HM21-52138	72.2	64.7	73.5	75.5	59.2	61.6
LG19-5848	72.4	74.0	79.3	89.5	61.7	68.2
LG21-2513	88.5	81.5	93.2	88.3	68.8	65.5
LG21-2680	87.0	70.9	92.2	84.4	74.0	69.1
LG21-2735	80.8	74.5	84.8	72.2	64.8	69.9
LG21-2736	73.9	67.1	90.0	84.0	66.0	71.1
LG21-2809	87.4	74.1	89.8	91.0	70.5	64.1
LG21-2818	84.5	71.8	80.8	75.2	66.0	68.9
SA21-1879	76.5	72.0	82.2	70.6	65.1	64.3
SA21-1921	73.9	73.6	75.9	69.1	52.5	65.7
SA21-3651	86.8	74.2	83.1	80.4	66.5	69.6
SA21-5178	82.2	73.3	79.7	79.5	58.5	67.4
SA21-6770	82.7	72.0	82.4	79.3	50.5	71.7
SA21-6839	75.6	77.9	88.8	81.6	69.2	65.1
SA22-3531	71.7	68.1	80.2	70.2	62.8	61.6
SA22-3617	66.9	74.1	78.6	66.9	64.1	63.6
SA22-5514	79.3	70.4	83.6	74.0	63.9	69.6
Location Mean	76.8	71.8	82.7	79.3	61.5	65.6
C.V. (%)	7.4	6.3	7.0	7.5	11.9	6.4
L.S.D. (5%)	11.5	9.2	11.7	12.2	14.9	8.5
Row Sp. (In.)	30	30	30	30	30	8
Rows/Plot	4	4	4	4	4	8
Reps	2	2	2	2	2	2

PRELIMINARY TEST IIIB, 2024

YIELD RANK

Strain	Yield Rank	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Manhattan KS
LD11-2170 (III)	5	1	4	6	3	6	9
LD18-6596	8	13	3	28	23	5	2
LD07-3395bf (SCN) (L)	6	2	9	9	16	1	3
U14-910097 (SCN) (E)	2	9	1	2	7	10	1
CR21-01765	14	29	22	8	28	32	13
CR21-01770	19	11	25	5	11	25	11
CR21-01830	30	25	28	7	32	28	16
CR21-01910	27	24	23	27	31	19	25
CR21-02165	23	31	24	14	17	27	12
CR21-02230	15	5	11	17	22	18	10
CR21-02238	23	18	34	25	13	8	33
CR21-02797	20	28	21	16	12	21	20
CR21-05126	18	34	35	22	9	7	22
CR21-05897	25	32	33	15	10	26	27
HM21-52092	35	19	5	30	34	35	35
HM21-52131	33	26	12	31	18	22	32
HM21-52134	34	17	18	34	24	31	23
HM21-52137	32	14	31	33	35	34	34
HM21-52138	31	30	10	29	33	33	26
LG19-5848	13	10	26	11	19	14	28
LG21-2513	1	6	6	1	1	20	4
LG21-2680	3	15	7	3	4	9	6
LG21-2735	9	16	17	13	5	4	18
LG21-2736	10	8	29	24	14	3	24
LG21-2809	4	12	8	4	6	2	8
LG21-2818	11	20	20	12	2	12	29
SA21-1879	22	33	14	21	8	17	30
SA21-1921	29	35	32	26	26	30	17
SA21-3651	7	4	15	18	20	11	6
SA21-5178	26	22	27	32	25	16	21
SA21-6770	16	3	13	20	29	22	31
SA21-6839	12	27	2	35	27	13	19
SA22-3531	28	23	30	23	21	24	15
SA22-3617	21	21	19	10	15	15	5
SA22-5514	17	7	16	18	30	29	13

PRELIMINARY TEST IIIB, 2024

YIELD RANK

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	5	4	12	6	6	20
LD18-6596	11	1	7	19	18	29
LD07-3395bf (SCN) (L)	7	7	6	13	9	17
U14-910097 (SCN) (E)	17	5	1	11	1	34
CR21-01765	12	16	2	21	19	3
CR21-01770	21	29	27	22	30	14
CR21-01830	30	23	33	5	34	35
CR21-01910	31	8	20	12	26	28
CR21-02165	25	18	30	4	22	24
CR21-02230	33	17	21	14	17	16
CR21-02238	35	22	13	24	11	9
CR21-02797	22	26	17	9	12	32
CR21-05126	18	3	11	26	25	1
CR21-05897	16	27	3	28	28	13
HM21-52092	29	35	28	33	29	26
HM21-52131	20	34	34	8	35	33
HM21-52134	32	33	35	23	31	22
HM21-52137	14	32	32	20	27	5
HM21-52138	27	31	31	25	23	31
LG19-5848	26	13	25	2	21	12
LG21-2513	1	2	4	3	5	19
LG21-2680	3	24	5	7	2	10
LG21-2735	10	9	14	30	14	6
LG21-2736	23	30	8	10	8	4
LG21-2809	2	11	9	1	3	25
LG21-2818	6	21	22	27	9	11
SA21-1879	15	19	19	31	13	23
SA21-1921	23	14	29	34	32	18
SA21-3651	4	10	16	16	7	7
SA21-5178	9	15	24	17	24	15
SA21-6770	8	19	18	18	33	2
SA21-6839	19	6	10	15	4	21
SA22-3531	28	28	23	32	20	30
SA22-3617	34	11	26	35	15	27
SA22-5514	13	25	15	29	16	7

PRELIMINARY TEST IIIB, 2024

MATURITY (date)

Strain	Mean 11 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	9/24	9/25	9/20	9/25	9/24	9/15	9/29
LD18-6596	4	4	3	7	5	6	6
LD07-3395bf (SCN) (L)	4	5	3	6	2	8	4
U14-910097 (SCN) (E)	1	1	2	-1	-1	2	1
CR21-01765	3	2	3	6	1	3	2
CR21-01770	-0	1	1	0	-2	2	0
CR21-01830	1	2	2	-1	-1	1	3
CR21-01910	4	2	3	7	4	6	5
CR21-02165	2	2	3	5	3	4	2
CR21-02230	5	5	3	7	4	4	6
CR21-02238	2	2	2	4	2	4	2
CR21-02797	2	1	2	5	3	4	0
CR21-05126	5	4	3	7	4	10	4
CR21-05897	4	0	4	6	2	9	4
HM21-52092	-1	0	1	-3	-4	-1	-1
HM21-52131	-1	-1	1	-5	-4	-2	1
HM21-52134	0	1	0	-4	-3	0	0
HM21-52137	0	1	1	-3	-3	1	0
HM21-52138	-1	1	1	-4	-4	-2	0
LG19-5848	4	4	2	7	5	7	4
LG21-2513	3	3	3	6	2	7	2
LG21-2680	-0	-1	2	0	0	0	-2
LG21-2735	2	2	2	5	0	2	1
LG21-2736	2	3	3	5	0	3	0
LG21-2809	0	1	2	1	-3	2	-1
LG21-2818	5	3	3	8	7	8	3
SA21-1879	5	6	3	6	6	8	3
SA21-1921	6	3	4	6	5	10	8
SA21-3651	5	4	3	9	7	8	2
SA21-5178	6	4	3	7	8	9	6
SA21-6770	6	3	4	7	6	6	5
SA21-6839	4	3	2	7	5	4	3
SA22-3531	5	3	2	7	6	8	6
SA22-3617	5	3	2	10	5	8	6
SA22-5514	4	3	2	7	3	8	4
Date Planted	5/28	5/19	6/1	5/23	5/22	5/8	6/10
Days to Mature	119	129	111	125	125	130	111

PRELIMINARY TEST IIIB, 2024

MATURITY (date)

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	9/18	10/6	9/22		9/24	10/4
LD18-6596	4	2	3		2	7
LD07-3395bf (SCN) (L)	5	-2	3		1	9
U14-910097 (SCN) (E)	-1	0	0		-1	6
CR21-01765	3	0	3		0	5
CR21-01770	1	-2	1		-2	0
CR21-01830	3	1	0		0	3
CR21-01910	3	2	4		3	7
CR21-02165	1	0	0		-1	8
CR21-02230	5	4	3		3	9
CR21-02238	1	0	3		2	6
CR21-02797	2	0	0		-1	5
CR21-05126	8	0	5		1	8
CR21-05897	6	1	6		2	9
HM21-52092	1	-5	3		3	0
HM21-52131	1	-5	4		1	2
HM21-52134	3	-3	5		0	1
HM21-52137	2	-3	4		1	1
HM21-52138	1	-4	3		1	0
LG19-5848	5	1	5		3	7
LG21-2513	3	2	3		1	7
LG21-2680	1	-2	-2		-1	0
LG21-2735	1	0	1		2	7
LG21-2736	2	0	2		1	1
LG21-2809	-1	-2	-1		1	6
LG21-2818	8	1	4		5	9
SA21-1879	7	1	3		2	13
SA21-1921	9	4	3		3	13
SA21-3651	8	1	1		0	10
SA21-5178	8	4	6		3	12
SA21-6770	8	4	4		5	12
SA21-6839	7	1	4		1	8
SA22-3531	7	2	5		3	6
SA22-3617	7	3	5		5	7
SA22-5514	4	0	5		3	11
Date Planted	5/29	6/11	5/23		5/30	6/12
Days to Mature	112	117	122		117	114

PRELIMINARY TEST IIIB, 2024

LODGING (score)

Strain	Mean 10 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	1.4	1.0		1.0	1.0	1.0	1.0
LD18-6596	1.5	1.0		1.5	1.0	1.0	1.0
LD07-3395bf (SCN) (L)	1.7	1.0		1.5	1.0	2.0	1.0
U14-910097 (SCN) (E)	2.4	1.0		2.3	2.0	3.0	2.5
CR21-01765	1.9	1.0		1.0	1.0	1.0	2.5
CR21-01770	1.9	1.0		1.0	1.0	2.0	2.5
CR21-01830	2.0	1.0		1.0	1.5	2.0	1.5
CR21-01910	2.0	1.0		1.0	1.0	1.5	2.0
CR21-02165	2.3	1.0		1.5	1.0	2.0	2.5
CR21-02230	1.4	1.5		1.0	1.0	1.0	1.0
CR21-02238	2.5	1.5		1.8	1.5	2.0	2.5
CR21-02797	1.5	1.0		1.0	1.0	1.0	1.5
CR21-05126	2.0	1.0		1.3	1.5	2.0	2.0
CR21-05897	2.0	1.0		1.3	1.5	1.5	2.5
HM21-52092	2.3	1.5		1.5	1.0	3.0	3.0
HM21-52131	2.2	1.0		1.3	1.0	2.0	2.5
HM21-52134	2.2	1.5		1.3	1.0	2.0	2.0
HM21-52137	2.3	2.0		1.0	1.0	2.0	3.5
HM21-52138	2.2	1.5		1.0	1.0	3.0	2.5
LG19-5848	1.9	1.5		1.3	1.0	1.5	2.0
LG21-2513	1.4	1.0		1.0	1.0	1.0	1.0
LG21-2680	1.3	1.0		1.0	1.0	1.0	1.5
LG21-2735	1.9	1.0		1.0	1.0	2.0	2.0
LG21-2736	1.7	1.0		1.0	1.0	1.0	1.0
LG21-2809	2.3	1.5		1.0	1.0	2.0	3.0
LG21-2818	1.8	1.0		1.3	1.0	1.5	1.5
SA21-1879	1.4	1.0		1.0	1.0	1.0	1.0
SA21-1921	2.0	1.0		1.0	1.5	1.5	2.5
SA21-3651	1.4	1.0		1.0	1.0	1.0	1.0
SA21-5178	1.7	1.0		1.3	1.5	1.5	1.5
SA21-6770	1.4	1.0		1.0	1.0	1.0	1.0
SA21-6839	1.6	1.0		1.0	1.0	1.0	1.5
SA22-3531	1.7	1.0		1.0	1.0	1.0	2.0
SA22-3617	2.0	1.5		1.0	1.0	2.0	2.0
SA22-5514	1.4	1.0		1.0	1.0	1.0	1.0

PRELIMINARY TEST IIIB, 2024

LODGING (score)

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	2.0	1.5	2.0		2.0	1.0
LD18-6596	2.0	2.0	2.8		1.5	1.0
LD07-3395bf (SCN) (L)	1.5	2.0	2.5		3.0	1.0
U14-910097 (SCN) (E)	3.0	2.0	4.0		3.0	1.0
CR21-01765	3.0	1.5	4.3		3.0	1.0
CR21-01770	2.0	1.5	3.3		4.0	1.0
CR21-01830	2.0	1.5	4.3		4.0	1.0
CR21-01910	3.0	1.5	3.5		4.0	1.0
CR21-02165	4.0	1.5	4.5		3.5	1.0
CR21-02230	1.5	1.5	2.3		2.5	1.0
CR21-02238	4.5	2.0	4.0		4.0	1.0
CR21-02797	2.0	1.5	2.8		2.0	1.0
CR21-05126	2.5	1.5	4.0		3.5	1.0
CR21-05897	1.5	1.5	4.5		4.0	1.0
HM21-52092	3.0	1.5	3.3		4.5	1.0
HM21-52131	2.0	1.5	4.5		5.0	1.0
HM21-52134	3.5	1.5	4.0		4.0	1.0
HM21-52137	2.5	1.5	4.3		4.5	1.0
HM21-52138	2.0	2.0	3.3		4.5	1.0
LG19-5848	1.5	1.5	4.0		3.5	1.0
LG21-2513	1.5	1.5	2.5		2.0	1.0
LG21-2680	1.5	1.5	2.3		1.5	1.0
LG21-2735	2.0	1.5	3.3		4.0	1.0
LG21-2736	2.0	1.5	3.8		3.5	1.0
LG21-2809	3.5	2.0	4.0		3.5	1.0
LG21-2818	2.5	1.5	3.8		2.5	1.0
SA21-1879	1.5	2.0	2.5		2.0	1.0
SA21-1921	2.0	2.0	4.3		3.0	1.0
SA21-3651	1.0	1.5	2.5		2.5	1.0
SA21-5178	1.5	1.5	3.5		3.0	1.0
SA21-6770	1.5	1.5	2.0		2.5	1.0
SA21-6839	1.5	1.5	3.3		3.0	1.0
SA22-3531	1.5	2.0	3.5		2.5	1.0
SA22-3617	2.0	2.0	4.0		3.0	1.0
SA22-5514	2.0	1.5	2.8		1.5	1.0

PRELIMINARY TEST IIIB, 2024

PLANT HEIGHT (inches)

Strain	Mean 10 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	34	35		36	33	39	33
LD18-6596	33	35		33	30	37	35
LD07-3395bf (SCN) (L)	35	37		36	34	37	34
U14-910097 (SCN) (E)	33	34		34	34	37	34
CR21-01765	38	40		40	37	41	38
CR21-01770	37	38		41	35	40	34
CR21-01830	36	37		35	35	39	36
CR21-01910	40	42		41	38	43	41
CR21-02165	39	40		41	40	44	38
CR21-02230	36	41		35	35	39	37
CR21-02238	40	42		44	39	44	37
CR21-02797	38	39		40	36	43	40
CR21-05126	41	40		43	36	42	40
CR21-05897	41	43		43	41	46	37
HM21-52092	39	40		43	38	44	37
HM21-52131	38	37		42	41	43	34
HM21-52134	38	37		41	41	43	36
HM21-52137	39	39		42	37	43	37
HM21-52138	39	40		43	38	43	37
LG19-5848	38	39		41	37	41	35
LG21-2513	37	38		38	35	36	42
LG21-2680	34	34		35	33	37	29
LG21-2735	38	40		38	37	42	39
LG21-2736	37	40		38	35	42	36
LG21-2809	38	38		40	35	43	37
LG21-2818	41	44		43	41	45	40
SA21-1879	38	41		40	37	41	36
SA21-1921	37	38		40	37	39	36
SA21-3651	37	38		37	37	41	41
SA21-5178	40	45		42	39	45	39
SA21-6770	36	40		37	34	39	36
SA21-6839	39	40		37	39	43	41
SA22-3531	41	43		43	39	46	39
SA22-3617	40	43		42	40	47	40
SA22-5514	43	45		47	44	49	41

**PRELIMINARY TEST IIIB, 2024**

**PLANT HEIGHT (inches)**

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	34	32	42		36	26
LD18-6596	32	33	40		34	24
LD07-3395bf (SCN) (L)	32	32	45		34	27
U14-910097 (SCN) (E)	33	32	39		33	24
CR21-01765	37	34	43		38	31
CR21-01770	36	34	45		39	29
CR21-01830	37	34	44		36	26
CR21-01910	37	37	49		38	31
CR21-02165	41	37	44		38	32
CR21-02230	32	33	45		37	27
CR21-02238	39	37	45		39	33
CR21-02797	37	35	47		39	28
CR21-05126	43	41	50		38	33
CR21-05897	43	38	48		42	34
HM21-52092	41	35	48		37	29
HM21-52131	37	34	45		37	30
HM21-52134	38	35	45		37	30
HM21-52137	41	36	44		41	31
HM21-52138	41	33	46		38	29
LG19-5848	33	37	44		37	33
LG21-2513	35	34	43		39	27
LG21-2680	35	33	43		36	27
LG21-2735	36	36	44		39	29
LG21-2736	35	34	46		40	29
LG21-2809	37	35	44		36	31
LG21-2818	43	40	43		40	31
SA21-1879	37	35	44		39	29
SA21-1921	37	34	45		36	29
SA21-3651	32	35	44		38	28
SA21-5178	38	36	50		40	27
SA21-6770	35	33	43		36	29
SA21-6839	39	35	50		39	30
SA22-3531	43	37	46		42	31
SA22-3617	39	36	46		37	30
SA22-5514	45	37	50		42	31

PRELIMINARY TEST IIIB, 2024

SEED SIZE (g/100)

Strain	Mean 11 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	15.6	15.4	13.2	16.2	16.5	16.7	17.1
LD18-6596	15.1	15.0	13.6	15.5	15.0	15.3	16.4
LD07-3395bf (SCN) (L)	15.9	16.1	14.4	16.1	15.7	16.5	17.5
U14-910097 (SCN) (E)	15.3	15.2	13.7	15.3	14.4	15.9	17.4
CR21-01765	15.3	16.1	12.4	15.7	14.4	15.7	16.4
CR21-01770	15.1	15.7	13.7	16.0	15.0	15.4	15.7
CR21-01830	15.7	16.1	12.7	16.7	16.6	17.1	16.1
CR21-01910	16.4	16.2	13.7	17.7	17.0	17.2	18.2
CR21-02165	12.9	13.1	11.3	13.6	13.1	13.1	14.8
CR21-02230	17.6	17.8	15.1	18.4	18.3	18.5	17.8
CR21-02238	13.4	14.1	10.4	13.8	13.7	14.2	15.0
CR21-02797	13.9	13.9	11.7	15.1	14.7	14.3	15.3
CR21-05126	15.4	14.7	12.1	15.2	15.0	15.6	16.8
CR21-05897	14.0	14.3	11.7	14.4	14.2	14.0	15.2
HM21-52092	17.7	18.5	16.2	17.9	16.5	18.3	19.2
HM21-52131	17.6	17.6	15.7	17.8	18.7	18.2	19.1
HM21-52134	17.6	18.4	15.2	17.9	17.6	17.8	19.5
HM21-52137	17.8	18.2	15.5	18.2	16.7	17.9	19.6
HM21-52138	17.8	18.1	15.3	18.4	17.8	17.8	19.1
LG19-5848	16.7	16.9	14.9	17.2	17.2	17.5	17.3
LG21-2513	14.6	15.5	12.0	14.7	15.0	15.0	16.0
LG21-2680	15.7	15.3	13.5	16.3	15.8	16.7	19.0
LG21-2735	15.0	15.2	12.8	15.7	14.7	15.1	15.7
LG21-2736	15.0	15.4	12.3	15.6	15.2	14.3	16.2
LG21-2809	14.5	15.0	12.2	15.4	15.0	14.6	15.5
LG21-2818	15.2	15.6	13.1	15.8	15.7	15.3	16.2
SA21-1879	14.5	14.5	12.3	14.6	14.4	15.1	16.6
SA21-1921	14.6	13.8	11.8	14.6	14.0	15.9	16.2
SA21-3651	15.5	16.2	13.9	16.1	15.9	15.9	15.8
SA21-5178	15.1	15.8	13.0	16.2	15.6	14.5	16.5
SA21-6770	14.2	14.4	12.1	14.4	13.7	16.0	14.8
SA21-6839	15.4	15.5	13.6	15.6	15.4	14.9	16.9
SA22-3531	14.5	14.5	12.2	14.9	15.0	15.8	15.6
SA22-3617	14.7	14.9	12.6	15.1	14.6	14.6	16.6
SA22-5514	15.7	16.6	13.6	15.6	15.9	16.0	17.4

**PRELIMINARY TEST IIIB, 2024**

**SEED SIZE (g/100)**

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	14.8	16.8	14.4		15.9	14.2
LD18-6596	14.6	16.9	15.6		14.0	13.9
LD07-3395bf (SCN) (L)	15.0	16.7	16.8		14.5	15.3
U14-910097 (SCN) (E)	15.2	16.6	15.3		15.1	13.9
CR21-01765	15.8	16.2	16.0		14.7	14.5
CR21-01770	15.3	16.0	15.0		14.2	13.7
CR21-01830	16.4	17.0	14.0		14.7	15.1
CR21-01910	16.4	17.5	16.1		15.2	15.3
CR21-02165	13.1	14.0	12.3		12.0	11.9
CR21-02230	18.0	18.5	16.9		17.5	16.3
CR21-02238	13.3	14.3	13.7		13.2	12.0
CR21-02797	13.3	14.3	14.0		13.4	12.5
CR21-05126	19.6	16.0	15.6		14.0	14.6
CR21-05897	14.0	14.6	14.5		13.9	12.8
HM21-52092	18.0	17.8	18.6		17.8	15.7
HM21-52131	17.2	17.7	17.8		18.0	15.7
HM21-52134	16.3	18.5	18.3		17.3	16.4
HM21-52137	19.2	18.7	18.0		18.3	15.1
HM21-52138	18.7	18.3	18.5		18.3	16.0
LG19-5848	16.9	17.8	16.8		16.2	15.4
LG21-2513	14.7	15.8	15.2		13.8	13.2
LG21-2680	15.4	15.5	15.0		15.3	14.6
LG21-2735	15.0	16.6	14.9		14.9	14.6
LG21-2736	14.8	16.6	15.2		15.1	14.6
LG21-2809	14.5	14.7	14.4		14.5	14.0
LG21-2818	14.9	16.0	14.7		15.0	14.8
SA21-1879	14.1	16.0	14.2		13.9	14.3
SA21-1921	14.0	17.0	14.3		13.7	14.8
SA21-3651	15.4	16.5	15.1		13.9	15.5
SA21-5178	14.8	15.8	15.7		13.8	14.9
SA21-6770	14.3	15.1	14.3		12.7	13.9
SA21-6839	15.0	16.9	15.5		15.0	15.2
SA22-3531	13.6	16.4	14.2		13.8	13.3
SA22-3617	14.7	15.7	14.4		14.7	13.6
SA22-5514	15.7	15.7	14.6		16.1	15.9

PRELIMINARY TEST IIIB, 2024

SEED QUALITY (score)

Strain	Mean 10 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	1.3	1.0	1.5	1.0	2.0	1.0	2.0
LD18-6596	1.5	1.0	1.0	1.5	3.0	2.0	2.0
LD07-3395bf (SCN) (L)	1.2	1.0	1.0	1.0	2.0	1.0	2.0
U14-910097 (SCN) (E)	1.1	1.0	1.0	1.0	2.0	1.0	1.0
CR21-01765	1.4	1.0	1.5	1.5	2.0	1.0	3.0
CR21-01770	1.5	1.0	1.0	1.0	3.0	1.0	2.0
CR21-01830	1.4	1.0	1.0	1.5	3.0	1.5	2.0
CR21-01910	1.2	1.0	1.5	1.0	2.0	1.0	1.0
CR21-02165	1.4	1.0	1.0	2.0	3.0	1.0	2.0
CR21-02230	1.3	1.0	1.0	1.5	2.0	1.0	2.0
CR21-02238	1.3	1.0	2.0	1.5	1.0	1.0	2.0
CR21-02797	1.5	1.0	1.0	1.5	4.0	1.0	2.0
CR21-05126	1.2	1.0	1.0	1.0	2.0	1.0	2.0
CR21-05897	1.3	1.0	1.0	1.0	2.0	1.5	2.0
HM21-52092	1.3	1.0	1.0	2.0	3.0	1.0	1.0
HM21-52131	1.7	1.5	1.5	2.0	2.0	1.5	3.0
HM21-52134	1.4	1.0	1.5	1.5	2.0	1.0	2.0
HM21-52137	1.4	1.0	1.0	1.0	2.0	2.0	2.0
HM21-52138	1.5	1.0	1.0	1.5	3.0	1.0	2.0
LG19-5848	1.4	1.0	1.0	1.5	2.0	1.0	2.0
LG21-2513	1.1	1.0	1.0	1.0	1.0	1.0	2.0
LG21-2680	1.2	1.0	1.0	1.0	2.0	1.0	2.0
LG21-2735	1.3	1.0	1.0	1.5	2.0	1.5	2.0
LG21-2736	1.2	1.0	1.0	1.0	2.0	1.0	2.0
LG21-2809	1.0	1.0	1.0	1.0	1.0	1.0	1.0
LG21-2818	1.2	1.0	1.0	1.0	2.0	1.0	2.0
SA21-1879	1.1	1.0	1.0	1.0	1.0	1.0	2.0
SA21-1921	1.3	1.5	1.0	1.5	2.0	1.0	2.0
SA21-3651	1.1	1.0	1.0	1.5	1.0	1.0	1.0
SA21-5178	1.3	1.5	1.0	1.5	2.0	1.0	2.0
SA21-6770	1.1	1.0	1.0	1.0	1.0	1.0	2.0
SA21-6839	1.3	1.0	1.0	1.0	2.0	1.5	2.0
SA22-3531	1.4	1.0	1.0	1.5	2.0	1.0	3.0
SA22-3617	1.2	1.0	1.0	1.5	1.0	1.0	2.0
SA22-5514	1.1	1.0	1.0	1.0	2.0	1.0	1.0

**PRELIMINARY TEST IIIB, 2024**

**SEED QUALITY (score)**

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	1.0	1.0	1.0		1.0	
LD18-6596	1.0	1.0	1.0		1.0	
LD07-3395bf (SCN) (L)	1.0	1.0	1.0		1.0	
U14-910097 (SCN) (E)	1.0	1.0	1.0		1.0	
CR21-01765	1.0	1.0	1.0		1.0	
CR21-01770	1.0	2.5	1.0		1.0	
CR21-01830	1.0	1.0	1.0		1.0	
CR21-01910	1.0	1.5	1.0		1.0	
CR21-02165	1.0	1.0	1.0		1.0	
CR21-02230	1.0	1.0	1.0		1.0	
CR21-02238	1.0	1.0	1.0		1.0	
CR21-02797	1.0	1.0	1.0		1.0	
CR21-05126	1.0	1.0	1.0		1.0	
CR21-05897	1.0	1.0	1.0		1.0	
HM21-52092	1.0	1.0	1.0		1.0	
HM21-52131	2.0	1.0	1.0		1.0	
HM21-52134	2.0	1.0	1.0		1.0	
HM21-52137	2.0	1.0	1.0		1.0	
HM21-52138	2.0	1.0	1.0		1.0	
LG19-5848	2.0	1.0	1.0		1.0	
LG21-2513	1.0	1.0	1.0		1.0	
LG21-2680	1.0	1.0	1.0		1.0	
LG21-2735	1.0	1.0	1.0		1.0	
LG21-2736	1.0	1.0	1.0		1.0	
LG21-2809	1.0	1.0	1.0		1.0	
LG21-2818	1.0	1.0	1.0		1.0	
SA21-1879	1.0	1.0	1.0		1.0	
SA21-1921	1.0	1.0	1.0		1.0	
SA21-3651	1.0	1.0	1.0		1.0	
SA21-5178	1.0	1.0	1.0		1.0	
SA21-6770	1.0	1.0	1.0		1.0	
SA21-6839	1.0	1.0	1.0		1.0	
SA22-3531	1.0	1.0	1.0		1.0	
SA22-3617	1.0	1.0	1.0		1.0	
SA22-5514	1.0	1.0	1.0		1.0	

**PRELIMINARY TEST IIIB, 2024**

**PROTEIN (%)**

Strain	Mean 11 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	33.7	34.2	35.1	33.5	32.6	32.3	34.4
LD18-6596	32.5	33.5	34.3	31.3	31.8	32.1	32.0
LD07-3395bf (SCN) (L)	31.0	31.2	31.1	30.3	29.9	32.2	32.0
U14-910097 (SCN) (E)	32.6	33.4	33.6	31.5	30.7	32.2	34.1
CR21-01765	32.8	33.6	34.2	32.0	31.3	32.4	32.9
CR21-01770	33.6	33.7	34.3	32.9	32.3	33.9	34.1
CR21-01830	32.8	33.6	32.7	32.4	31.9	33.3	33.4
CR21-01910	33.2	33.5	33.1	33.7	33.1	33.9	33.0
CR21-02165	33.5	34.1	33.9	32.6	32.5	33.1	34.2
CR21-02230	32.5	33.0	33.0	32.4	31.9	32.5	32.9
CR21-02238	33.4	34.2	35.8	32.5	31.0	33.3	33.9
CR21-02797	33.7	34.4	33.8	33.0	34.1	33.6	34.0
CR21-05126	33.0	33.3	33.8	33.2	32.1	33.7	33.3
CR21-05897	34.1	35.8	35.4	32.8	32.7	34.2	33.7
HM21-52092	32.2	33.0	33.7	30.3	30.7	33.1	31.6
HM21-52131	32.4	33.0	32.1	30.2	31.9	33.1	32.2
HM21-52134	32.3	34.0	29.2	31.3	31.3	33.2	33.8
HM21-52137	32.6	33.0	33.4	30.9	31.0	33.0	34.1
HM21-52138	32.4	33.8	33.0	31.3	30.8	32.2	32.6
LG19-5848	34.4	34.5	35.1	33.3	34.6	34.0	35.1
LG21-2513	32.5	33.1	32.2	32.0	32.7	33.6	32.0
LG21-2680	33.2	33.7	33.6	32.4	32.2	34.0	32.7
LG21-2735	33.5	34.4	32.2	33.1	32.6	33.5	34.2
LG21-2736	34.7	35.5	34.3	34.3	34.3	35.0	34.2
LG21-2809	33.2	34.2	33.8	31.8	32.3	34.1	33.0
LG21-2818	34.2	35.4	35.0	33.7	33.1	34.4	34.6
SA21-1879	32.2	32.4	32.7	32.8	30.5	33.5	32.8
SA21-1921	32.9	33.9	32.6	33.8	32.0	33.4	32.2
SA21-3651	34.5	34.6	34.7	35.0	34.5	35.3	33.6
SA21-5178	33.8	34.8	33.9	34.0	33.0	34.0	33.5
SA21-6770	32.2	32.0	32.5	32.5	31.4	32.7	32.5
SA21-6839	33.7	35.0	34.8	32.5	32.7	33.9	34.1
SA22-3531	33.0	33.9	33.8	33.6	33.3	33.4	34.1
SA22-3617	33.1	33.7	33.1	32.2	33.1	33.0	33.0
SA22-5514	32.8	33.7	33.2	32.2	31.4	32.7	32.8

**PRELIMINARY TEST IIIB, 2024**

**PROTEIN (%)**

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	35.2	31.4	33.7		34.2	34.0
LD18-6596	33.0	31.4	32.1		33.4	32.9
LD07-3395bf (SCN) (L)	32.3	28.9	31.1		33.0	29.4
U14-910097 (SCN) (E)	33.7	30.9	32.7		33.5	32.6
CR21-01765	32.7	31.4	32.7		34.1	33.8
CR21-01770	34.1	31.9	33.7		34.5	34.1
CR21-01830	33.4	31.0	31.9		33.1	33.6
CR21-01910	33.9	32.2	32.6		32.5	33.5
CR21-02165	34.7	31.1	34.0		34.7	34.2
CR21-02230	33.3	31.3	31.3		32.9	32.4
CR21-02238	34.4	30.7	33.1		34.9	33.5
CR21-02797	34.5	31.5	33.8		34.1	34.0
CR21-05126	33.8	30.9	32.0		33.2	33.9
CR21-05897	34.7	32.6	34.5		34.6	34.2
HM21-52092	33.8	30.7	32.7		32.4	31.8
HM21-52131	34.3	31.1	33.0		32.8	32.9
HM21-52134	33.3	31.2	32.7		32.2	32.6
HM21-52137	34.5	30.5	33.0		32.2	32.8
HM21-52138	33.6	31.2	33.0		32.5	32.6
LG19-5848	34.9	32.4	34.7		35.2	34.6
LG21-2513	33.6	31.0	31.8		32.9	32.6
LG21-2680	34.3	32.2	32.3		33.5	34.3
LG21-2735	34.8	32.9	32.6		34.9	33.5
LG21-2736	35.0	33.7	34.8		34.2	36.0
LG21-2809	33.9	32.4	32.6		33.2	34.1
LG21-2818	35.0	32.8	33.2		34.7	34.2
SA21-1879	34.2	30.4	31.3		33.4	29.8
SA21-1921	33.7	31.9	32.8		34.3	31.0
SA21-3651	35.1	33.7	33.2		35.4	34.8
SA21-5178	34.8	32.7	34.1		34.2	33.1
SA21-6770	33.0	32.0	31.8		32.5	31.9
SA21-6839	33.4	32.1	33.2		35.0	33.6
SA22-3531	31.7	31.4	33.1		32.7	32.5
SA22-3617	34.2	31.9	32.8		33.7	33.5
SA22-5514	33.3	31.9	33.3		33.5	32.8

**PRELIMINARY TEST IIIB, 2024**

**OIL (%)**

Strain	Mean 11 Tests	Ames IA	Lucas IA	Savoy IL	Urbana IL	West Lafayette IN	Man- hattan KS
LD11-2170 (III)	20.6	20.2	20.3	20.6	20.9	20.8	20.1
LD18-6596	20.2	19.7	19.8	20.6	20.7	20.4	20.2
LD07-3395bf (SCN) (L)	21.1	20.9	21.7	21.3	21.7	20.8	20.5
U14-910097 (SCN) (E)	20.7	20.3	20.7	20.8	21.5	21.0	19.7
CR21-01765	19.7	19.3	19.5	19.9	20.5	19.5	19.6
CR21-01770	20.0	19.5	20.3	20.1	21.0	19.9	19.2
CR21-01830	20.2	19.5	20.9	20.5	20.3	19.9	19.6
CR21-01910	19.5	19.2	19.5	19.1	19.7	19.0	19.8
CR21-02165	19.3	18.9	19.6	19.5	19.7	19.3	19.1
CR21-02230	20.0	19.5	20.2	20.0	20.1	19.8	19.4
CR21-02238	19.4	19.1	18.6	19.9	20.4	19.3	19.1
CR21-02797	19.4	18.9	19.4	19.6	19.2	19.5	19.3
CR21-05126	20.1	20.1	20.2	20.2	20.7	19.5	20.1
CR21-05897	19.3	18.7	19.0	19.7	19.8	19.3	19.6
HM21-52092	20.4	19.9	20.4	20.5	21.2	19.7	20.3
HM21-52131	20.4	20.1	20.8	21.2	20.7	20.1	20.4
HM21-52134	20.3	19.7	20.5	20.4	20.7	20.1	20.3
HM21-52137	20.2	19.7	20.5	20.4	21.6	20.3	19.2
HM21-52138	20.4	19.4	20.5	20.4	20.9	20.6	20.4
LG19-5848	19.2	18.9	19.4	19.6	19.3	19.1	18.4
LG21-2513	20.3	20.1	20.4	20.4	20.0	19.6	20.6
LG21-2680	20.9	20.9	20.8	20.9	21.0	20.6	21.2
LG21-2735	19.3	18.5	19.9	19.2	19.7	19.2	18.7
LG21-2736	18.8	18.4	19.3	18.7	18.9	18.5	18.7
LG21-2809	19.0	18.3	19.1	19.2	19.4	18.5	19.0
LG21-2818	19.0	18.4	18.9	19.2	19.3	18.5	19.0
SA21-1879	20.8	20.5	21.0	20.5	21.4	21.0	20.4
SA21-1921	20.5	19.9	21.0	20.1	21.0	20.3	20.3
SA21-3651	19.5	18.8	19.9	19.1	19.8	19.6	19.7
SA21-5178	19.8	19.0	20.0	20.1	20.3	19.5	20.1
SA21-6770	19.7	19.7	19.6	19.6	20.1	19.2	19.8
SA21-6839	19.6	19.2	19.4	20.0	19.9	19.1	19.2
SA22-3531	19.3	18.6	19.5	19.1	19.6	19.0	18.6
SA22-3617	19.7	19.2	20.3	19.7	19.9	19.6	19.8
SA22-5514	20.0	19.4	20.2	20.1	20.4	19.9	19.5

**PRELIMINARY TEST IIIB, 2024**

**OIL (%)**

Strain	Novelty MO	Rock Port MO	Cook NE	Phillips NE	Steven's Creek NE	Hoyt- ville OH
LD11-2170 (III)	20.3	21.7	20.3		20.5	20.3
LD18-6596	20.5	20.6	20.4		19.6	19.9
LD07-3395bf (SCN) (L)	21.2	21.9	20.8		20.5	21.5
U14-910097 (SCN) (E)	21.1	21.6	20.3		20.5	20.6
CR21-01765	20.0	20.4	19.6		19.2	19.3
CR21-01770	20.1	21.1	19.8		19.6	19.5
CR21-01830	20.3	20.9	20.1		20.5	20.0
CR21-01910	19.8	20.1	19.6		20.0	19.2
CR21-02165	19.3	20.3	19.0		18.8	18.6
CR21-02230	20.1	20.7	20.2		20.3	19.6
CR21-02238	19.5	20.4	19.4		18.9	18.6
CR21-02797	19.8	20.3	19.4		19.2	18.8
CR21-05126	20.1	21.3	20.2		20.0	19.2
CR21-05897	19.2	19.9	19.3		19.2	19.1
HM21-52092	20.0	21.2	19.7		20.8	20.8
HM21-52131	19.3	21.3	19.6		20.6	20.2
HM21-52134	20.2	21.1	19.4		20.6	20.3
HM21-52137	19.3	21.4	19.2		20.8	20.1
HM21-52138	20.0	21.0	19.9		20.8	20.3
LG19-5848	19.6	19.7	19.0		18.9	19.0
LG21-2513	20.1	21.0	20.6		20.0	20.2
LG21-2680	20.7	21.4	21.0		21.0	20.2
LG21-2735	19.1	19.9	19.4		19.1	19.5
LG21-2736	18.9	19.5	18.6		19.0	18.6
LG21-2809	18.9	19.7	18.9		19.5	18.5
LG21-2818	19.0	19.8	19.2		19.1	18.9
SA21-1879	20.3	21.4	20.9		20.2	20.7
SA21-1921	20.5	21.0	20.4		19.9	21.2
SA21-3651	19.8	20.2	19.9		19.4	18.6
SA21-5178	19.9	20.4	19.3		19.9	19.4
SA21-6770	19.9	19.9	20.0		19.9	18.9
SA21-6839	20.3	20.4	19.9		19.1	19.1
SA22-3531	19.4	19.8	19.3		19.8	19.2
SA22-3617	19.9	20.2	19.9		19.6	19.1
SA22-5514	20.6	20.5	19.7		20.1	19.2

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**Northern Regional Uniform Test  
Uniform Test IV, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	LD15-3818 (IV)	LD09-3913	BN09002129	Monteverde	5	F5	SCN, Rps1a
2	LD00-2817 (L)	Ina	Dwight	Monteverde	17	F5	SCN
3	LD07-3395bf (SCN) (E)	LD07-3395 Reselection		Monteverde	9	F5	SCN
4	K18-1994	LD07-3395bf	K11-2363T	Schapaugh	2	F4	SCN
5	CR183106	4J105-3-9	LD00-3309	Rainey	2	F6	SCN
6	CR183264	4J105-3-9	LD00-3309	Rainey	2	F6	SCN, Rps1c
7	CR184183	4J105-3-4	LG04-6000	Rainey	2	F6	SCN, Rps1c
8	CR190628	DS11-13018	DS11-12076	Rainey	1	F5	
9	CR20-4991			Rainey	23 PT IV		SCN
10	CR20-5030			Rainey	23 PT IV		SCN
11	CR20-5469			Rainey	23 PT III B		
12	CR20-5470			Rainey	23 PT IV		SCN
13	LD19-10076	LD12-459	LD13-8769	Monteverde	23 SCN U IV	F5	SCN soja
14	LD19-10244	LG12-2177	LD13-8769	Monteverde	23 SCN U IV	F5	SCN soja
15	LD19-4657	LD13-3483	LG11-6760	Monteverde	1	F5	
16	LD20-11622	LD12-3903	LD11-2170	Monteverde	1	F4	SCN, Rps
17	LD20-11748	U14-910097	LD15-3818	Monteverde	23 SCN U IV	F5	SCN (rhg1,4), Rps1a
18	LD20-1723	LD11-2170	LD12-3903	Monteverde	23 PT IV	F5	SCN, Rps1c
19	LD20-3559	3A53861	LD12-3903	Monteverde	23 PT IV	F5	SCN, Rps1c
20	LD20-6649	LG12-2177	LD12-3903	Monteverde	23 PT IV	F5	SCN, Rps1c
21	SA18-10815	LG11-6210	SA13-2699	Scaboo	1	F5	Rhg1b,BSR,SC
22	SA18-12086	LD07-3395bf	SA13-1363	Scaboo	1	F5	Rhg1a,Rhg4,SC
23	SA18-9643	LD11-7311	SA13-1363	Scaboo	23 PT IV	F5	Rhg1-b, Rdc3
24	SA19-10687	SA13-2926	LD11-2170	Scaboo	23 PT III B	F5	Rhg1-b, Rps1k, Rdc3
25	SA19-10772	SA13-2926	LD11-2170	Scaboo	1	F5	Rps1k,BSR,SC
26	SA19-12580	U14-924158	LD11-2170	Scaboo	1	F5	Rhg1b,BSR,SC
27	SA19-5082	SA13-1385	LD11-2170	Scaboo	23 PT III B	F5	Rhg1-b, Rps1k, Rdc3
28	SA19-7733	SA13-1385	LD06-7620	Scaboo	23 PT IV	F5	Rhg1-b, Rdc3, BSR
29	SA19-7754	SA13-1385	LD06-7620	Scaboo	23 PT IV	F5	Rhg1-b, Rdc3
30	SA20-2212	SA13-1385	18AS-9	Scaboo	23 PT III B	F5	Rhg1-b, Rdc3, BSR
31	SA20-2256	SA13-1385	18AS-9	Scaboo	23 PT III B	F5	Rhg1-b, H-Rps1a, Rdc3, BSR
32	SA21-3590	SA13-2699	LD15-5776793	Scaboo	23 PT III B	F5	SCN, Rps1c

## UNIFORM TEST IV, 2024

### DESCRIPTIVE AND DISEASE DATA

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Strain	Descriptive Code
LD15-3818 (IV)	PLtTDYBI
LD00-2817 (L)	PGTDYIbI
LD07-3395bf (SCN) (E)	WGTDYBfI
K18-1994	WGTDYBfI
CR183106	P+WTB+TSYBI
CR183264	P+WlTTSYBI
CR184183	WlTBSYBI
CR190628	P+WTTDYBI
CR20-4991	WT+LtBSYBI
CR20-5030	P+WlTBSYHI
CR20-5469	WlTBSYBI
CR20-5470	WlTBSYBI
LD19-10076	PGBDYIbI
LD19-10244	WlTBDYBI
LD19-4657	WGBDYBfI
LD20-11622	PLtBDYBI
LD20-11748	PLtTDYBrI
LD20-1723	PLtBDYBrI
LD20-3559	WlTBSYBI
LD20-6649	WlTBDYBI
SA18-10815	WGTDYBfI
SA18-12086	WGTDYBfI
SA18-9643	WlTTDYBI
SA19-10687	PLtTDYBrI
SA19-10772	PLtTDYBI
SA19-12580	PLtBDYBrI
SA19-5082	PLtTDYBI
SA19-7733	WlTTDYBI
SA19-7754	PLtBDYBI
SA20-2212	PLtTDYBI
SA20-2256	PLtBDYBI
SA21-3590	PLtBSYBI

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**UNIFORM TEST IV, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	9 bu/a	9 No.	9 Date	9 Score	8 Height In.	9 Size g/100	9 Quality Score	10 Protein %	10 Oil %
LD15-3818 (IV)	78.9	2	9/30	1.4	35	16.3	1.6	34.8	19.8
LD00-2817 (L)	68.0	30	0.8	2.0	40	14.0	1.8	32.5	20.5
LD07-3395bf (SCN) (E)	76.7	7	-3.4	1.5	32	16.6	1.5	32.2	20.8
K18-1994	73.5	15	3.1	1.4	31	15.0	1.7	32.6	20.2
CR183106	71.9	21	-2.4	1.3	36	14.3	1.4	34.9	19.9
CR183264	71.9	20	-2.6	1.4	36	13.9	1.2	34.5	19.7
CR184183	71.3	23	-0.8	1.7	37	16.6	1.1	34.5	19.5
CR190628	62.0	32	-3.1	2.7	40	14.3	1.3	33.1	20.4
CR20-4991	68.2	29	-1.9	1.6	35	15.2	1.4	33.9	19.7
CR20-5030	73.7	14	-3.4	1.4	33	15.0	1.6	34.0	19.9
CR20-5469	69.5	26	-0.4	2.1	42	14.5	1.3	33.5	20.4
CR20-5470	69.5	27	-2.5	2.3	39	16.0	1.3	33.3	20.1
LD19-10076	74.5	12	-0.8	1.6	35	15.4	1.5	33.7	20.3
LD19-10244	69.6	25	3.8	2.7	43	14.8	1.6	33.8	19.9
LD19-4657	70.3	24	-0.1	2.3	36	14.5	1.6	34.3	19.2
LD20-11622	78.4	4	-2.5	1.5	35	18.3	1.6	34.0	19.9
LD20-11748	81.1	1	-2.3	1.2	35	15.2	1.3	33.4	20.5
LD20-1723	75.1	10	-3.7	1.3	33	16.0	1.4	33.6	20.2
LD20-3559	77.2	6	-0.9	1.3	36	15.2	1.0	33.6	19.8
LD20-6649	72.9	17	-1.0	2.0	35	17.5	1.4	32.6	20.7
SA18-10815	68.0	31	-0.2	1.7	35	14.8	1.4	34.6	19.3
SA18-12086	76.4	8	0.1	1.5	35	14.2	1.7	32.6	20.3
SA18-9643	72.8	18	-2.4	1.2	36	16.1	1.1	33.7	20.1
SA19-10687	77.7	5	-3.4	1.7	33	17.5	1.7	33.0	20.6
SA19-10772	78.8	3	-1.6	1.3	35	14.9	1.5	32.8	20.4
SA19-12580	73.8	13	-2.0	1.7	36	17.4	1.5	32.7	20.2
SA19-5082	75.8	9	-2.8	1.7	35	14.4	1.3	33.1	20.7
SA19-7733	68.9	28	-0.6	1.5	37	15.1	1.3	33.5	19.8
SA19-7754	72.6	19	-1.3	1.2	32	15.2	1.4	32.1	20.1
SA20-2212	73.4	16	-1.9	1.5	32	16.6	1.4	34.0	19.6
SA20-2256	71.8	22	-2.8	1.3	32	16.6	1.4	33.5	20.2
SA21-3590	74.5	11	-1.1	1.2	34	16.8	1.4	34.3	19.8
Mean	73.1			1.6	35.6	15.6	1.4	33.5	20.1
C.V. (%)	6.5								
L.S.D. (5%)	2.5								

124.1 Days After Planting

**UNIFORM TEST IV, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	15 bu/a	15 No.	16 Date	16 Score	Height 15 In.	Size 18 g/100	Quality 18 Score	Protein 18 %	Oil 18 %
LD15-3818 (IV)	76.7	3	9/29	1.3	35	15.7	1.7	34.5	19.9
LD00-2817 (L)	66.5	13	0.6	1.8	39	13.5	1.8	32.6	20.3
LD07-3395bf (SCN) (E)	74.5	4	-2.4	1.5	31	16.2	1.6	32.4	20.6
K18-1994	72.7	7	3.2	1.5	31	14.6	1.8	32.8	20.0
CR183106	69.5	11	-2.6	1.3	36	14.0	1.4	34.9	19.7
CR183264	70.8	8	-2.5	1.4	36	13.4	1.3	34.7	19.4
CR184183	70.4	9	-0.2	1.6	38	16.0	1.4	34.7	19.1
CR190628	63.6	14	-2.6	2.3	40	13.9	1.5	32.9	20.4
LD19-4657	69.6	10	0.7	2.0	36	14.1	1.6	34.5	18.9
LD20-11622	78.4	1	-2.2	1.5	35	18.1	1.6	34.0	19.8
SA18-10815	68.5	12	-0.2	1.6	36	14.7	1.5	34.8	19.1
SA18-12086	74.5	5	0.6	1.5	35	14.0	1.7	32.7	20.3
SA19-10772	77.0	2	-0.9	1.3	35	14.4	1.6	32.8	20.2
SA19-12580	73.7	6	-1.9	1.5	35	17.1	1.6	32.9	20.2

125.7 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	28	28	29	28	27	28	28	27	27
LD15-3818 (IV)	71.5	1	9/30	1.3	34	15.6	1.7	34.5	19.9
LD00-2817 (L)	64.8	7	1.3	1.7	38	13.7	1.9	32.8	20.2
LD07-3395bf (SCN) (E)	70.4	2	-2.3	1.5	30	16.1	1.7	32.3	20.6
K18-1994	70.3	3	3.9	1.4	30	14.8	1.8	32.9	20.0
CR183106	66.0	6	-2.1	1.2	35	14.0	1.6	35.0	19.5
CR183264	66.9	5	-2.2	1.3	35	13.5	1.4	34.6	19.4
CR184183	67.4	4	0.6	1.6	36	16.2	1.5	34.7	19.0

126.2 Days After Planting

**UNIFORM TEST IV, 2024**

**YIELD (bu/a)**

Strain	Mean 9 Tests	Belle- ville IL*	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	78.9	47.7	82.3	74.0	76.6	94.1	75.0	80.2	58.8	81.5	88.1
LD00-2817 (L)	68.0	52.9	73.1	62.8	76.0	83.7	66.4	63.7	46.4	70.2	72.4
LD07-3395bf(SCN) (E)	76.7	42.4	78.3	69.6	88.0	100.5	76.3	66.3	56.1	79.3	78.5
K18-1994	73.5	48.4	78.0	65.9	86.4	91.1	70.9	67.8	49.6	73.6	80.3
CR183106	71.9	41.3	83.1	60.0	87.0	89.2	66.8	72.4	42.8	71.8	75.7
CR183264	71.9	45.0	84.7	63.3	82.9	95.2	68.4	61.2	47.0	65.6	80.9
CR184183	71.3	29.7	79.0	68.0	79.2	84.1	65.5	69.9	44.6	76.5	77.1
CR190628	62.0	29.0	71.7	59.9	55.7	78.3	62.4	56.9	42.3	67.8	65.6
CR20-4991	68.2	49.5	75.6	66.7	75.6	93.9	63.7	64.2	46.5	66.7	63.4
CR20-5030	73.7	41.0	77.0	70.5	85.0	93.5	69.0	67.6	49.7	73.6	79.1
CR20-5469	69.5	48.0	77.3	67.4	74.0	88.0	67.0	60.1	48.7	70.3	75.4
CR20-5470	69.5	30.4	82.7	65.9	79.8	89.2	65.2	63.3	42.2	66.0	73.3
LD19-10076	74.5	28.7	77.1	70.4	81.3	87.3	71.9	71.6	51.0	80.1	81.4
LD19-10244	69.6	41.0	79.9	71.2	74.4	84.8	63.9	66.8	41.3	67.4	79.2
LD19-4657	70.3	50.6	80.9	63.1	73.9	87.9	66.7	63.0	53.8	67.2	78.3
LD20-11622	78.4	50.3	83.6	69.5	85.8	96.3	72.8	64.6	62.9	86.5	86.0
LD20-11748	81.1	47.8	88.5	72.7	90.4	100.8	76.7	72.3	55.2	84.5	91.3
LD20-1723	75.1	38.9	76.2	68.8	85.5	93.8	73.3	67.1	48.7	81.6	83.1
LD20-3559	77.2	54.1	80.9	76.6	93.7	94.9	70.8	71.4	48.9	79.9	80.2
LD20-6649	72.9	43.3	81.2	68.5	76.0	93.8	68.1	62.6	47.9	77.8	82.6
SA18-10815	68.0	34.1	69.2	56.2	79.2	85.4	68.6	69.2	49.8	74.5	62.5
SA18-12086	76.4	44.3	81.8	70.0	83.2	95.3	73.8	73.9	53.9	76.9	81.2
SA18-9643	72.8	35.4	69.6	68.4	81.8	83.2	69.7	75.0	55.3	80.0	74.6
SA19-10687	77.7	37.2	86.8	67.2	80.2	90.6	71.8	78.6	55.1	81.4	89.7
SA19-10772	78.8	41.1	79.1	69.5	91.6	106.1	71.9	77.8	55.4	79.5	79.5
SA19-12580	73.8	29.1	79.6	68.7	82.4	97.1	71.3	69.7	48.6	71.8	77.1
SA19-5082	75.8	48.4	79.2	67.6	79.7	98.0	72.1	72.3	53.9	79.7	81.6
SA19-7733	68.9	34.9	66.9	62.5	74.0	94.2	65.7	69.6	46.4	75.4	67.6
SA19-7754	72.6	40.0	73.4	67.6	86.8	93.4	75.4	66.3	43.8	80.0	67.9
SA20-2212	73.4	43.9	80.3	67.9	79.1	89.3	73.0	65.9	54.5	82.1	69.9
SA20-2256	71.8	46.0	78.2	61.9	85.7	85.8	73.0	61.1	49.9	84.5	68.7
SA21-3590	74.5	48.9	80.9	73.0	87.3	97.8	68.9	63.4	50.0	82.2	69.4
Location Mean		42.0	78.6	67.4	81.2	91.7	69.9	68.0	50.0	76.1	76.9
C.V. (%)		16.3	5.1	9.8	5.9	5.5	4.3	7.0	7.3	6.4	6.2
L.S.D. (5%)		14.1	8.2	13.4	9.7	10.3	4.9	7.8	5.9	7.9	7.8
Row Sp. (In.)		30	30	30	30	30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4	4	4	4	4
Reps		2	2	2	2	2	3	3	3	3	3

\* Data not included in mean.

**UNIFORM TEST IV, 2024**

**YIELD RANK**

Strain	Yield Rank	Belle-	Savoy	Urbana	Butler-	West	Manhattan		Ottawa	Novelty	Rock
		ville IL	IL	IL	ville IN	Lafayette IN	Loc A KS	Loc B KS	KS	MO	Port MO
LD15-3818 (IV)	2	11	7	2	24	12	4	1	2	7	3
LD00-2817 (L)	30	2	28	27	26	30	26	24	25	26	24
LD07-3395bf(SCN) (E)	7	17	19	9	4	3	2	19	3	15	16
K18-1994	15	8	21	24	8	18	15	15	17	22	11
CR183106	21	18	5	30	6	22	24	6	29	23	20
CR183264	20	13	3	25	14	9	21	29	23	32	10
CR184183	23	29	18	16	22	29	28	11	27	18	18
CR190628	32	31	29	31	32	32	32	32	30	27	30
CR20-4991	29	5	26	22	27	13	31	23	24	30	31
CR20-5030	14	21	24	6	12	16	18	16	16	21	15
CR20-5469	26	9	22	20	29	23	23	31	19	25	21
CR20-5470	27	28	6	23	19	21	29	26	31	31	23
LD19-10076	12	32	23	7	17	25	12	9	12	9	8
LD19-10244	25	20	14	5	28	28	30	18	32	28	14
LD19-4657	24	3	11	26	31	24	25	27	11	29	17
LD20-11622	4	4	4	10	9	7	9	22	1	1	4
LD20-11748	1	10	1	4	3	2	1	8	6	3	1
LD20-1723	10	23	25	12	11	14	6	17	20	6	5
LD20-3559	6	1	10	1	1	10	16	10	18	12	12
LD20-6649	17	16	9	14	25	15	22	28	22	16	6
SA18-10815	31	27	31	32	21	27	20	14	15	20	32
SA18-12086	8	14	8	8	13	8	5	5	10	17	9
SA18-9643	18	25	30	15	16	31	17	4	5	11	22
SA19-10687	5	24	2	21	18	19	13	2	7	8	2
SA19-10772	3	19	17	11	2	1	11	3	4	14	13
SA19-12580	13	30	15	13	15	6	14	12	21	24	18
SA19-5082	9	7	16	19	20	4	10	7	9	13	7
SA19-7733	28	26	32	28	29	11	27	13	26	19	29
SA19-7754	19	22	27	18	7	17	3	20	28	10	28
SA20-2212	16	15	13	17	23	20	8	21	8	5	25
SA20-2256	22	12	20	29	10	26	7	30	14	2	27
SA21-3590	11	6	12	3	5	5	19	25	13	4	26

**UNIFORM TEST IV, 2024**

**MATURITY (date)**

Strain	Mean 9 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	9/30		10/7	10/5	9/23	9/29	9/30	10/6	9/25	9/26	10/7
LD00-2817 (L)	1		-1	0	3	0	0	-2	0	4	3
LD07-3395bf (SCN) (E)	-3		-4	-5	-2	-9	0	-4	-3	-4	0
K18-1994	3		4	2	3	6	5	-3	2	4	6
CR183106	-2		-2	-5	-3	-5	-1	-4	-4	0	2
CR183264	-3		-4	-6	-2	-3	-1	-3	-5	-1	1
CR184183	-1		-1	-2	-1	-1	-1	-2	-4	2	2
CR190628	-3		-3	-4	-5	-4	-1	-5	-3	-5	1
CR20-4991	-2		-3	-3	-4	-2	-1	-5	-1	0	1
CR20-5030	-3		-4	-5	-6	-5	-1	-4	-4	-3	1
CR20-5469	-0		-2	-2	3	-2	0	-4	-2	2	2
CR20-5470	-2		-3	-5	-2	-4	0	-2	-4	-4	1
LD19-10076	-1		-1	-3	-2	-3	1	-2	-3	3	3
LD19-10244	4		4	4	5	4	7	4	2	2	3
LD19-4657	-0		-1	-2	1	1	1	-2	-1	2	1
LD20-11622	-3		-4	-7	-3	-5	0	-1	-0	-1	-2
LD20-11748	-2		-3	-4	-2	-6	-0	-3	-2	-3	2
LD20-1723	-4		-5	-6	-4	-9	-1	-2	-3	-3	0
LD20-3559	-1		-1	0	-1	-3	0	-3	-1	-1	1
LD20-6649	-1		-2	0	-2	-4	-1	3	-2	-3	2
SA18-10815	-0		0	-1	1	-1	1	-1	-1	0	1
SA18-12086	0		-1	-3	3	0	1	-1	0	2	1
SA18-9643	-2		-4	-5	-1	-5	-0	-1	-3	-3	0
SA19-10687	-3		-4	-6	-4	-7	-1	-2	-1	-4	-1
SA19-10772	-2		-1	-4	-1	-4	-0	-2	-2	-1	1
SA19-12580	-2		-3	-2	-1	-5	-1	-2	-2	-3	1
SA19-5082	-3		-4	-4	-3	-4	0	-2	-3	-4	-2
SA19-7733	-1		-1	-4	-1	-2	2	-2	-1	0	3
SA19-7754	-1		-3	-3	0	-4	0	-2	-0	-1	1
SA20-2212	-2		-3	-3	-1	-5	0	-4	-2	-2	2
SA20-2256	-3		-4	-5	-4	-7	-1	-2	-1	-3	0
SA21-3590	-1		-2	-2	-1	-3	-1	-4	-0	2	1
Date Planted	5/29		5/23	5/22	5/30	5/8	6/10	6/12	5/28	5/30	6/12
Days to Mature	124		137	136	116	144	112	116	120	119	117

**UNIFORM TEST IV, 2024**

**LODGING (score)**

Strain	Mean 9 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	1.4	1.0	1.0	1.0	2.5	1.0	2.0		1.0	1.5	1.5
LD00-2817 (L)	2.0	2.5	1.5	1.0	3.0	2.5	3.0		1.0	2.0	1.5
LD07-3395bf(SCN) (E)	1.5	1.3	1.5	1.0	2.0	2.0	1.3		1.0	2.0	1.5
K18-1994	1.4	1.5	1.5	1.0	1.5	1.5	1.0		1.0	2.0	1.5
CR183106	1.3	1.5	1.0	1.0	2.5	1.0	1.3		1.0	1.0	1.5
CR183264	1.4	1.0	1.0	1.0	2.0	2.0	2.0		1.0	1.5	1.5
CR184183	1.7	1.5	1.3	1.0	2.5	2.0	2.3		1.0	2.5	1.5
CR190628	2.7	1.3	2.8	1.5	4.0	3.0	4.0		1.7	4.5	1.5
CR20-4991	1.6	1.0	1.0	1.0	2.0	2.0	2.7		1.0	2.0	1.5
CR20-5030	1.4	1.0	1.0	1.0	2.0	1.5	2.3		1.0	1.0	1.5
CR20-5469	2.1	2.0	1.5	1.0	3.5	2.0	3.0		1.0	3.5	1.5
CR20-5470	2.3	1.5	2.5	1.0	3.5	2.0	3.0		1.3	4.0	1.5
LD19-10076	1.6	1.0	1.0	1.0	3.0	1.5	3.0		1.0	1.5	1.5
LD19-10244	2.7	1.5	2.0	1.0	4.0	2.5	3.7		1.3	5.0	3.0
LD19-4657	2.3	2.0	1.8	1.5	3.5	2.5	3.7		1.0	3.0	1.5
LD20-11622	1.5	1.3	1.0	1.0	2.0	2.0	2.0		1.0	1.5	1.5
LD20-11748	1.2	1.0	1.0	1.0	1.5	1.0	1.7		1.0	1.5	1.5
LD20-1723	1.3	1.0	1.0	1.0	2.0	1.0	1.0		1.0	2.0	1.5
LD20-3559	1.3	1.5	1.0	1.0	2.5	1.0	1.0		1.0	1.5	1.5
LD20-6649	2.0	1.5	1.3	1.0	4.0	2.0	2.3		1.0	3.5	1.5
SA18-10815	1.7	1.5	1.5	1.0	3.0	1.5	1.7		1.0	2.5	1.5
SA18-12086	1.5	1.3	1.3	1.0	3.0	1.5	1.3		1.0	1.5	1.5
SA18-9643	1.2	1.0	1.0	1.0	2.0	1.0	1.0		1.0	1.5	1.5
SA19-10687	1.7	1.3	1.0	1.0	2.5	2.0	2.0		1.0	3.0	1.5
SA19-10772	1.3	1.5	1.0	1.0	2.5	1.0	1.0		1.0	1.5	1.5
SA19-12580	1.7	1.3	1.5	1.0	3.0	2.0	1.7		1.0	2.0	1.5
SA19-5082	1.7	1.5	1.0	1.0	3.5	2.0	2.0		1.0	2.0	1.5
SA19-7733	1.5	1.0	1.3	1.0	2.0	2.0	2.0		1.0	1.5	1.5
SA19-7754	1.2	1.3	1.0	1.0	1.5	1.5	1.0		1.0	1.0	1.5
SA20-2212	1.5	1.3	1.5	1.0	2.5	1.5	2.0		1.0	1.5	1.5
SA20-2256	1.3	1.0	1.0	1.0	2.0	1.0	1.3		1.0	1.5	1.5
SA21-3590	1.2	1.3	1.0	1.0	2.0	1.0	1.0		1.0	1.0	1.5

**UNIFORM TEST IV, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 8 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	35		38	32	38	41	40		32	34	30
LD00-2817 (L)	40		41	40	47	46	39		33	39	37
LD07-3395bf(SCN) (E)	32		33	31	35	42	33		25	30	28
K18-1994	31		32	30	33	37	34		27	31	28
CR183106	36		39	33	41	43	38		31	35	31
CR183264	36		39	32	42	42	40		29	35	26
CR184183	37		40	33	42	42	40		30	38	34
CR190628	40		43	39	42	46	40		32	38	38
CR20-4991	35		35	30	38	45	40		30	34	28
CR20-5030	33		35	36	36	40	36		26	30	26
CR20-5469	42		42	39	47	48	43		35	41	38
CR20-5470	39		42	35	42	47	43		32	37	34
LD19-10076	35		38	32	40	40	39		29	35	28
LD19-10244	43		43	43	48	49	41		37	41	43
LD19-4657	36		38	29	40	46	38		31	37	32
LD20-11622	35		37	32	37	43	37		29	37	31
LD20-11748	35		39	32	39	42	38		30	33	31
LD20-1723	33		33	31	35	39	36		28	30	31
LD20-3559	36		37	34	40	42	38		30	37	34
LD20-6649	35		37	32	38	42	38		28	37	31
SA18-10815	35		34	32	39	46	39		30	35	28
SA18-12086	35		36	32	39	42	37		29	34	32
SA18-9643	36		37	32	41	42	38		31	37	29
SA19-10687	33		35	30	37	37	34		27	35	31
SA19-10772	35		35	32	39	43	38		30	37	29
SA19-12580	36		37	35	40	43	39		30	34	30
SA19-5082	35		35	33	38	42	36		29	34	34
SA19-7733	37		36	34	40	46	41		31	37	34
SA19-7754	32		32	29	38	40	36		26	34	21
SA20-2212	32		35	28	38	37	36		28	34	24
SA20-2256	32		33	29	36	40	36		26	32	26
SA21-3590	34		34	31	38	39	36		27	35	30

**UNIFORM TEST IV, 2024**

**SEED SIZE (g/100)**

Strain	Mean 9 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	16.3		16.3	17.1	16.1	15.3	15.7	17.5	15.6	15.6	17.1
LD00-2817 (L)	14.0		14.1	14.3	14.4	14.6	12.7	15.4	13.1	13.0	14.6
LD07-3395bf(SCN) (E)	16.6		16.1	16.5	17.0	16.7	16.3	15.6	16.9	15.7	18.3
K18-1994	15.0		15.9	15.4	15.8	15.3	14.8	14.8	13.5	12.9	16.7
CR183106	14.3		14.8	14.2	15.2	14.2	12.4	14.2	14.1	13.9	15.5
CR183264	13.9		14.7	13.0	13.7	14.3	13.0	14.2	13.8	12.9	15.4
CR184183	16.6		17.8	16.3	16.4	16.7	14.9	18.2	14.6	16.0	18.9
CR190628	14.3		14.6	14.4	14.6	14.3	13.0	15.4	13.5	13.9	14.7
CR20-4991	15.2		15.8	15.2	14.6	15.5	14.9	16.0	14.0	14.8	15.6
CR20-5030	15.0		15.1	15.4	14.5	15.1	14.1	15.4	15.8	14.4	14.8
CR20-5469	14.5		14.5	14.6	15.5	14.4	12.7	15.5	14.1	14.1	14.7
CR20-5470	16.0		16.2	15.6	16.8	16.1	16.5	15.8	15.3	15.1	16.7
LD19-10076	15.4		15.8	15.2	15.5	15.7	15.5	15.8	14.3	14.1	16.8
LD19-10244	14.8		15.7	15.8	15.1	14.7	14.7	16.1	12.8	12.8	15.8
LD19-4657	14.5		14.4	13.8	15.1	14.2	14.6	15.2	14.6	13.3	15.0
LD20-11622	18.3		18.1	18.1	17.7	18.7	16.9	19.4	18.0	17.5	20.0
LD20-11748	15.2		15.2	15.2	14.8	14.8	15.0	16.6	15.4	13.4	16.3
LD20-1723	16.0		16.2	16.7	16.4	16.3	14.8	14.9	16.1	14.6	18.2
LD20-3559	15.2		15.2	16.2	16.3	15.6	12.5	15.1	14.8	14.0	16.8
LD20-6649	17.5		17.9	18.8	17.4	18.1	14.9	16.8	19.9	15.8	18.3
SA18-10815	14.8		14.8	14.1	15.5	15.1	14.4	15.8	14.2	14.2	15.3
SA18-12086	14.2		14.0	14.1	14.9	14.0	13.5	14.9	14.3	12.7	15.1
SA18-9643	16.1		15.3	16.2	15.9	15.8	15.3	16.9	17.0	14.5	17.7
SA19-10687	17.5		17.7	17.0	17.6	18.0	16.3	17.0	17.9	16.5	19.8
SA19-10772	14.9		15.0	14.9	14.8	14.3	15.1	15.2	15.4	12.9	16.3
SA19-12580	17.4		17.0	17.7	18.0	18.0	16.8	17.8	16.5	16.1	19.0
SA19-5082	14.4		13.5	13.8	14.5	15.0	14.0	15.7	13.8	13.4	15.8
SA19-7733	15.1		15.3	15.1	16.0	15.2	14.2	14.5	15.2	13.6	16.5
SA19-7754	15.2		15.0	15.6	15.0	15.6	14.7	14.6	15.9	14.1	16.2
SA20-2212	16.6		16.8	17.3	16.7	17.3	15.8	16.4	16.4	15.4	17.7
SA20-2256	16.6		16.9	16.9	16.3	17.0	15.1	16.8	17.5	15.5	17.2
SA21-3590	16.8		18.4	13.6	17.7	18.1	14.4	16.2	18.2	16.5	18.5

**UNIFORM TEST IV, 2024**

**SEED QUALITY (score)**

Strain	Mean 9 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	1.6		1.5	2.0	1.0	2.0	2.0	1.0	3.0	1.0	1.0
LD00-2817 (L)	1.8		1.5	2.0	1.0	2.0	2.0	2.0	3.0	1.0	1.5
LD07-3395bf(SCN) (E)	1.5		1.8	2.0	1.0	1.0	1.0	2.0	2.0	1.0	1.5
K18-1994	1.7		1.0	2.0	1.5	2.0	2.0	2.0	3.0	1.0	1.0
CR183106	1.4		1.0	1.0	1.0	1.5	2.0	2.0	2.0	1.0	1.0
CR183264	1.2		1.0	1.0	1.0	1.0	2.0	1.0	2.0	1.0	1.0
CR184183	1.1		1.3	1.0	1.0	1.0	1.0	1.0	2.0	1.0	1.0
CR190628	1.3		1.0	1.0	1.0	1.0	2.0	2.0	2.0	1.0	1.0
CR20-4991	1.4		1.0	2.0	1.0	1.5	3.0	1.0	1.0	1.0	1.5
CR20-5030	1.6		1.5	2.0	1.0	1.5	2.0	2.0	2.0	1.0	1.0
CR20-5469	1.3		1.5	1.0	1.0	1.0	2.0	2.0	1.0	1.0	1.5
CR20-5470	1.3		1.0	1.0	1.0	1.0	2.0	2.0	2.0	1.0	1.0
LD19-10076	1.5		1.0	1.0	1.0	1.5	2.0	2.0	3.0	1.0	1.0
LD19-10244	1.6		1.5	2.0	1.5	1.5	3.0	1.0	2.0	1.0	1.0
LD19-4657	1.6		1.0	2.0	1.0	1.0	2.0	2.0	3.0	1.0	1.0
LD20-11622	1.6		1.3	1.0	1.0	2.0	2.0	2.0	3.0	1.0	1.0
LD20-11748	1.3		1.3	2.0	1.0	1.0	1.0	1.0	2.0	1.0	1.0
LD20-1723	1.4		1.0	2.0	1.0	1.0	2.0	2.0	2.0	1.0	1.0
LD20-3559	1.0		1.3	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
LD20-6649	1.4		1.8	1.0	1.0	1.0	2.0	2.0	2.0	1.0	1.0
SA18-10815	1.4		1.5	1.0	1.0	1.0	2.0	2.0	2.0	1.0	1.0
SA18-12086	1.7		1.8	2.0	1.5	1.0	2.0	2.0	3.0	1.0	1.0
SA18-9643	1.1		1.3	1.0	1.0	1.0	1.0	2.0	1.0	1.0	1.0
SA19-10687	1.7		1.3	2.0	1.0	1.0	2.0	2.0	4.0	1.0	1.0
SA19-10772	1.5		1.8	2.0	1.0	1.0	2.0	2.0	2.0	1.0	1.0
SA19-12580	1.5		1.3	2.0	1.0	1.0	2.0	2.0	2.0	1.0	1.5
SA19-5082	1.3		1.3	1.0	1.0	1.0	2.0	1.0	2.0	1.0	1.0
SA19-7733	1.3		1.8	2.0	1.0	1.0	1.0	2.0	1.0	1.0	1.0
SA19-7754	1.4		1.3	1.0	1.0	1.0	1.0	2.0	2.0	1.0	2.0
SA20-2212	1.4		1.3	1.0	1.0	1.0	2.0	1.0	3.0	1.0	1.0
SA20-2256	1.4		1.3	2.0	1.0	1.0	2.0	1.0	2.0	1.0	1.0
SA21-3590	1.4		1.5	2.0	1.0	1.0	2.0	2.0	1.0	1.0	1.0

**UNIFORM TEST IV, 2024**

**PROTEIN (%)**

Strain	Mean 10 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	34.8	33.6	36.0	35.2	36.4	35.3	34.6	35.1	32.9	35.3	33.7
LD00-2817 (L)	32.5	31.9	30.7	31.9	34.4	33.4	33.3	34.1	32.1	33.1	30.3
LD07-3395bf(SCN) (E)	32.2	31.2	32.2	30.3	33.5	32.3	32.3	34.3	32.1	32.8	30.4
K18-1994	32.6	31.2	32.2	32.7	34.1	34.0	32.5	33.9	31.0	33.2	30.9
CR183106	34.9	34.5	35.1	34.3	36.5	35.7	35.6	35.7	34.1	35.2	32.8
CR183264	34.5	34.0	34.3	33.1	35.1	35.1	35.0	36.2	33.4	35.7	32.8
CR184183	34.5	33.9	34.4	33.8	37.0	33.8	34.9	35.5	34.2	35.3	32.4
CR190628	33.1	32.4	33.2	32.7	34.7	32.8	33.5	33.8	32.2	34.6	31.1
CR20-4991	33.9	32.7	34.4	33.8	35.9	34.7	34.8	34.2	32.7	33.8	31.9
CR20-5030	34.0	33.0	33.4	35.5	35.3	33.9	34.5	35.4	32.6	34.7	31.3
CR20-5469	33.5	32.9	32.4	34.1	35.5	34.0	33.9	34.7	32.3	33.9	31.8
CR20-5470	33.3	32.6	33.7	31.9	35.4	33.6	33.4	34.2	32.5	34.7	30.9
LD19-10076	33.7	33.2	33.3	32.7	36.0	33.9	34.0	34.6	33.4	34.0	32.0
LD19-10244	33.8	32.6	35.1	32.7	36.3	33.2	34.3	33.8	33.1	34.9	31.9
LD19-4657	34.3	33.4	33.5	33.4	35.8	35.5	34.7	35.4	32.9	35.8	33.1
LD20-11622	34.0	33.3	34.3	32.4	35.4	34.6	34.3	35.4	33.0	34.3	32.5
LD20-11748	33.4	33.1	33.6	32.5	36.1	33.5	32.7	33.5	32.8	34.0	32.0
LD20-1723	33.6	32.8	32.1	33.8	34.2	32.5	35.8	35.5	33.4	34.0	32.2
LD20-3559	33.6	32.7	33.8	34.2	36.0	33.7	31.9	33.8	33.1	34.0	32.8
LD20-6649	32.6	32.0	30.8	31.9	34.0	31.7	32.7	33.9	33.2	34.2	31.5
SA18-10815	34.6	33.4	33.5	35.0	36.0	36.0	35.2	36.0	33.1	34.6	33.4
SA18-12086	32.6	31.5	32.3	30.4	34.8	33.5	33.4	34.5	31.9	32.5	30.9
SA18-9643	33.7	32.6	34.2	34.4	34.7	34.3	34.1	34.3	33.6	33.8	31.2
SA19-10687	33.0	31.4	33.4	32.7	34.9	33.4	33.1	33.5	32.9	33.2	31.2
SA19-10772	32.8	32.1	32.7	32.4	34.3	33.7	32.0	33.7	32.4	33.9	30.6
SA19-12580	32.7	31.9	32.3	32.3	35.1	33.5	32.6	33.5	31.5	33.7	30.6
SA19-5082	33.1	31.9	31.6	31.9	34.4	34.6	33.9	34.2	32.7	33.9	31.9
SA19-7733	33.5	32.5	33.2	33.0	35.2	33.7	33.5	34.7	33.0	33.2	33.6
SA19-7754	32.1	30.7	30.8	32.6	33.2	33.6	32.4	33.4	31.7	31.8	31.4
SA20-2212	34.0	33.0	33.7	33.9	36.2	34.2	33.5	34.7	34.9	34.2	32.1
SA20-2256	33.5	32.6	33.7	33.4	35.6	33.4	33.4	33.9	32.6	33.3	32.7
SA21-3590	34.3	32.9	34.1	35.0	34.9	34.1	35.0	35.6	33.7	34.3	33.4

**UNIFORM TEST IV, 2024**

**OIL (%)**

Strain	Mean 10 Tests	Belle- ville IL	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO	Rock Port MO
							Loc A KS	Loc B KS			
LD15-3818 (IV)	19.8	21.7	18.6	19.4	19.3	18.7	20.5	19.3	20.8	20.0	19.7
LD00-2817 (L)	20.5	21.9	21.2	20.9	20.4	19.8	19.5	19.0	20.9	20.7	21.2
LD07-3395bf(SCN) (E)	20.8	22.1	20.6	21.3	20.8	20.2	20.5	19.4	21.0	21.1	21.1
K18-1994	20.2	21.2	19.8	19.9	20.4	20.1	20.1	19.5	21.3	20.0	20.3
CR183106	19.9	21.1	19.3	20.0	20.0	19.0	19.4	19.4	20.4	20.1	20.2
CR183264	19.7	21.0	19.6	20.3	20.1	19.0	18.8	18.5	20.5	19.6	19.6
CR184183	19.5	20.9	18.7	21.5	19.2	19.2	19.0	18.5	19.8	19.4	19.3
CR190628	20.4	22.0	19.9	20.4	20.2	19.6	20.2	19.9	21.2	19.8	20.5
CR20-4991	19.7	21.5	19.0	19.5	19.2	18.5	19.5	19.2	21.0	20.1	19.8
CR20-5030	19.9	20.4	20.0	20.2	19.9	19.3	19.6	18.2	20.8	19.9	20.5
CR20-5469	20.4	21.7	20.2	20.2	20.5	19.8	19.9	19.3	21.2	20.4	20.4
CR20-5470	20.1	21.8	19.3	20.5	19.7	19.3	19.8	19.4	20.9	20.1	20.3
LD19-10076	20.3	21.9	20.1	20.8	20.2	19.4	19.8	19.3	20.8	20.7	20.2
LD19-10244	19.9	21.5	18.7	20.0	19.8	19.9	19.6	19.3	20.4	19.8	20.0
LD19-4657	19.2	20.3	19.1	19.4	19.2	18.0	18.5	18.7	20.3	18.9	19.6
LD20-11622	19.9	21.6	19.3	20.3	19.4	18.7	19.9	19.1	20.3	19.7	20.5
LD20-11748	20.5	22.0	20.0	20.6	20.0	19.9	20.4	20.0	20.9	20.4	20.5
LD20-1723	20.2	21.6	20.5	20.3	20.0	19.7	19.9	19.1	20.7	20.3	20.0
LD20-3559	19.8	21.4	19.5	19.7	19.3	19.2	19.3	19.7	20.8	19.9	19.6
LD20-6649	20.7	22.4	21.0	21.0	20.8	20.3	20.1	19.5	20.5	20.6	20.7
SA18-10815	19.3	21.0	19.3	19.8	18.8	18.6	18.8	18.1	20.0	19.6	19.5
SA18-12086	20.3	22.2	20.0	20.9	19.8	19.3	19.8	18.8	21.3	20.4	20.2
SA18-9643	20.1	22.2	19.6	19.9	19.4	19.9	20.0	19.3	20.5	20.4	20.1
SA19-10687	20.6	22.2	20.2	21.0	20.0	20.0	20.1	19.9	20.5	20.9	21.0
SA19-10772	20.4	22.6	19.8	20.4	20.0	19.1	20.5	19.6	21.2	20.2	20.6
SA19-12580	20.2	21.8	19.9	20.3	19.8	19.6	19.8	19.3	21.0	20.1	20.9
SA19-5082	20.7	22.5	20.8	21.0	20.9	19.1	20.4	19.7	21.5	20.5	20.5
SA19-7733	19.8	21.7	19.7	20.1	19.5	19.5	19.2	18.3	20.5	20.1	19.3
SA19-7754	20.1	22.7	20.4	19.8	20.0	19.0	19.8	18.7	20.5	20.2	20.1
SA20-2212	19.6	21.5	19.7	19.6	19.1	19.3	19.3	19.0	19.4	19.7	20.1
SA20-2256	20.2	22.2	19.9	20.2	19.6	19.9	19.6	19.1	20.3	20.3	20.6
SA21-3590	19.8	21.8	19.4	19.8	19.7	19.2	19.1	18.8	20.5	19.7	19.7

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**Northern Regional Uniform Test  
Preliminary Test IV, 2024**

Ent.	Strain	Parentage		Seed Source	Gen. Comp.	Unique Traits
		Female	Male			
1	LD15-3818 (IV)	LD09-3913	BN09002129	Monteverde	F5	SCN, Rps1a
2	LD00-2817 (L)	Ina	Dwight	Monteverde	F5	SCN
3	LD07-3395bf (SCN) (E)	LD07-3395 Reselection		Monteverde	F5	SCN
4	K18-1994	LD07-3395bf	K11-2363T	Schapaugh	F4	SCN
5	CR21-01210			Rainey		
6	CR21-01290			Rainey		
7	CR21-01610			Rainey		
8	CR21-02084			Rainey		
9	CR21-02090			Rainey		
10	CR21-02724			Rainey		
11	K21-1577	KS4117Ns / PI 661090	PI 661090	Schapaugh	F5	
12	K21-2376	KS4117Ns / K15-1283	K15-1283	Schapaugh	F5	
13	K21-2406	KS4117Ns / K15-1283	K15-1283	Schapaugh	F5	
14	K21-2447	KS4117Ns / K15-1283	K15-1283	Schapaugh	F5	
15	K21-2474	KS4117Ns / K15-1310	K15-1310	Schapaugh	F5	
16	K21-4874	K15-1283 / 46X714	46X714	Schapaugh	F5	
17	K21-4910	K15-1310 / 46X714	46X714	Schapaugh	F5	
18	K21-4931	K15-1310 / 46X714	46X714	Schapaugh	F5	
19	LD21-2459	U14-211226	SA13-1310	Monteverde	F5	SCN
20	LD21-7183	LD15-456	LD15-8459	Monteverde	F5	SCN
21	LD21-7325	LD15-5776793	LD14-3702	Monteverde	F5	SCN
22	LG21-2486	LD07-3395bf	LG11-6760	Mahan	F6	25% exotic pedigree
23	LG21-2490	LD07-3395bf	LG11-6760	Mahan	F6	25% exotic pedigree
24	LG21-2835	LG11-3463	U11-614119	Mahan	F6	
25	LG21-2844	LG11-3463	U11-614119	Mahan	F6	
26	LG21-2925	LG13-1006	LG11-6760	Mahan	F6	63% exotic pedigree
27	LW18-14009	LG09-8165	LD04-12754 x (LG00-3372 x PI385942)	Mahan	F6	75% exotic pedigree
28	LW18-5091	LD05-8517	LG11-3341	Mahan	F6	
29	SA21-2455	SA13-1385	U15-606207	Scaboo	F5	rhg1-a, rhg2, Rhg4, Rps6, Rdc3
30	SA21-2684	SA13-1385	LD15-5776793	Scaboo	F5	rhg1-b, Rps1c, BSR, Rdc3
31	SA21-2923	SA17-19269	SA13-1310	Scaboo	F5	rhg1-b, Rdc3
32	SA21-3047	SA17-19269	SA13-1310	Scaboo	F5	
33	SA21-3530	SA13-2699	LD15-5776793	Scaboo	F5	rhg1-b, Rps1c, BSR, Rdc3
34	SA21-4104	SA14-9653	LD15-5776793	Scaboo	F5	rhg1-b, Rps1c, BSR, Rdc3
35	SA21-4168	SA14-9653	LD15-5776793	Scaboo	F5	rhg1-b, Rps1c, BSR, Rdc3
36	SA21-4461	SA14-9653	U15-606207	Scaboo	F5	rhg1-a, rhg2, Rps1c, Rps6, BSR, Rdc3
37	SA21-9324	SA13-1310	LG16-4634	Scaboo	F5	rhg1-b, Rps1a, BSR, Rdc3
38	SA22-5305	SA13-1385	SA18-13443	Scaboo	F5	

**PRELIMINARY TEST IV, 2024**  
**DESCRIPTIVE AND DISEASE DATA**

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Strain	Descriptive Code
LD15-3818 (IV)	PLtTDYBI
LD00-2817 (L)	PGTDYIbI
LD07-3395bf (SCN) (E)	WGTDYBfI
K18-1994	WGTDYBfI
CR21-01210	WGBDYBfI
CR21-01290	P+WLtBDYGI
CR21-01610	WGBDYBfI
CR21-02084	P+WGTDYHI
CR21-02090	PGBSYHI
CR21-02724	P+WLtBDYBI
K21-1577	PTB+TDYBI
K21-2376	PLtBDYBI
K21-2406	PLtBDYBI
K21-2447	PLtBDYBI
K21-2474	PLtBDYBI
K21-4874	PLtBDYBI
K21-4910	PTBDYBI
K21-4931	P+WTBDYBI
LD21-2459	PLtBDYBI
LD21-7183	WLtBDYBI
LD21-7325	PLtBSYBI
LG21-2486	PLtBSYBI
LG21-2490	PGTDYIbI
LG21-2835	PLtTSYBI
LG21-2844	WLtTDYBI
LG21-2925	PLtBSYBI
LW18-14009	PLt+GBDYHI
LW18-5091	PTTDYBI
SA21-2455	WLtTSYBrI
SA21-2684	PLtB+TDYBI
SA21-2923	PLt+GTSYHI
SA21-3047	PGTDYIbI
SA21-3530	PGBDYIbI
SA21-4104	PLtBSYBI
SA21-4168	PLtBSYBI
SA21-4461	PGTDYIbI
SA21-9324	PLtBDYBI
SA22-5305	WLtBDYBI

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**PRELIMINARY TEST IV, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield 8 bu/a	Rank 8 No.	Maturity 8 Date	Lodging 7 Score	Plant Height 7 In.	Seed Size 8 g/100	Seed Quality 8 Score	<u>Composition</u>	
								Protein 8 %	Oil 8 %
LD15-3818 (IV)	78.6	2	9/29	1.6	37	15.9	1.7	34.3	19.7
LD00-2817 (L)	68.6	35	1.4	2.2	40	14.1	1.6	32.9	20.4
LD07-3395bf (SCN) (E)	76.1	6	-3.3	1.4	33	16.1	1.5	32.0	20.8
K18-1994	73.4	17	4.7	1.5	33	15.0	1.6	33.0	20.2
CR21-01210	72.6	22	-4.1	1.7	35	15.4	1.4	33.0	19.9
CR21-01290	72.3	24	-3.8	2.0	36	15.2	1.8	32.8	20.1
CR21-01610	75.9	7	-5.6	1.4	31	15.1	1.4	34.1	19.5
CR21-02084	71.8	26	-3.2	2.4	37	15.0	1.4	34.0	19.8
CR21-02090	73.4	16	-5.8	1.6	34	14.7	1.3	33.7	19.8
CR21-02724	69.1	34	-6.4	1.5	38	16.3	1.3	33.1	20.4
K21-1577	66.1	37	5.8	1.9	42	15.3	1.6	34.0	18.6
K21-2376	69.3	33	1.3	1.6	33	15.6	1.4	34.0	19.6
K21-2406	72.5	23	2.3	1.6	36	14.7	1.4	34.2	19.1
K21-2447	70.3	28	3.9	1.4	34	16.9	1.6	34.0	20.1
K21-2474	71.9	25	2.5	1.3	35	16.4	1.3	34.3	19.5
K21-4874	70.1	29	2.3	1.6	35	16.2	1.6	35.0	19.0
K21-4910	66.7	36	2.6	1.9	37	15.1	1.4	36.1	19.3
K21-4931	65.3	38	3.6	2.0	39	16.8	1.9	36.1	18.9
LD21-2459	78.8	1	-1.4	1.5	36	15.7	1.4	31.4	20.5
LD21-7183	76.8	4	-2.4	2.1	38	15.9	1.8	32.9	20.2
LD21-7325	77.1	3	-0.5	1.9	39	15.7	1.4	33.5	19.4
LG21-2486	73.5	15	-1.8	1.2	37	15.8	1.3	32.6	20.8
LG21-2490	74.0	12	-0.9	1.7	39	16.8	1.7	33.5	21.0
LG21-2835	72.9	20	-0.7	1.9	40	15.5	1.3	34.5	19.2
LG21-2844	74.0	11	0.5	1.8	40	16.0	1.3	34.5	19.1
LG21-2925	69.3	32	0.5	2.3	40	17.7	1.8	34.0	19.8
LW18-14009	74.7	10	-1.7	1.7	38	15.3	1.5	33.9	19.4
LW18-5091	70.5	27	-2.9	1.5	36	15.2	1.2	33.7	19.6
SA21-2455	69.8	30	-4.7	1.9	37	16.3	1.5	32.6	20.7
SA21-2684	73.1	18	-1.2	1.3	35	15.6	1.3	33.2	20.6
SA21-2923	69.6	31	3.3	3.0	39	14.9	1.6	33.6	19.8
SA21-3047	76.1	5	-0.3	2.2	37	15.4	1.3	32.7	20.7
SA21-3530	75.6	9	-0.7	1.7	37	16.6	1.3	32.8	19.8
SA21-4104	73.0	19	-1.1	1.1	34	16.6	1.4	33.5	20.0
SA21-4168	75.8	8	-1.2	1.3	38	15.9	1.6	34.1	19.2
SA21-4461	72.8	21	-0.9	1.4	36	15.1	1.0	34.0	20.4
SA21-9324	73.8	14	0.5	1.1	34	15.5	1.6	33.6	20.1
SA22-5305	74.0	13	2.6	1.5	36	15.6	1.5	33.4	19.6
Mean	72.6			1.7	36.6	15.7	1.5	33.6	19.9
C.V. (%)	6.2								
L.S.D. (5%)	3.1								

124.5 Days After Planting

**PRELIMINARY TEST IV, 2024**

**YIELD (bu/a)**

Strain	Mean 8 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	78.6	79.8	82.3	90.5	93.7	74.7	70.2	59.8	78.3
LD00-2817 (L)	68.6	70.6	64.0	77.8	85.2	71.7	67.3	45.6	66.8
LD07-3395bf (SCN) (E)	76.1	78.0	76.6	86.9	98.4	75.7	63.6	50.0	79.6
K18-1994	73.4	68.8	70.8	84.2	91.5	75.8	75.3	50.9	69.5
CR21-01210	72.6	75.8	68.1	85.0	87.8	73.9	67.2	50.1	72.6
CR21-01290	72.3	78.6	73.3	75.2	91.7	65.6	67.4	52.8	73.7
CR21-01610	75.9	71.7	70.1	90.6	93.9	78.4	79.8	50.5	72.0
CR21-02084	71.8	80.7	73.5	70.5	89.9	71.0	59.1	57.5	72.5
CR21-02090	73.4	70.9	68.5	91.8	95.7	75.6	68.7	48.3	67.9
CR21-02724	69.1	74.6	65.5	85.6	78.2	68.6	53.2	54.4	72.4
K21-1577	66.1	60.1	63.9	71.7	80.8	69.2	63.2	54.8	64.8
K21-2376	69.3	72.3	64.3	74.4	85.7	72.4	67.9	50.6	66.5
K21-2406	72.5	73.3	68.7	76.8	92.6	76.7	71.1	50.0	70.5
K21-2447	70.3	64.3	69.5	86.8	84.3	73.4	66.1	46.9	71.0
K21-2474	71.9	70.3	70.1	89.4	93.1	74.0	67.6	41.8	69.2
K21-4874	70.1	70.0	63.8	75.8	85.9	71.8	65.6	58.8	68.7
K21-4910	66.7	62.5	58.9	70.6	79.7	65.2	67.0	59.8	70.0
K21-4931	65.3	68.5	65.0	69.8	78.6	63.4	59.1	52.7	65.1
LD21-2459	78.8	79.0	76.1	85.3	98.7	78.5	73.1	55.4	84.3
LD21-7183	76.8	84.5	75.4	68.7	101.6	74.4	73.7	59.9	76.0
LD21-7325	77.1	73.6	80.1	88.6	96.7	74.3	78.6	50.5	78.4
LG21-2486	73.5	73.1	63.2	90.3	96.3	71.1	68.5	57.9	67.8
LG21-2490	74.0	78.7	72.3	83.9	86.2	69.4	69.2	52.6	79.7
LG21-2835	72.9	77.5	76.4	83.1	91.0	68.0	65.4	50.5	71.0
LG21-2844	74.0	77.0	76.5	75.7	95.1	71.1	74.7	53.7	68.7
LG21-2925	69.3	74.0	73.6	71.5	93.1	67.4	66.8	52.2	55.9
LW18-14009	74.7	78.6	72.8	85.6	94.9	72.6	61.5	54.8	76.7
LW18-5091	70.5	74.0	66.7	81.3	87.8	70.9	65.3	54.2	64.2
SA21-2455	69.8	68.8	72.7	75.8	92.4	65.5	60.7	47.4	74.8
SA21-2684	73.1	67.9	66.8	86.0	101.6	76.2	65.5	45.2	76.0
SA21-2923	69.6	73.2	67.8	61.4	90.3	69.4	66.6	54.4	73.4
SA21-3047	76.1	76.6	75.4	70.2	99.0	72.9	80.6	56.2	78.2
SA21-3530	75.6	76.7	76.3	81.4	93.2	81.6	69.9	50.7	74.7
SA21-4104	73.0	66.6	69.2	89.9	97.4	69.1	66.8	55.5	69.9
SA21-4168	75.8	71.5	67.7	91.2	94.5	77.4	68.0	58.8	77.0
SA21-4461	72.8	68.4	71.9	83.5	96.3	71.1	66.3	57.1	67.5
SA21-9324	73.8	70.8	64.0	92.3	92.0	75.8	68.8	50.3	76.7
SA22-5305	74.0	69.6	74.4	79.8	88.4	75.4	67.6	56.1	80.4
Location Mean		72.9	70.4	81.0	91.4	72.3	67.8	52.9	72.2
C.V. (%)		5.4	6.2	7.6	5.1	4.4	5.3	6.5	7.9
L.S.D. (5%)		8.0	8.9	12.4	9.4	6.4	7.2	7.0	11.5
Row Sp. (In.)		30	30	30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4	4	4
Reps		2	2	2	2	2	2	2	2

**PRELIMINARY TEST IV, 2024**

**YIELD RANK**

Strain	Yield Rank	Savoy IL	Urbana IL	Butler-ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	2	3	1	5	15	12	9	3	6
LD00-2817 (L)	35	26	34	24	33	22	20	36	33
LD07-3395bf (SCN) (E)	6	8	3	10	5	9	32	31	4
K18-1994	17	30	18	17	23	7	4	23	26
CR21-01210	22	13	25	16	28	16	21	30	17
CR21-01290	24	7	13	29	22	35	19	19	15
CR21-01610	7	22	20	4	14	3	2	27	20
CR21-02084	26	2	12	34	26	26	36	7	18
CR21-02090	16	24	24	2	10	10	13	33	30
CR21-02724	34	14	30	13	38	32	38	15	19
K21-1577	37	38	35	31	35	30	33	14	36
K21-2376	33	21	32	30	32	20	16	25	34
K21-2406	23	18	23	25	19	5	8	32	23
K21-2447	28	36	21	11	34	17	27	35	21
K21-2474	25	27	19	8	18	15	18	38	27
K21-4874	29	28	36	26	31	21	28	4	28
K21-4910	36	37	38	33	36	37	22	2	24
K21-4931	38	32	31	36	37	38	37	20	35
LD21-2459	1	4	7	15	4	2	7	12	1
LD21-7183	4	1	9	37	1	13	6	1	12
LD21-7325	3	17	2	9	7	14	3	26	5
LG21-2486	15	20	37	6	8	24	14	6	31
LG21-2490	12	5	16	18	30	28	11	21	3
LG21-2835	20	9	5	20	24	33	30	27	22
LG21-2844	11	10	4	28	11	24	5	18	29
LG21-2925	32	15	11	32	17	34	23	22	38
LW18-14009	10	6	14	13	12	19	34	13	10
LW18-5091	27	16	29	22	28	27	31	17	37
SA21-2455	30	31	15	27	20	36	35	34	13
SA21-2684	18	34	28	12	1	6	29	37	11
SA21-2923	31	19	26	38	25	29	25	16	16
SA21-3047	5	12	8	35	3	18	1	9	7
SA21-3530	9	11	6	21	16	1	10	24	14
SA21-4104	19	35	22	7	6	31	24	11	25
SA21-4168	8	23	27	3	13	4	15	5	8
SA21-4461	21	33	17	19	8	23	26	8	32
SA21-9324	14	25	33	1	21	8	12	29	9
SA22-5305	13	29	10	23	27	11	17	10	2

PRELIMINARY TEST IV, 2024

MATURITY (date)

Strain	Mean 8 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	9/29	10/6	10/5	9/24	9/29	10/2	10/5	9/23	9/23
LD00-2817 (L)	1	1	1	2	0	-1	-2	5	6
LD07-3395bf (SCN) (E)	-3	-3	-6	-3	-8	-3	-2	-1	-2
K18-1994	5	4	3	3	6	8	1	8	6
CR21-01210	-4	-5	-8	-6	-6	-3	-2	-3	-2
CR21-01290	-4	-4	-7	-6	-7	-2	-1	-3	-1
CR21-01610	-6	-6	-11	-7	-11	-3	-2	-3	-4
CR21-02084	-3	-5	-7	-5	-4	-2	-2	-2	0
CR21-02090	-6	-6	-10	-7	-10	-3	-3	-3	-6
CR21-02724	-6	-8	-12	-7	-13	-2	-2	-4	-5
K21-1577	6	7	5	4	5	6	2	6	12
K21-2376	1	1	1	2	0	3	-4	5	3
K21-2406	2	2	3	2	2	3	-2	5	4
K21-2447	4	4	4	3	2	6	2	5	6
K21-2474	3	2	3	1	3	2	0	6	4
K21-4874	2	2	2	0	3	5	-2	4	5
K21-4910	3	1	2	2	1	6	0	6	4
K21-4931	4	3	2	2	2	7	3	7	4
LD21-2459	-1	-3	-2	-2	-3	-2	-2	2	-1
LD21-7183	-2	-3	-5	-4	-6	2	0	1	-4
LD21-7325	-1	-2	0	-2	-1	2	0	-1	0
LG21-2486	-2	-3	-2	-3	-5	-3	-3	1	3
LG21-2490	-1	0	-1	1	-3	-2	-2	-2	1
LG21-2835	-1	-2	-2	-5	-2	-1	0	1	4
LG21-2844	1	-1	-1	-2	0	2	1	3	2
LG21-2925	1	-2	0	1	-1	1	0	1	4
LW18-14009	-2	-5	-3	-2	-5	1	-2	1	0
LW18-5091	-3	-5	-4	-5	-6	-3	-3	1	0
SA21-2455	-5	-6	-9	-6	-9	-2	-1	-3	-3
SA21-2684	-1	-1	0	-3	-3	-1	-1	-3	0
SA21-2923	3	1	2	3	5	5	1	7	5
SA21-3047	-0	-3	-3	3	-1	-1	0	2	1
SA21-3530	-1	-2	-1	0	-4	2	-2	1	0
SA21-4104	-1	-1	-1	-1	-3	-3	-2	-3	3
SA21-4168	-1	-3	-2	-3	-3	-2	0	1	2
SA21-4461	-1	-3	-3	1	-3	-2	-2	-1	4
SA21-9324	1	1	0	-1	-1	1	-2	4	2
SA22-5305	3	2	3	1	3	5	-1	4	4
Date Planted	5/28	5/23	5/22	5/30	5/8	6/10	6/12	5/28	5/30
Days to Mature	125	136	136	117	144	114	115	118	116

PRELIMINARY TEST IV, 2024

LODGING (score)

Strain	Mean 7 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	1.6	1.0	1.0	2.0	1.5	2.5		1.0	2.0
LD00-2817 (L)	2.2	2.0	2.0	3.0	2.0	4.0		1.0	1.5
LD07-3395bf (SCN) (E)	1.4	1.0	1.5	2.5	1.5	1.0		1.0	1.5
K18-1994	1.5	1.5	1.0	2.5	1.5	1.0		1.0	2.0
CR21-01210	1.7	1.0	1.0	3.0	2.0	2.0		1.0	2.0
CR21-01290	2.0	1.0	1.0	3.5	2.0	4.0		1.0	1.5
CR21-01610	1.4	1.0	1.0	1.5	1.5	2.0		1.0	2.0
CR21-02084	2.4	1.0	1.5	4.0	3.0	3.5		1.0	3.0
CR21-02090	1.6	1.0	1.0	3.0	2.0	2.0		1.0	1.0
CR21-02724	1.5	1.0	1.0	2.5	2.0	2.0		1.0	1.0
K21-1577	1.9	1.3	1.0	3.5	2.0	2.0		1.0	2.5
K21-2376	1.6	1.0	1.0	4.0	2.0	1.0		1.0	1.5
K21-2406	1.6	1.0	1.0	3.5	1.5	1.5		1.0	1.5
K21-2447	1.4	1.0	1.0	2.5	1.5	1.5		1.0	1.5
K21-2474	1.3	1.3	1.0	2.0	1.5	1.0		1.0	1.5
K21-4874	1.6	1.0	1.0	3.5	1.5	2.0		1.0	1.5
K21-4910	1.9	1.3	1.0	4.5	1.5	2.5		1.0	1.5
K21-4931	2.0	1.0	1.0	4.0	2.5	2.5		1.0	2.0
LD21-2459	1.5	1.0	1.0	2.5	1.5	1.5		1.0	2.0
LD21-7183	2.1	1.0	1.0	4.0	1.5	2.5		1.0	4.0
LD21-7325	1.9	1.3	1.0	3.0	2.0	3.0		1.0	2.0
LG21-2486	1.2	1.0	1.0	2.0	1.0	1.0		1.0	1.5
LG21-2490	1.7	1.0	1.0	3.0	2.5	2.0		1.0	1.5
LG21-2835	1.9	1.0	1.0	3.5	2.0	2.5		1.0	2.5
LG21-2844	1.8	1.0	1.0	3.5	2.0	1.5		1.0	2.5
LG21-2925	2.3	1.0	1.5	4.0	2.5	2.5		1.0	3.5
LW18-14009	1.7	1.5	1.0	3.0	2.0	2.0		1.0	1.5
LW18-5091	1.5	1.0	1.0	2.0	2.0	1.5		1.0	2.0
SA21-2455	1.9	1.0	1.0	3.0	2.0	3.0		1.0	2.0
SA21-2684	1.3	1.0	1.0	2.0	1.0	1.0		1.0	2.0
SA21-2923	3.0	2.3	3.0	5.0	2.5	3.0		1.0	4.0
SA21-3047	2.2	1.5	2.0	3.5	2.5	3.0		1.0	2.0
SA21-3530	1.7	1.0	1.0	3.5	2.0	2.0		1.0	1.5
SA21-4104	1.1	1.0	1.0	1.5	1.5	1.0		1.0	1.0
SA21-4168	1.3	1.0	1.0	2.0	1.5	1.0		1.0	1.5
SA21-4461	1.4	1.0	1.0	2.5	1.5	1.5		1.0	1.5
SA21-9324	1.1	1.0	1.0	2.0	1.0	1.0		1.0	1.0
SA22-5305	1.5	1.0	1.0	2.5	1.5	2.0		1.0	1.5

**PRELIMINARY TEST IV, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
	7 Tests					Loc A KS	Loc B KS		
LD15-3818 (IV)	37	39	37	39	41	39		30	35
LD00-2817 (L)	40	42	37	45	45	41		33	37
LD07-3395bf (SCN) (E)	33	33	34	37	39	34		26	30
K18-1994	33	32	32	34	38	35		28	30
CR21-01210	35	36	30	41	40	38		28	37
CR21-01290	36	35	34	40	42	37		29	33
CR21-01610	31	29	30	38	36	33		26	29
CR21-02084	37	37	36	40	44	37		31	37
CR21-02090	34	32	32	41	41	38		27	32
CR21-02724	38	38	38	46	40	41		29	35
K21-1577	42	41	41	43	47	42		34	45
K21-2376	33	33	31	35	39	35		27	32
K21-2406	36	36	34	38	44	36		30	34
K21-2447	34	33	33	36	39	36		30	34
K21-2474	35	34	31	37	44	35		29	34
K21-4874	35	34	32	39	40	37		31	33
K21-4910	37	38	34	39	40	38		33	37
K21-4931	39	38	35	45	46	40		33	41
LD21-2459	36	37	32	40	43	39		30	34
LD21-7183	38	38	35	41	45	38		31	39
LD21-7325	39	36	37	44	44	43		30	37
LG21-2486	37	36	35	42	43	38		30	35
LG21-2490	39	38	35	45	44	39		32	37
LG21-2835	40	40	40	41	46	42		32	37
LG21-2844	40	42	38	44	48	42		32	37
LG21-2925	40	40	42	41	47	43		33	38
LW18-14009	38	39	34	41	47	40		30	35
LW18-5091	36	37	33	40	43	39		28	32
SA21-2455	37	37	35	42	41	38		29	35
SA21-2684	35	34	32	38	42	40		30	34
SA21-2923	39	40	37	43	45	37		35	35
SA21-3047	37	37	35	41	42	37		32	35
SA21-3530	37	36	35	40	43	41		31	34
SA21-4104	34	33	31	36	42	36		28	33
SA21-4168	38	36	35	43	45	41		34	35
SA21-4461	36	34	35	39	43	38		30	34
SA21-9324	34	31	30	40	42	37		28	34
SA22-5305	36	35	34	40	43	39		30	35

**PRELIMINARY TEST IV, 2024**

**SEED SIZE (g/100)**

Strain	Mean 8 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	15.9	15.7	17.3	16.3	15.7	15.9	16.1	15.1	15.4
LD00-2817 (L)	14.1	14.3	14.7	15.0	14.6	14.1	14.2	12.8	13.0
LD07-3395bf (SCN) (E)	16.1	16.1	16.4	17.1	16.5	15.9	15.9	15.4	15.7
K18-1994	15.0	15.1	15.9	16.3	15.2	15.6	14.2	14.4	13.4
CR21-01210	15.4	15.4	15.5	14.4	15.1	15.3	16.5	15.7	15.3
CR21-01290	15.2	15.6	15.6	14.5	15.6	14.8	15.4	15.8	14.5
CR21-01610	15.1	14.6	15.4	16.2	15.5	14.9	15.1	15.4	13.9
CR21-02084	15.0	15.1	15.2	14.5	15.3	15.8	15.6	14.7	14.0
CR21-02090	14.7	14.3	14.5	16.5	14.0	13.9	14.5	16.0	13.7
CR21-02724	16.3	16.5	16.6	16.5	16.3	16.2	16.1	16.9	15.6
K21-1577	15.3	14.8	16.0	14.9	14.9	16.3	16.8	14.8	13.5
K21-2376	15.6	16.1	15.0	19.0	16.0	15.5	15.3	14.0	13.7
K21-2406	14.7	15.2	15.5	16.7	14.5	15.0	14.1	13.2	13.2
K21-2447	16.9	17.8	17.8	16.3	16.8	16.6	19.2	14.1	16.4
K21-2474	16.4	17.2	17.6	17.0	17.0	16.1	17.3	14.1	14.6
K21-4874	16.2	15.9	16.8	16.7	16.1	16.3	16.4	15.4	15.6
K21-4910	15.1	15.8	15.8	16.0	15.5	15.0	14.5	14.4	13.7
K21-4931	16.8	16.7	17.2	17.9	17.0	16.9	17.4	15.5	16.0
LD21-2459	15.7	15.2	16.3	15.6	15.4	16.7	15.5	15.4	15.1
LD21-7183	15.9	16.8	15.9	16.0	15.8	15.3	15.8	17.2	14.4
LD21-7325	15.7	15.9	16.6	17.0	16.0	15.3	15.7	14.0	15.4
LG21-2486	15.8	16.6	16.4	17.0	16.5	15.2	15.5	14.1	14.9
LG21-2490	16.8	17.4	16.6	18.5	16.7	17.8	18.0	14.2	15.4
LG21-2835	15.5	15.5	16.4	16.0	15.8	14.4	15.8	15.4	14.8
LG21-2844	16.0	15.8	16.7	17.0	15.8	16.9	16.9	13.6	15.1
LG21-2925	17.7	17.8	18.3	18.5	17.8	18.3	18.1	15.3	17.5
LW18-14009	15.3	14.8	15.6	15.4	15.7	15.8	14.4	16.9	14.1
LW18-5091	15.2	14.6	15.8	16.1	15.2	15.8	15.3	14.4	14.6
SA21-2455	16.3	15.5	15.9	17.1	16.6	16.7	17.3	15.5	15.8
SA21-2684	15.6	16.3	16.7	16.6	16.2	16.0	14.2	14.1	14.9
SA21-2923	14.9	15.2	15.7	16.0	14.9	15.3	15.0	13.2	13.7
SA21-3047	15.4	15.2	14.7	16.9	15.6	16.5	16.3	13.5	14.5
SA21-3530	16.6	16.5	17.0	17.6	16.1	17.1	15.6	17.1	15.4
SA21-4104	16.6	17.3	17.4	17.6	16.6	16.7	15.1	15.9	16.3
SA21-4168	15.9	15.8	16.8	16.9	15.6	16.1	15.4	15.7	15.0
SA21-4461	15.1	15.0	15.9	16.3	15.9	14.8	14.9	14.4	13.7
SA21-9324	15.5	16.0	15.5	17.2	15.3	15.2	16.2	14.2	14.6
SA22-5305	15.6	15.6	16.5	16.7	15.1	16.6	13.3	16.0	15.2

**PRELIMINARY TEST IV, 2024**

**SEED QUALITY (score)**

Strain	Mean 8 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	1.7	1.5	3.0	1.0	1.0	2.0	2.0	2.0	1.0
LD00-2817 (L)	1.6	1.5	2.0	1.0	1.0	2.0	2.0	2.0	1.0
LD07-3395bf (SCN) (E)	1.5	1.0	2.0	1.0	1.0	2.0	2.0	2.0	1.0
K18-1994	1.6	2.0	2.0	1.5	1.0	2.0	2.0	1.0	1.0
CR21-01210	1.4	1.0	1.0	1.0	1.0	2.0	2.0	2.0	1.0
CR21-01290	1.8	1.0	2.0	1.0	2.0	2.0	2.0	2.0	2.0
CR21-01610	1.4	1.5	1.0	1.0	1.0	2.0	2.0	2.0	1.0
CR21-02084	1.4	1.5	2.0	1.0	1.5	1.0	2.0	1.0	1.0
CR21-02090	1.3	1.0	2.0	1.0	1.0	1.0	1.0	2.0	1.0
CR21-02724	1.3	1.0	1.0	1.0	1.0	2.0	2.0	1.0	1.0
K21-1577	1.6	2.0	2.0	1.0	1.5	2.0	1.0	2.0	1.0
K21-2376	1.4	1.0	2.0	1.0	1.5	1.0	2.0	2.0	1.0
K21-2406	1.4	1.5	2.0	1.0	1.0	2.0	2.0	1.0	1.0
K21-2447	1.6	1.5	2.0	1.0	1.0	2.0	2.0	2.0	1.0
K21-2474	1.3	1.5	1.0	1.0	1.0	1.0	2.0	2.0	1.0
K21-4874	1.6	1.5	2.0	1.5	1.0	2.0	2.0	2.0	1.0
K21-4910	1.4	1.0	2.0	2.0	1.0	2.0	1.0	1.0	1.0
K21-4931	1.9	2.0	3.0	2.5	2.5	1.0	2.0	1.0	1.0
LD21-2459	1.4	1.0	2.0	1.0	1.0	2.0	1.0	2.0	1.0
LD21-7183	1.8	2.0	2.0	1.5	1.0	2.0	2.0	3.0	1.0
LD21-7325	1.4	1.0	1.0	1.5	1.0	2.0	2.0	2.0	1.0
LG21-2486	1.3	1.5	1.0	1.0	1.0	1.0	2.0	2.0	1.0
LG21-2490	1.7	2.0	1.0	2.0	1.5	2.0	2.0	2.0	1.0
LG21-2835	1.3	1.0	2.0	1.0	1.0	2.0	1.0	1.0	1.0
LG21-2844	1.3	1.0	2.0	1.0	1.0	1.0	2.0	1.0	1.0
LG21-2925	1.8	2.0	1.0	3.0	1.0	2.0	2.0	2.0	1.0
LW18-14009	1.5	1.5	1.0	1.5	1.0	2.0	2.0	2.0	1.0
LW18-5091	1.2	1.5	1.0	1.0	1.0	2.0	1.0	1.0	1.0
SA21-2455	1.5	1.0	2.0	1.0	1.0	2.0	2.0	2.0	1.0
SA21-2684	1.3	1.5	2.0	1.0	1.0	2.0	1.0	1.0	1.0
SA21-2923	1.6	1.5	2.0	2.0	1.0	1.0	2.0	2.0	1.0
SA21-3047	1.3	1.0	1.0	1.5	1.0	1.0	2.0	2.0	1.0
SA21-3530	1.3	1.0	1.0	1.5	1.0	2.0	1.0	2.0	1.0
SA21-4104	1.4	1.0	2.0	1.0	1.0	2.0	2.0	1.0	1.0
SA21-4168	1.6	1.5	2.0	1.5	1.0	2.0	2.0	2.0	1.0
SA21-4461	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
SA21-9324	1.6	1.5	2.0	1.0	1.0	2.0	2.0	2.0	1.0
SA22-5305	1.5	1.0	1.0	2.0	1.0	2.0	2.0	2.0	1.0

**PRELIMINARY TEST IV, 2024**

**PROTEIN (%)**

Strain	Mean 8 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	34.3	33.9	35.8	36.9	35.4	34.0	31.8	32.1	34.9
LD00-2817 (L)	32.9	32.2	33.1	33.9	33.8	33.4	32.7	32.0	32.1
LD07-3395bf (SCN) (E)	32.0	29.9	30.8	33.1	33.1	31.9	33.3	31.4	32.4
K18-1994	33.0	32.4	33.9	34.6	33.4	32.0	32.8	30.6	33.9
CR21-01210	33.0	32.1	32.1	34.6	33.0	32.6	33.1	33.2	33.5
CR21-01290	32.8	32.0	32.5	33.9	33.5	32.3	33.1	32.1	33.3
CR21-01610	34.1	32.7	34.2	35.1	35.7	33.4	34.1	32.8	34.5
CR21-02084	34.0	33.5	33.8	35.4	35.4	33.9	33.3	32.9	34.1
CR21-02090	33.7	33.2	33.2	36.1	34.5	33.2	32.6	32.4	34.1
CR21-02724	33.1	32.2	32.6	33.6	34.0	33.1	34.3	32.6	32.4
K21-1577	34.0	32.4	33.9	36.0	35.4	33.9	32.8	32.7	35.2
K21-2376	34.0	34.6	34.0	35.3	34.4	33.3	33.9	31.9	34.3
K21-2406	34.2	33.6	33.9	36.0	34.4	33.3	34.8	32.3	35.0
K21-2447	34.0	34.9	34.7	34.5	34.8	34.3	34.2	30.6	34.0
K21-2474	34.3	34.7	34.2	35.2	35.5	33.3	33.8	33.2	34.7
K21-4874	35.0	34.3	35.8	35.8	36.2	34.2	34.8	33.6	35.4
K21-4910	36.1	36.9	36.6	36.3	36.1	35.4	35.8	35.1	36.6
K21-4931	36.1	36.0	35.6	37.6	37.1	35.3	36.6	34.2	36.3
LD21-2459	31.4	29.6	31.9	32.5	31.6	31.7	30.5	31.1	32.0
LD21-7183	32.9	31.0	32.1	35.4	33.2	32.0	31.9	33.4	33.8
LD21-7325	33.5	31.8	34.0	35.6	34.7	33.0	32.3	32.6	34.5
LG21-2486	32.6	32.3	32.1	33.2	33.6	32.5	31.6	32.3	33.0
LG21-2490	33.5	33.1	33.3	34.0	34.7	33.1	33.5	32.7	33.5
LG21-2835	34.5	32.7	35.3	35.6	35.1	34.4	35.0	33.0	35.3
LG21-2844	34.5	32.1	34.3	36.6	34.6	34.6	35.2	33.0	35.7
LG21-2925	34.0	32.5	33.7	35.7	34.6	32.5	34.0	32.7	36.1
LW18-14009	33.9	33.0	33.4	35.3	34.6	34.1	33.8	32.8	34.5
LW18-5091	33.7	32.7	34.0	34.5	33.9	33.2	33.9	33.0	34.1
SA21-2455	32.6	30.6	32.8	34.1	33.1	32.7	32.4	32.1	33.2
SA21-2684	33.2	32.5	33.9	34.3	33.4	32.9	34.2	31.3	33.5
SA21-2923	33.6	33.0	33.6	35.3	34.9	33.7	34.0	31.6	32.8
SA21-3047	32.7	31.0	31.8	34.5	32.2	33.1	33.9	32.2	32.9
SA21-3530	32.8	31.0	32.8	34.8	33.0	32.5	34.0	31.7	32.5
SA21-4104	33.5	34.0	34.4	35.0	33.9	32.4	34.6	31.5	31.9
SA21-4168	34.1	33.3	34.5	35.0	34.7	34.6	33.8	32.8	33.7
SA21-4461	34.0	32.5	34.5	34.5	34.6	34.4	33.9	33.1	34.4
SA21-9324	33.6	33.2	32.3	35.0	34.5	33.5	33.5	33.4	33.7
SA22-5305	33.4	31.6	34.1	35.4	32.8	34.2	33.3	31.6	34.0

**PRELIMINARY TEST IV, 2024**

**OIL (%)**

Strain	Mean 8 Tests	Savoy IL	Urbana IL	Butler- ville IN	West Lafayette IN	Manhattan		Ottawa KS	Novelty MO
						Loc A KS	Loc B KS		
LD15-3818 (IV)	19.7	19.6	19.0	19.4	18.6	20.2	19.7	21.0	20.0
LD00-2817 (L)	20.4	20.2	20.1	20.7	19.9	19.6	20.1	21.2	21.0
LD07-3395bf (SCN) (E)	20.8	21.1	21.2	21.0	20.0	20.4	20.2	21.2	21.2
K18-1994	20.2	19.9	20.5	19.7	19.8	20.3	19.7	21.6	20.2
CR21-01210	19.9	19.8	20.2	19.8	19.5	19.8	19.8	20.7	19.9
CR21-01290	20.1	20.3	20.2	20.2	19.5	19.9	19.6	21.0	20.3
CR21-01610	19.5	19.8	19.4	19.1	18.6	19.4	19.4	20.5	19.9
CR21-02084	19.8	19.7	19.9	19.8	19.1	19.7	19.7	21.0	20.0
CR21-02090	19.8	19.7	20.2	19.2	19.0	19.8	19.7	20.8	20.4
CR21-02724	20.4	20.6	20.6	20.9	19.7	19.8	19.8	21.1	20.6
K21-1577	18.6	18.5	19.0	18.1	17.5	18.6	18.8	20.0	18.6
K21-2376	19.6	18.8	19.1	19.5	18.8	19.6	19.6	21.4	20.3
K21-2406	19.1	19.0	18.5	19.4	18.7	18.8	18.8	20.5	19.4
K21-2447	20.1	19.2	19.3	20.4	19.0	19.9	19.7	22.3	20.7
K21-2474	19.5	19.2	19.1	19.5	18.3	19.8	19.5	20.6	19.7
K21-4874	19.0	19.0	18.7	19.3	18.0	19.1	18.4	20.2	19.7
K21-4910	19.3	19.2	18.8	19.5	19.1	19.3	19.1	20.1	19.3
K21-4931	18.9	18.2	18.6	19.1	17.9	19.2	18.7	20.7	19.1
LD21-2459	20.5	20.9	20.2	20.4	19.7	20.5	20.3	21.4	20.7
LD21-7183	20.2	20.3	20.3	19.8	19.7	20.2	19.9	20.6	20.4
LD21-7325	19.4	19.4	19.1	18.9	18.5	19.5	19.5	20.6	19.5
LG21-2486	20.8	20.8	20.8	21.0	19.3	20.9	20.6	21.6	21.1
LG21-2490	21.0	21.0	20.5	21.4	19.9	20.9	20.9	21.7	21.5
LG21-2835	19.2	19.7	18.7	18.9	18.7	19.1	19.1	20.5	19.0
LG21-2844	19.1	19.7	19.3	18.5	18.2	18.8	18.5	20.3	19.0
LG21-2925	19.8	20.0	20.3	19.4	18.9	19.9	19.5	21.0	19.6
LW18-14009	19.4	19.9	19.4	19.1	18.5	19.0	19.4	20.1	19.8
LW18-5091	19.6	19.7	19.1	19.6	19.1	19.3	19.0	20.6	20.0
SA21-2455	20.7	21.3	20.6	20.5	20.3	20.4	20.7	21.4	20.8
SA21-2684	20.6	20.4	20.5	20.8	19.9	20.5	19.8	21.9	20.7
SA21-2923	19.8	19.7	19.7	19.5	18.7	19.6	19.7	21.2	20.2
SA21-3047	20.7	21.3	21.3	20.3	20.4	20.2	20.0	21.3	20.8
SA21-3530	19.8	20.1	19.7	19.4	19.1	19.6	18.9	21.0	20.4
SA21-4104	20.0	18.2	19.9	19.8	19.4	20.4	19.3	21.5	21.3
SA21-4168	19.2	19.3	18.7	18.8	18.4	19.2	19.2	20.0	19.7
SA21-4461	20.4	20.7	20.0	20.8	19.8	20.1	20.5	21.0	20.2
SA21-9324	20.1	19.9	20.4	19.6	19.2	20.0	19.9	21.4	20.6
SA22-5305	19.6	19.6	19.5	19.6	18.5	19.8	19.0	21.1	19.8

**Northern Regional Uniform Test  
Uniform Test 0, Traited Material, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	ND Dickey (0)	P. 91M10	Sheyenne	Miranda	4	F4	Rps1c
2	MN1511CN (SCN) (L)	M06-288181	M06-358188	Lorenz	2	F8	SCN, Rps1c
3	AG03XF2 (E)			Cai	2		RR2, Xtend Flex
4	ND15-22873			Miranda	3		
5	M05-363022HO-25	M05-363022(4)	KB13-39#871HO	Lorenz	2	F4	HO, SCN
6	M07-260009HOLL-1	M07-260009(4) / M05-319034LL	M07-260009(4) / KB13-39#871HO	Lorenz	Initial	F4	HOLL
7	M07-292111HOLL-3	M07-292111(4) / M05-319034LL	M07-292111(4) / KB13-39#871HO	Lorenz	1	F4	HOLL, SCN
8	M17R-306019	MN0208CN	M12R-801105	Lorenz	23 UT 00	F4	RR
9	M17R-908-1094	LD10-5213a / M10-218053	E13912	Lorenz	1	F4	RR, Aphid, H-Rps3a
10	M18-151014	M14-190032	M09-343025	Lorenz	23 UT 0	F5	OIL, Carb
11	M18-154033	ND Stutman	M10-214070	Lorenz	Initial	F5	ProCN
12	M18-154036	ND Stutman	M10-214070	Lorenz	Initial	F5	PROCN
13	M18-154059	ND Stutman	M10-214070	Lorenz	Initial	F5	ProCN
14	M18-156005	ND13-8894	M10-214070	Lorenz	Initial	F5	YLDPRO
15	M18-190057	M14HO-1329-1001	M10-238-2036	Lorenz	Initial	F5	HO
16	M18-195034	M14HO-1329-1001	M10-238-2077	Lorenz	Initial	F5	HO
17	M18-200026	M14HO-1344-6005	M07-296048HOLL-1	Lorenz	Initial	F5	HOLL
18	M18-224022	M14-190032	M09-269045	Lorenz	Initial	F5	CarbCN
19	ND18-20092(GT SCN)	ND12-20515	ND Bison	Miranda	Initial	F5	P. sojiae (Race 4), SCN, RR
20	ND20-17783(GT)	ND14-8899(GT SCN)	ND Bison	Miranda	1		Glyphosate tolerant, H-Rps6, H-PI88788
21	ND20-18557(GT)	ND14-8899(GT)	ND11-19725	Miranda	Initial	F5	P. sojiae (Race 4), SCN, RR
22	ND21-11583(GT)	ND15-22860(GT)	ND15-23848(GT)	Miranda	Initial	F5	P. sojiae (Race 4), RR
23	ND21-12686(GT)	ND15-22128(GT)	ND12-15647	Miranda	Initial	F5	P. sojiae (Race 4), RR
24	ND21-13089(GT)	ND15-23848(GT)	ND14-4507(SCN)	Miranda	Initial	F5	P. sojiae (Race 4), SCN, RR

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**DESCRIPTIVE AND DISEASE DATA**

Strain	Descriptive Code	IDC	
		Climax	Score Crookston
ND Dickey (0)	PGTDYYI	2.3	1.0
MN1511CN (SCN) (L)	PGBDYBfi	1.8	2.0
AG03XF2 (E)	PTBDYBI	1.0	1.0
ND15-22873	WGBSYYI	1.3	1.0
M05-363022HO-25	PGTDYYI	2.5	1.0
M07-260009HOLL-1	PGBDYYI	2.0	1.0
M07-292111HOLL-3	WTTDYGI	2.0	1.0
M17R-306019	P+WT+GB+TDYHI	1.8	1.0
M17R-908-1094	PT+ILt+GBDYHI	2.0	1.0
M18-151014	WGBSYBfi	2.3	1.5
M18-154033	PGTSYYI	1.8	1.0
M18-154036	PGTSYYI	1.5	1.0
M18-154059	PGB+TDYYI	1.5	1.0
M18-156005	PGTDYYI	1.8	1.5
M18-190057	PGTSYGI	2.0	1.0
M18-195034	PT+GBDYHI	2.0	1.5
M18-200026	PTB+TDYGI	1.5	1.0
M18-224022	P+WT+GTSYYI	2.3	1.0
ND18-20092(GT SCN)	PGTDYBfi	1.5	1.0
ND20-17783(GT)	PTBDYBI	2.3	1.0
ND20-18557(GT)	PTB+TDYHI	2.3	2.5
ND21-11583(GT)	PGBDYIbi	1.8	1.0
ND21-12686(GT)	PGBDYBfi	1.8	1.0
ND21-13089(GT)	PGBDYYI	1.5	1.0

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	2 bu/a	2 No.	4 Date	3 Score	3 In.	4 g/100	4 Score	4 Protein %	4 Oil %
ND Dickey (0)	63.9	2	9/24	1.2	30	17.9	1.5	34.2	18.0
MN1511CN (SCN) (L)	55.1	12	3.8	1.2	32	14.5	2.0	33.6	19.0
AG03XF2 (E)	54.5	14	-5.6	1.0	26	16.2	1.3	33.3	18.6
ND15-22873	61.6	4	0.7	1.2	29	15.3	2.5	34.4	18.2
M05-363022HO-25	52.3	18	-0.0	1.4	28	16.0	1.8	36.2	19.2
M07-260009HOLL-1	54.2	15	-4.0	1.8	31	15.5	1.3	35.9	18.5
M07-292111HOLL-3	54.0	16	-0.7	1.3	27	14.2	1.8	36.3	19.2
M17R-306019	65.1	1	4.0	1.1	30	16.3	2.3	33.4	19.5
M17R-908-1094	55.1	13	2.2	1.3	30	17.6	1.8	34.9	18.7
M18-151014	59.4	5	1.2	1.2	27	16.2	1.5	34.2	19.6
M18-154033	56.3	10	-1.6	1.2	31	18.9	1.5	36.1	17.8
M18-154036	51.8	20	-0.8	1.3	27	17.6	2.0	36.8	18.0
M18-154059	50.5	21	-2.3	1.2	28	17.0	1.8	37.4	17.5
M18-156005	48.2	23	-0.5	1.3	32	16.9	1.8	37.5	17.3
M18-190057	55.9	11	-0.7	1.7	33	16.3	2.3	37.0	18.1
M18-195034	49.2	22	-3.7	1.6	31	15.3	1.8	35.2	18.5
M18-200026	52.8	17	-3.8	1.2	26	16.1	1.8	35.9	18.8
M18-224022	58.4	6	-0.5	1.1	26	16.7	2.3	35.0	18.6
ND18-20092(GT SCN)	52.2	19	-6.8	1.0	27	14.1	1.5	35.0	18.9
ND20-17783(GT)	56.9	8	-4.1	1.0	24	18.0	1.8	33.7	19.3
ND20-18557(GT)	48.2	24	-5.1	1.2	24	15.1	2.0	34.0	19.6
ND21-11583(GT)	61.8	3	-2.8	1.1	28	15.2	2.0	33.1	20.1
ND21-12686(GT)	56.4	9	-2.4	1.0	28	14.6	1.5	33.4	19.1
ND21-13089(GT)	58.2	7	2.0	1.2	25	14.4	2.5	34.8	18.1
Mean	55.5			1.3	28.4	16.1	1.8	35.0	18.7
C.V. (%)	11.9								
L.S.D. (5%)	7.6								

121.3 Days After Planting

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	8 bu/a	8 No.	9 Date	8 Score	8 In.	7 g/100	7 Score	9 Protein %	9 Oil %
ND Dickey (0)	57.0	1	9/20	1.2	30	17.2	1.4	34.2	18.5
MN1511CN (SCN) (L)	52.2	3	5.5	1.3	36	13.7	1.5	32.9	19.3
AG03XF2 (E)	50.8	5	-4.9	1.0	28	16.3	1.5	33.5	18.9
ND15-22873	52.5	2	1.2	1.1	28	14.7	1.9	33.7	18.8
M05-363022HO-25	49.2	8	0.3	1.3	31	15.2	1.4	36.1	19.5
M07-292111HOLL-3	50.2	6	-1.0	1.3	30	13.6	1.4	35.3	20.0
M17R-908-1094	52.0	4	2.5	1.3	31	16.9	1.4	34.3	19.2
ND20-17783(GT)	49.3	7	-4.4	1.0	25	17.5	1.7	33.3	19.7

119.5 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	11	11	12	11	10	10	9	12	12
ND Dickey (0)	58.7	1	9/21	1.2	30	17.2	1.3	34.4	18.3
MN1511CN (SCN) (L)	54.1	2	5.2	1.3	36	13.9	1.3	33.1	19.0
AG03XF2 (E)	51.8	5	-5.1	1.1	28	16.2	1.3	33.7	18.6
ND15-22873	53.9	3	1.8	1.1	28	14.7	1.6	33.8	18.7
M05-363022HO-25	51.9	4	0.9	1.3	29	15.4	1.3	36.0	19.3

121.1 Days After Planting

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**YIELD (bu/a)**

Strain	Mean 2 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND*	Gales- burg ND*
ND Dickey (0)	63.9	74.1	53.8	46.8	60.9
MN1511CN (SCN) (L)	55.1	58.4	51.8	40.1	43.6
AG03XF2 (E)	54.5	70.5	38.4	42.7	42.0
ND15-22873	61.6	71.2	51.9	48.8	61.7
M05-363022HO-25	52.3	64.0	40.5	43.8	26.7
M07-260009HOLL-1	54.2	59.9	48.6	33.9	27.3
M07-292111HOLL-3	54.0	63.6	44.3	38.7	37.5
M17R-306019	65.1	77.2	53.0	48.3	42.8
M17R-908-1094	55.1	66.5	43.6	43.6	31.7
M18-151014	59.4	65.2	53.7	41.2	31.7
M18-154033	56.3	61.5	51.1	36.5	30.5
M18-154036	51.8	63.0	40.5	28.5	20.8
M18-154059	50.5	57.4	43.7	28.8	23.2
M18-156005	48.2	56.9	39.7	39.0	36.4
M18-190057	55.9	60.8	51.2	40.4	33.6
M18-195034	49.2	57.6	40.6	31.2	35.7
M18-200026	52.8	68.4	37.4	32.5	31.4
M18-224022	58.4	63.7	53.2	32.3	26.6
ND18-20092(GT SCN)	52.2	59.4	45.0	41.3	42.7
ND20-17783(GT)	56.9	66.4	47.5	24.9	39.9
ND20-18557(GT)	48.2	49.6	48.8	27.3	39.3
ND21-11583(GT)	61.8	69.8	53.8	44.1	51.3
ND21-12686(GT)	56.4	61.5	51.2	39.1	52.4
ND21-13089(GT)	58.2	73.9	42.6	38.2	39.9
Location Mean		64.2	46.9	38.0	37.9
C.V. (%)		9.8	14.8	22.0	22.2
L.S.D. (5%)		10.4	11.5	13.7	13.9
Row sp. (In.)		30	30	30	30
Rows/Plot		4	4	4	4
Reps		3	3	3	3

\* Data not included in mean.

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**YIELD RANK**

Strain	Yield Rank	Crookston MN	Thief River Falls MN	Casselton ND	Galesburg ND
ND Dickey (0)	2	2	1	3	2
MN1511CN (SCN) (L)	12	20	7	11	5
AG03XF2 (E)	14	5	23	7	8
ND15-22873	4	4	6	1	1
M05-363022HO-25	18	11	21	5	21
M07-260009HOLL-1	15	18	12	17	20
M07-292111HOLL-3	16	13	15	14	12
M17R-306019	1	1	5	2	6
M17R-908-1094	13	8	17	6	16
M18-151014	5	10	3	9	16
M18-154033	10	15	10	16	19
M18-154036	20	14	20	22	24
M18-154059	21	22	16	21	23
M18-156005	23	23	22	13	13
M18-190057	11	17	8	10	15
M18-195034	22	21	19	20	14
M18-200026	17	7	24	18	18
M18-224022	6	12	4	19	22
ND18-20092(GT SCN)	19	19	14	8	7
ND20-17783(GT)	8	9	13	24	10
ND20-18557(GT)	24	24	11	23	11
ND21-11583(GT)	3	6	2	4	4
ND21-12686(GT)	9	16	9	12	3
ND21-13089(GT)	7	3	18	15	9

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**MATURITY (date)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	9/24	9/20	9/21	9/29	9/27
MN1511CN (SCN) (L)	4	4	3	4	4
AG03XF2 (E)	-6	-4	-7	-6	-5
ND15-22873	1	2	-0	0	1
M05-363022HO-25	-0	1	-1	-1	1
M07-260009HOLL-1	-4	-3	-5	-4	-4
M07-292111HOLL-3	-1	0	-2	-2	1
M17R-306019	4	7	3	1	5
M17R-908-1094	2	3	2	0	3
M18-151014	1	4	2	-1	0
M18-154033	-2	-2	-1	-1	-2
M18-154036	-1	0	-2	-2	0
M18-154059	-2	-3	-2	-2	-1
M18-156005	-1	0	-1	-3	1
M18-190057	-1	-1	0	-2	1
M18-195034	-4	-3	-7	-3	-3
M18-200026	-4	-4	-6	-2	-3
M18-224022	-1	1	-1	-2	1
ND18-20092(GT SCN)	-7	-5	-9	-6	-7
ND20-17783(GT)	-4	-3	-7	-3	-3
ND20-18557(GT)	-5	0	-8	-4	-8
ND21-11583(GT)	-3	-2	-6	-2	-1
ND21-12686(GT)	-2	-3	-3	-2	-2
ND21-13089(GT)	2	1	1	3	4
Date Planted	5/26	5/29	5/15	6/7	5/22
Days to Mature	121	114	129	114	128

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**LODGING (score)**

Strain	Mean 3 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	1.2		1.0	1.0	1.7
MN1511CN (SCN) (L)	1.2		1.0	1.0	1.7
AG03XF2 (E)	1.0		1.0	1.0	1.0
ND15-22873	1.2		1.0	1.0	1.7
M05-363022HO-25	1.4		1.0	1.0	2.3
M07-260009HOLL-1	1.8		1.7	1.0	2.7
M07-292111HOLL-3	1.3		1.0	1.0	2.0
M17R-306019	1.1		1.0	1.0	1.3
M17R-908-1094	1.3		1.0	1.0	2.0
M18-151014	1.2		1.0	1.0	1.7
M18-154033	1.2		1.0	1.0	1.7
M18-154036	1.3		1.0	1.0	2.0
M18-154059	1.2		1.0	1.0	1.7
M18-156005	1.3		1.0	1.0	2.0
M18-190057	1.7		1.0	1.0	3.0
M18-195034	1.6		1.0	1.0	2.7
M18-200026	1.2		1.0	1.0	1.7
M18-224022	1.1		1.0	1.0	1.3
ND18-20092(GT SCN)	1.0		1.0	1.0	1.0
ND20-17783(GT)	1.0		1.0	1.0	1.0
ND20-18557(GT)	1.2		0.9	1.0	1.7
ND21-11583(GT)	1.1		1.0	1.0	1.3
ND21-12686(GT)	1.0		1.0	1.0	1.0
ND21-13089(GT)	1.2		1.0	1.0	1.7

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 3 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	30	31		26	34
MN1511CN (SCN) (L)	32	35		26	34
AG03XF2 (E)	26	29		26	23
ND15-22873	29	29		27	32
M05-363022HO-25	28	32		27	27
M07-260009HOLL-1	31	33		28	33
M07-292111HOLL-3	27	31		24	26
M17R-306019	30	33		25	31
M17R-908-1094	30	34		27	29
M18-151014	27	29		25	29
M18-154033	31	35		26	33
M18-154036	27	32		24	24
M18-154059	28	32		24	27
M18-156005	32	35		29	31
M18-190057	33	35		31	34
M18-195034	31	35		25	32
M18-200026	26	32		21	27
M18-224022	26	31		24	24
ND18-20092(GT SCN)	27	26		25	28
ND20-17783(GT)	24	25		21	26
ND20-18557(GT)	24	26		22	25
ND21-11583(GT)	28	31		25	30
ND21-12686(GT)	28	32		23	30
ND21-13089(GT)	25	28		22	25

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**SEED SIZE (g/100)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	17.9	17.9	16.9	18.9	18.0
MN1511CN (SCN) (L)	14.5	13.7	13.3	16.0	14.8
AG03XF2 (E)	16.2	15.8	16.6	16.5	15.8
ND15-22873	15.3	15.1	14.7	16.4	15.0
M05-363022HO-25	16.0	16.5	15.1	16.7	15.6
M07-260009HOLL-1	15.5	15.8	14.4	17.2	14.7
M07-292111HOLL-3	14.2	13.8	13.9	15.9	13.2
M17R-306019	16.3	15.1	15.4	18.2	16.3
M17R-908-1094	17.6	17.6	17.2	18.6	16.9
M18-151014	16.2	15.5	14.8	17.8	16.5
M18-154033	18.9	19.0	18.7	20.2	17.6
M18-154036	17.6	16.7	16.8	17.9	18.8
M18-154059	17.0	17.1	16.8	17.6	16.4
M18-156005	16.9	17.0	15.7	17.0	17.7
M18-190057	16.3	16.2	15.6	17.1	16.3
M18-195034	15.3	14.7	13.6	17.3	15.7
M18-200026	16.1	15.5	14.5	17.6	16.9
M18-224022	16.7	17.0	15.4	17.8	16.7
ND18-20092(GT SCN)	14.1	14.3	13.4	15.2	13.6
ND20-17783(GT)	18.0	17.6	18.4	18.5	17.4
ND20-18557(GT)	15.1	15.5	14.2	16.4	14.1
ND21-11583(GT)	15.2	14.8	14.9	16.2	15.0
ND21-12686(GT)	14.6	13.9	14.2	15.6	14.5
ND21-13089(GT)	14.4	14.0	13.6	15.1	14.9

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**SEED QUALITY (score)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	1.5	1.0	1.0	2.0	2.0
MN1511CN (SCN) (L)	2.0	1.0	1.0	3.0	3.0
AG03XF2 (E)	1.3	1.0	1.0	1.0	2.0
ND15-22873	2.5	2.0	2.0	3.0	3.0
M05-363022HO-25	1.8	1.0	1.0	3.0	2.0
M07-260009HOLL-1	1.3	1.0	1.0	2.0	1.0
M07-292111HOLL-3	1.8	1.0	1.0	2.0	3.0
M17R-306019	2.3	2.0	1.0	3.0	3.0
M17R-908-1094	1.8	2.0	1.0	2.0	2.0
M18-151014	1.5	1.0	1.0	2.0	2.0
M18-154033	1.5	1.0	1.0	2.0	2.0
M18-154036	2.0	1.0	1.0	2.0	4.0
M18-154059	1.8	1.0	2.0	2.0	2.0
M18-156005	1.8	1.0	1.0	2.0	3.0
M18-190057	2.3	2.0	2.0	2.0	3.0
M18-195034	1.8	1.0	1.0	3.0	2.0
M18-200026	1.8	1.0	1.0	2.0	3.0
M18-224022	2.3	2.0	1.0	3.0	3.0
ND18-20092(GT SCN)	1.5	1.0	1.0	2.0	2.0
ND20-17783(GT)	1.8	1.0	2.0	2.0	2.0
ND20-18557(GT)	2.0	2.0	2.0	2.0	2.0
ND21-11583(GT)	2.0	2.0	1.0	2.0	3.0
ND21-12686(GT)	1.5	1.0	1.0	2.0	2.0
ND21-13089(GT)	2.5	2.0	2.0	3.0	3.0

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**PROTEIN (%)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	34.2	35.0	32.7	34.6	34.7
MN1511CN (SCN) (L)	33.6	33.9	32.4	34.3	33.7
AG03XF2 (E)	33.3	32.3	33.8	34.1	32.9
ND15-22873	34.4	34.5	33.2	36.9	33.0
M05-363022HO-25	36.2	36.4	35.0	37.6	35.7
M07-260009HOLL-1	35.9	36.1	35.1	36.3	36.1
M07-292111HOLL-3	36.3	36.8	35.6	38.6	34.3
M17R-306019	33.4	33.2	31.1	36.0	33.1
M17R-908-1094	34.9	34.4	33.8	37.0	34.4
M18-151014	34.2	34.1	31.8	36.3	34.8
M18-154033	36.1	36.3	34.9	36.9	36.1
M18-154036	36.8	36.3	35.6	37.9	37.6
M18-154059	37.4	37.9	36.1	39.6	36.1
M18-156005	37.5	38.2	34.3	39.8	37.6
M18-190057	37.0	37.6	35.9	37.7	36.9
M18-195034	35.2	35.4	33.8	36.5	35.0
M18-200026	35.9	36.2	34.0	37.0	36.4
M18-224022	35.0	36.0	34.6	35.6	33.7
ND18-20092(GT SCN)	35.0	35.3	35.1	36.0	33.5
ND20-17783(GT)	33.7	33.5	33.1	34.6	33.6
ND20-18557(GT)	34.0	35.4	31.1	35.2	34.4
ND21-11583(GT)	33.1	33.7	31.1	34.7	33.0
ND21-12686(GT)	33.4	32.5	33.5	33.9	33.6
ND21-13089(GT)	34.8	35.0	33.4	36.0	34.8

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**OIL (%)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	18.0	17.5	18.8	18.0	17.8
MN1511CN (SCN) (L)	19.0	18.7	19.1	19.1	19.0
AG03XF2 (E)	18.6	18.4	18.6	18.5	19.0
ND15-22873	18.2	18.3	18.7	17.8	18.1
M05-363022HO-25	19.2	18.7	19.6	18.9	19.5
M07-260009HOLL-1	18.5	18.2	18.4	18.8	18.8
M07-292111HOLL-3	19.2	19.0	19.8	18.2	19.9
M17R-306019	19.5	19.5	20.0	19.1	19.4
M17R-908-1094	18.7	18.7	19.0	18.1	18.9
M18-151014	19.6	19.5	20.8	19.0	19.2
M18-154033	17.8	17.6	18.0	17.5	17.9
M18-154036	18.0	18.3	18.1	18.0	17.8
M18-154059	17.5	16.8	18.1	16.8	18.3
M18-156005	17.3	16.9	18.5	16.5	17.4
M18-190057	18.1	17.7	18.3	17.8	18.6
M18-195034	18.5	17.8	19.0	18.3	18.9
M18-200026	18.8	18.6	19.4	18.7	18.7
M18-224022	18.6	18.0	18.5	18.7	19.4
ND18-20092(GT SCN)	18.9	18.6	18.8	19.0	19.4
ND20-17783(GT)	19.3	19.2	19.3	19.2	19.5
ND20-18557(GT)	19.6	18.6	20.8	19.4	19.5
ND21-11583(GT)	20.1	19.6	20.7	19.9	20.0
ND21-12686(GT)	19.1	18.6	18.9	19.3	19.4
ND21-13089(GT)	18.1	17.7	18.6	17.9	18.1

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

No. of Tests Strain	Palmitic 2 %	Stearic 2 %	Oleic 2 %	Linoleic 2 %	Linolenic 2 %
ND Dickey (0)	10.5	4.1	21.8	54.9	8.9
MN1511CN (SCN) (L)	11.5	4.0	20.5	54.8	9.4
M05-363022HO-25	8.1	3.7	80.2	2.9	5.1
M07-260009HOLL-1	7.6	3.4	81.8	4.4	2.9
M07-292111HOLL-3	6.6	3.7	83.2	3.6	3.0
M18-190057	6.5	2.9	83.3	2.6	4.8
M18-195034	8.5	3.2	76.7	5.2	6.7
M18-200026	7.2	3.6	82.1	2.6	4.6
Mean	8.3	3.5	66.2	16.3	5.6

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**FATTY ACID, PALMITIC (%)**

Strain	Mean 2 Tests	Crooks- ton MN	Thief River Falls MN
ND Dickey (0)	10.5	10.3	10.7
MN1511CN (SCN) (L)	11.5	11.4	11.6
M05-363022HO-25	8.1	8.1	8.1
M07-260009HOLL-1	7.6	7.7	7.5
M07-292111HOLL-3	6.6	6.4	6.7
M18-190057	6.5	6.4	6.6
M18-195034	8.5	8.5	8.5
M18-200026	7.2	7.2	7.1

**UNIFORM TEST 0 TRAITED MATERIAL, 2024****FATTY ACID, STEARIC (%)**

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Strain	Mean 2 Tests	Crooks- ton MN	Thief River Falls MN
ND Dickey (0)	4.1	4.3	3.8
MN1511CN (SCN) (L)	4.0	4.1	3.8
M05-363022HO-25	3.7	4.0	3.4
M07-260009HOLL-1	3.4	3.5	3.2
M07-292111HOLL-3	3.7	3.9	3.5
M18-190057	2.9	2.9	2.8
M18-195034	3.2	3.3	3.0
M18-200026	3.6	3.6	3.6

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**UNIFORM TEST 0 TRAITED MATERIAL, 2024****FATTY ACID, OLEIC (%)**

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Strain	Mean 2 Tests	Crooks- ton MN	Thief River Falls MN
ND Dickey (0)	21.8	21.8	21.8
MN1511CN (SCN) (L)	20.5	21.7	19.2
M05-363022HO-25	80.2	79.8	80.5
M07-260009HOLL-1	81.8	81.9	81.6
M07-292111HOLL-3	83.2	82.9	83.5
M18-190057	83.3	83.8	82.8
M18-195034	76.7	76.1	77.3
M18-200026	82.1	81.9	82.3

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UNIFORM TEST 0 TRAITED MATERIAL, 2024

FATTY ACID, LINOLEIC (%)

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Strain	Mean 2 Tests	Crooks- ton MN	Thief River Falls MN
ND Dickey (0)	54.9	54.1	55.7
MN1511CN (SCN) (L)	54.8	53.6	55.9
M05-363022HO-25	2.9	3.0	2.7
M07-260009HOLL-1	4.4	4.0	4.8
M07-292111HOLL-3	3.6	3.8	3.4
M18-190057	2.6	2.2	2.9
M18-195034	5.2	5.3	5.0
M18-200026	2.6	2.6	2.5

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UNIFORM TEST 0 TRAITED MATERIAL, 2024

FATTY ACID, LINOLENIC (%)

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Strain	Mean 2 Tests	Crooks- ton MN	Thief River Falls MN
ND Dickey (0)	8.9	9.6	8.1
MN1511CN (SCN) (L)	9.4	9.2	9.5
M05-363022HO-25	5.1	4.9	5.3
M07-260009HOLL-1	2.9	2.9	2.8
M07-292111HOLL-3	3.0	2.9	3.0
M18-190057	4.8	4.6	4.9
M18-195034	6.7	7.0	6.3
M18-200026	4.6	4.6	4.5

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**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

	Sucrose	Raffinose	Stachyose	Total Sugar
No. of Tests	4	4	4	4
Strain	%	%	%	%
ND Dickey (0)	4.7	0.5	2.6	7.8
MN1511CN (SCN) (L)	3.5	0.6	2.9	6.9
M18-151014	5.6	0.5	0.8	6.8
M18-224022	4.7	0.5	1.7	6.9
Mean	4.6	0.5	2.0	7.1

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**SEED SUGAR, SUCROSE (%)**

	Mean	Crooks-	Thief River	Cassel-	Gales-
	4	ton	Falls	ton	burg
Strain	Tests	MN	MN	ND	ND
ND Dickey (0)	4.7	5.0	5.0	4.1	4.8
MN1511CN (SCN) (L)	3.5	3.5	3.5	3.5	3.3
M18-151014	5.6	5.4	5.4	6.4	5.1
M18-224022	4.7	4.2	4.2	4.6	5.7

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**SEED SUGAR, RAFFINOSE (%)**

	Mean	Crooks-	Thief River	Cassel-	Gales-
	4	ton	Falls	ton	burg
Strain	Tests	MN	MN	ND	ND
ND Dickey (0)	0.5	0.6	0.2	0.5	0.5
MN1511CN (SCN) (L)	0.6	0.6	0.6	0.5	0.5
M18-151014	0.5	0.5	0.4	0.6	0.4
M18-224022	0.5	0.4	0.6	0.6	0.6

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**SEED SUGAR, STACHYOSE (%)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	2.6	3.0	2.6	2.4	2.6
MN1511CN (SCN) (L)	2.9	2.9	2.9	3.0	2.6
M18-151014	0.8	0.9	0.8	0.8	0.7
M18-224022	1.7	1.6	1.9	1.7	1.6

**UNIFORM TEST 0 TRAITED MATERIAL, 2024**

**SEED SUGAR, TOTAL (%)**

Strain	Mean 4 Tests	Crooks- ton MN	Thief River Falls MN	Cassel- ton ND	Gales- burg ND
ND Dickey (0)	7.8	8.6	7.7	7.0	7.9
MN1511CN (SCN) (L)	6.9	7.1	6.9	7.1	6.5
M18-151014	6.8	6.8	6.6	7.7	6.2
M18-224022	6.9	6.1	6.6	6.9	8.0

**Northern Regional Uniform Test  
Uniform Test I, Traited Material, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	MN1511CN (SCN) (I)	M06-288181	M06-358188	Lorenz	2		SCN, Rps1c
2	MN1905CN (L)	M08-365038	IA1026	Lorenz	23	SCN I	F9 Yld, SCN
3	AG11XF2 (E)			Cai	2		RR2, Xtend Flex
4	AG17XF2			Cai	2		RR2, Xtend Flex
5	A18302-39	A14054-63	A14061-56	Singh	Initial	F5	HOLL
6	M05-209037HO-4	M07-209037(4) / M05-319034LL	M05-209037(4) / KB13-39#871HO	Lorenz	Initial	F4	HO
7	M05-363022HO-6	M05-363022	KB13-39#871	Lorenz	2	F4	HO from PR, SCN
8	M08-354011HOLL-35	M08-354011(4) / KB13-39#871HO	M08-354011(4) / M05-319034LL	Lorenz	1	F4	HOLL
9	M08-362051HOLL-4			Lorenz	1	F4	HOLL, H-PI88788, H-Rps1a
10	M08-362051HOLL-5	M08-362051(4) / KB13-40#813HO	M08-362051(4) / M05-319034LL	Lorenz	1	F4	HOLL
11	M08-362051HOLL-7			Lorenz	1	F4	HOLL, SCN
12	M17-124036	M11-132044	M07-307086	Lorenz	1	F5	YLDPRO, H-Rps1a, H-PI88788
13	M17-253029	M04-295008	M11-301046	Lorenz	1	F5	LG
14	M17R-908-1002	LD10-5213a / M10-218053	E13912	Lorenz	2	F4	Aphid R, H-PI88788, RR, Rps1k
15	M17R-908-1003			Lorenz	2	F4	Aphid R, H-PI88788, RR, H-Rps1k
16	M18-113009	M10-207102	ORC 3713N	Lorenz	Initial	F5	Pro
17	M18-113012	M10-207102	ORC 3713N	Lorenz	Initial	F5	YLDPro
18	M18-145057	M10-207102	M07-307086	Lorenz	Initial	F5	Pro
19	M18-155056	ND13-8892	M10-214070	Lorenz	Initial	F5	Yld Pro
20	M18-193017	M09-278026	M10-238-2036	Lorenz	Initial	F5	HOCN
21	M18-201022	M07-297007HOLL-2	M07-296048HOLL-1	Lorenz	Initial	F5	HOLL
22	M18-228055	M10-254090	M09-269045	Lorenz	Initial	F5	Pro
23	MSC09-774074HO-4	MSC09-774074(4) / KB13-39#871HO	MSC09-774074(4) / M09-319035LL	Lorenz	Initial	F4	HO

Entry 9-11 share same parentage. Entry 14-15 share same parentage. Entry 16-17 share same parentage.

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**DESCRIPTIVE AND DISEASE DATA**

Strain	Descriptive Code	IDC Score	
		Climax	Crookston
MN1511CN (SCN) (I)	PGBDYBfI	1.8	1.0
MN1905CN (L)	PTBDYYI	2.3	1.0
AG11XF2 (E)	PLtTDYBrI	1.8	1.0
AG17XF2	PLtBDYBI	1.5	2.0
A18302-39	PGBDYHI	2.8	1.0
M05-209037HO-4	WGB+TDYYI	2.3	1.5
M05-363022HO-6	PGTDYBfI	2.5	1.0
M08-354011HOLL-35	WTTDYBrI	1.8	1.0
M08-362051HOLL-4	PLtB+TSYYI	3.0	1.5
M08-362051HOLL-5	PT+LtBSYYI	2.8	2.0
M08-362051HOLL-7	PLtBDYYI	2.5	2.0
M17-124036	WTBSYYI	2.5	1.0
M17-253029	PGBDYI	3.0	1.5
M17R-908-1002	WGB+TDYBfI	1.5	1.0
M17R-908-1003	P+WGTDYHI	2.0	1.0
M18-113009	PGBSYI	2.5	1.5
M18-113012	PGBDYI	2.5	1.5
M18-145057	PTBDYBI	2.0	1.5
M18-155056	PLtTDYYI	2.3	1.0
M18-193017	PGBSYI	2.3	1.0
M18-201022	PTTSYGI	2.5	2.0
M18-228055	PGTDYYI	2.8	1.0
MSC09-774074HO-4	PTB+TDYBrI	1.5	1.0

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	8 bu/a	8 No.	7 Date	8 Score	8 In.	8 g/100	8 Score	7 Protein %	7 Oil %
MN1511CN (SCN) (I)	57.6	10	9/11	1.6	34	14.8	1.4	33.7	19.4
MN1905CN (L)	67.5	2	5.1	1.5	32	16.7	1.5	34.2	19.9
AG11XF2 (E)	62.0	6	-1.7	1.6	30	15.0	1.3	34.0	19.4
AG17XF2	64.5	3	2.7	1.3	33	15.6	1.2	33.9	19.8
A18302-39	68.5	1	5.0	1.8	31	14.2	1.4	34.5	19.3
M05-209037HO-4	56.5	13	4.9	1.9	28	16.8	1.3	34.6	20.3
M05-363022HO-6	57.1	11	6.5	1.6	33	15.7	1.3	34.8	20.2
M08-354011HOLL-35	47.8	19	-1.8	1.6	29	13.6	1.2	36.3	19.8
M08-362051HOLL-4	58.0	9	4.9	2.0	30	14.5	1.1	35.7	19.6
M08-362051HOLL-5	61.3	7	5.0	2.0	32	14.7	1.3	35.6	19.7
M08-362051HOLL-7	63.1	4	4.4	1.8	31	14.4	1.3	35.7	19.5
M17-124036	46.7	22	0.7	1.4	32	17.2	1.4	38.6	17.6
M17-253029	47.3	21	-1.2	1.8	30	19.1	1.5	37.5	18.8
M17R-908-1002	50.6	18	2.1	1.3	30	15.3	1.5	34.0	19.3
M17R-908-1003	57.1	11	5.1	1.6	31	16.9	1.5	35.1	18.5
M18-113009	51.0	17	0.7	1.6	29	17.2	1.5	36.3	18.3
M18-113012	56.3	14	-0.3	1.4	31	16.6	1.3	34.9	19.3
M18-145057	54.9	16	2.3	1.8	35	19.0	1.6	39.8	16.9
M18-155056	39.9	23	-2.2	1.5	33	17.6	1.4	38.7	17.9
M18-193017	59.2	8	3.3	1.8	30	14.0	1.4	35.7	19.1
M18-201022	47.8	19	1.5	1.8	30	17.4	1.5	37.0	19.0
M18-228055	55.0	15	0.7	1.7	33	16.9	1.8	36.0	18.1
MSC09-774074HO-4	62.3	5	8.2	1.4	28	14.5	1.4	34.1	20.4
Mean	56.2			1.6	31.2	16.0	1.4	35.7	19.1
C.V. (%)	10.7								
L.S.D. (5%)	3.4								

120.0 Days After Planting

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	17 bu/a	17 No.	15 Date	16 Score	16 In.	16 g/100	16 Score	15 Protein %	15 Oil %
MN1511CN (SCN) (I)	60.6	4	9/13	1.8	36	15.0	1.6	33.9	19.2
AG11XF2 (E)	62.3	2	-1.8	1.7	32	15.5	1.5	34.5	19.3
AG17XF2	66.2	1	2.2	1.5	35	16.2	1.5	34.0	19.6
M05-363022HO-6	58.8	8	5.4	1.8	36	16.1	1.5	35.1	19.9
M08-354011HOLL-35	53.3	10	-1.8	1.9	33	14.4	1.3	36.3	19.8
M08-362051HOLL-4	59.2	7	5.2	2.5	34	15.0	1.5	36.1	19.2
M08-362051HOLL-5	60.0	6	5.1	2.5	34	15.1	1.6	36.0	19.3
M08-362051HOLL-7	61.6	3	4.3	2.2	33	15.0	1.5	36.0	19.2
M17-124036	51.8	12	1.7	1.7	35	18.2	1.6	38.8	17.4
M17-253029	52.5	11	-0.5	2.2	33	20.1	1.8	37.5	18.7
M17R-908-1002	56.6	9	3.6	1.5	34	15.9	1.7	34.3	19.1
M17R-908-1003	60.1	5	4.9	1.9	34	17.9	1.7	35.4	18.3

121.0 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	25	25	21	24	24	23	23	22	22
MN1511CN (SCN) (I)	59.7	3	9/12	1.7	35	15.2	1.6	33.9	19.2
AG11XF2 (E)	61.4	2	-1.8	1.5	31	15.7	1.5	34.5	19.2
AG17XF2	65.4	1	2.3	1.4	33	16.4	1.5	34.0	19.6
M05-363022HO-6	59.2	4	5.3	1.7	34	16.4	1.5	34.8	20.0
M17R-908-1002	56.6	6	2.8	1.6	33	16.1	1.7	34.2	19.1
M17R-908-1003	59.1	5	4.8	1.8	33	18.0	1.6	35.3	18.3

120.3 Days After Planting

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**YIELD (bu/a)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	57.6	54.1	53.7	64.6	59.0	60.2	53.7	52.1	65.4
MN1905CN (L)	67.5	86.5	72.0	71.5	68.4	62.4	59.5	55.1	66.3
AG11XF2 (E)	62.0	71.2	60.6	57.6	61.2	60.6	57.9	54.5	74.1
AG17XF2	64.5	74.1	61.5	71.6	68.6	57.5	57.2	58.7	68.6
A18302-39	68.5	77.2	66.2	77.8	75.2	64.2	63.3	52.9	74.3
M05-209037HO-4	56.5	51.4	58.4	64.4	56.3	61.3	50.6	48.6	62.4
M05-363022HO-6	57.1	60.5	61.6	56.4	67.1	61.7	57.3	45.4	48.2
M08-354011HOLL-35	47.8	50.4	52.0	54.6	46.8	49.4	46.4	40.8	43.5
M08-362051HOLL-4	58.0	72.6	59.3	59.6	47.3	56.6	51.7	54.3	64.4
M08-362051HOLL-5	61.3	72.5	64.0	74.1	51.7	57.2	52.6	52.3	67.5
M08-362051HOLL-7	63.1	79.2	56.1	71.0	66.0	62.6	50.0	55.6	66.0
M17-124036	46.7	56.0	41.6	49.7	46.4	47.4	45.9	37.2	51.0
M17-253029	47.3	49.8	46.0	52.4	49.2	53.9	46.0	37.8	44.7
M17R-908-1002	50.6	59.5	45.1	49.3	51.8	55.3	47.9	44.2	53.3
M17R-908-1003	57.1	71.6	54.0	55.6	62.5	62.6	55.4	40.7	55.9
M18-113009	51.0	61.3	52.0	59.7	53.2	49.7	49.1	41.9	43.3
M18-113012	56.3	65.4	63.0	53.1	59.4	58.4	49.7	45.7	57.0
M18-145057	54.9	65.8	53.0	46.8	51.6	54.7	52.7	46.6	69.8
M18-155056	39.9	35.5	41.1	30.8	49.5	49.8	35.8	37.7	38.9
M18-193017	59.2	70.6	59.3	70.6	57.0	59.8	52.3	46.5	59.3
M18-201022	47.8	53.1	47.4	48.7	52.8	52.1	49.4	40.4	40.1
M18-228055	55.0	61.0	66.7	55.9	51.7	60.1	50.6	52.9	42.7
MSC09-774074HO-4	62.3	80.4	63.1	79.0	50.5	53.4	51.4	58.5	64.0
Location Mean		64.3	56.4	59.8	56.7	57.0	51.6	47.8	57.4
C.V. (%)		8.2	8.3	10.6	9.3	9.2	8.3	10.7	12.4
L.S.D. (5%)		8.7	9.7	13.2	11.0	10.9	7.0	8.4	11.8
Row sp. (In.)		30	30	30	15	15	30	30	30
Rows/Plot		4	4	4	6	6	4	4	4
Reps		3	2	2	2	2	3	3	3

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**YIELD RANK**

Strain	Yield Rank	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamberton MN	Rose-Mount MN	Waseca MN
MN1511CN (SCN) (I)	10	18	15	8	9	8	7	10	8
MN1905CN (L)	2	1	1	5	3	4	2	4	6
AG11XF2 (E)	6	9	9	12	7	7	3	5	2
AG17XF2	3	5	8	4	2	12	5	1	4
A18302-39	1	4	3	2	1	1	1	8	1
M05-209037HO-4	13	20	12	9	11	6	13	11	11
M05-363022HO-6	11	15	7	13	4	5	4	15	17
M08-354011HOLL-35	19	21	18	16	22	22	20	18	19
M08-362051HOLL-4	9	6	11	11	21	14	11	6	9
M08-362051HOLL-5	7	7	4	3	15	13	9	9	5
M08-362051HOLL-7	4	3	13	6	5	3	15	3	7
M17-124036	22	17	22	19	23	23	22	23	16
M17-253029	21	22	20	18	20	17	21	21	18
M17R-908-1002	18	16	21	20	14	15	19	16	15
M17R-908-1003	11	8	14	15	6	2	6	19	14
M18-113009	17	13	17	10	12	21	18	17	20
M18-113012	14	12	6	17	8	11	16	14	13
M18-145057	16	11	16	22	17	16	8	12	3
M18-155056	23	23	23	23	19	20	23	22	23
M18-193017	8	10	10	7	10	10	10	13	12
M18-201022	19	19	19	21	13	19	17	20	22
M18-228055	15	14	2	14	16	9	14	7	21
MSC09-774074HO-4	5	2	5	1	18	18	12	2	10

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**MATURITY (date)**

Strain	Mean 7 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	9/11	9/6	8/28	8/30	9/19		9/20	9/21	9/18
MN1905CN (L)	5	7	5	8	5		3	5	4
AG11XF2 (E)	-2	-1	-2	-2	0		-4	-2	-2
AG17XF2	3	4	2	2	2		2	4	3
A18302-39	5	8	3	6	5		4	5	5
M05-209037HO-4	5	6	2	4	8		5	3	7
M05-363022HO-6	7	7	4	9	8		5	5	9
M08-354011HOLL-35	-2	-1	-3	-2	-2		-4	-1	0
M08-362051HOLL-4	5	9	2	7	3		4	4	6
M08-362051HOLL-5	5	7	3	7	5		5	5	4
M08-362051HOLL-7	4	7	2	8	4		4	3	4
M17-124036	1	3	0	0	-1		3	1	-1
M17-253029	-1	0	-3	-2	0		-2	-2	0
M17R-908-1002	2	5	0	2	2		1	3	3
M17R-908-1003	5	8	2	4	5		7	3	7
M18-113009	1	3	-2	1	2		1	-1	1
M18-113012	-0	2	-1	0	-1		-3	0	0
M18-145057	2	3	0	2	4		3	2	2
M18-155056	-2	-0	-4	-4	0		-4	-2	-2
M18-193017	3	8	-1	3	3		3	4	4
M18-201022	1	4	0	2	2		1	0	1
M18-228055	1	2	-1	0	-1		1	2	0
MSC09-774074HO-4	8	8	5	9	14		7	6	9
Date Planted	5/14	5/19	5/6	5/8	5/24		5/16	5/8	5/20
Days to Mature	120	110	114	114	118		127	136	121

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**LODGING (score)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	1.6	1.3	1.5	3.0	1.0	1.0	1.0	1.7	2.0
MN1905CN (L)	1.5	1.0	2.0	2.5	1.5	1.0	1.0	1.3	2.0
AG11XF2 (E)	1.6	1.0	1.0	2.5	2.0	1.0	1.0	2.0	2.0
AG17XF2	1.3	1.0	1.0	1.5	1.5	1.0	1.0	1.7	2.0
A18302-39	1.8	1.0	1.5	3.5	2.0	1.0	1.0	2.0	2.0
M05-209037HO-4	1.9	1.3	2.0	2.5	3.5	1.0	1.0	2.0	2.0
M05-363022HO-6	1.6	1.0	1.5	1.5	3.0	1.0	1.0	2.0	2.0
M08-354011HOLL-35	1.6	1.0	2.0	3.0	1.0	1.0	1.0	2.0	2.0
M08-362051HOLL-4	2.0	3.0	2.0	2.5	1.5	1.5	1.0	2.3	2.0
M08-362051HOLL-5	2.0	2.7	2.0	3.5	1.5	1.5	1.0	2.0	2.0
M08-362051HOLL-7	1.8	1.3	1.5	2.5	3.0	1.0	1.0	2.0	2.0
M17-124036	1.4	1.0	1.0	2.0	1.0	1.0	1.0	2.0	2.0
M17-253029	1.8	2.0	2.0	3.5	1.0	1.0	1.0	2.0	2.0
M17R-908-1002	1.3	1.0	1.0	2.0	1.0	1.0	1.0	1.3	2.0
M17R-908-1003	1.6	1.3	2.0	2.0	2.0	1.0	1.0	1.7	2.0
M18-113009	1.6	1.0	1.5	2.0	2.0	1.0	1.0	2.0	2.0
M18-113012	1.4	1.0	1.5	2.0	1.0	1.0	1.0	2.0	2.0
M18-145057	1.8	1.7	2.0	2.0	2.5	1.0	1.0	2.0	2.0
M18-155056	1.5	1.3	1.0	3.0	1.5	1.0	1.0	1.3	2.0
M18-193017	1.8	1.3	2.0	2.0	2.5	1.0	1.0	2.0	2.7
M18-201022	1.8	1.7	2.0	2.5	2.5	1.0	1.0	2.0	2.0
M18-228055	1.7	1.0	2.0	2.5	1.0	1.0	1.0	2.7	2.0
MSC09-774074HO-4	1.4	1.0	1.0	1.5	1.5	1.0	1.0	2.0	2.0

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	34	32	34	36	35	37	30	33	32
MN1905CN (L)	32	33	35	33	36	32	29	29	29
AG11XF2 (E)	30	30	31	29	34	31	27	30	30
AG17XF2	33	33	30	34	35	34	30	32	34
A18302-39	31	32	32	33	32	33	27	30	32
M05-209037HO-4	28	26	30	31	32	27	26	27	25
M05-363022HO-6	33	33	35	33	38	34	32	32	30
M08-354011HOLL-35	29	30	33	30	29	32	27	28	26
M08-362051HOLL-4	30	31	31	33	29	34	26	30	30
M08-362051HOLL-5	32	32	33	34	35	34	29	30	29
M08-362051HOLL-7	31	32	30	36	35	32	28	30	28
M17-124036	32	34	31	35	34	32	32	31	32
M17-253029	30	31	33	34	33	30	26	28	26
M17R-908-1002	30	29	30	30	33	32	30	31	28
M17R-908-1003	31	31	33	31	34	34	29	27	29
M18-113009	29	30	30	33	31	30	30	27	25
M18-113012	31	30	33	32	31	31	31	31	28
M18-145057	35	34	36	35	40	33	35	33	35
M18-155056	33	33	35	34	34	36	33	28	30
M18-193017	30	31	31	34	32	31	29	27	29
M18-201022	30	31	31	30	32	29	30	28	26
M18-228055	33	32	36	34	35	36	34	32	29
MSC09-774074HO-4	28	31	29	32	30	28	24	29	26

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**SEED SIZE (g/100)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	14.8	14.5	15.5	16.1	13.7	14.2	14.7	14.9	14.6
MN1905CN (L)	16.7	17.4	16.0	17.9	16.0	15.8	17.8	16.5	16.0
AG11XF2 (E)	15.0	14.9	15.2	16.4	14.2	14.5	14.8	14.6	15.1
AG17XF2	15.6	16.2	14.6	16.7	15.3	14.5	16.4	16.1	15.2
A18302-39	14.2	15.1	13.1	15.2	13.3	13.9	14.5	14.7	13.8
M05-209037HO-4	16.8	17.3	17.4	18.7	15.5	15.6	17.4	15.7	16.6
M05-363022HO-6	15.7	16.0	14.4	16.2	15.7	16.0	16.6	15.2	15.6
M08-354011HOLL-35	13.6	13.6	13.5	13.9	13.2	13.8	14.0	13.6	13.5
M08-362051HOLL-4	14.5	15.2	14.4	15.0	12.8	14.0	15.0	14.7	14.7
M08-362051HOLL-5	14.7	14.8	14.2	15.9	13.0	13.8	16.2	15.0	14.5
M08-362051HOLL-7	14.4	14.6	13.7	15.7	13.6	13.6	16.0	14.5	13.8
M17-124036	17.2	18.3	16.8	18.1	15.8	16.9	18.3	16.8	16.8
M17-253029	19.1	20.4	19.8	20.6	17.5	16.5	20.3	18.8	19.1
M17R-908-1002	15.3	16.0	14.2	15.2	13.9	15.4	16.4	15.8	15.1
M17R-908-1003	16.9	18.7	14.9	16.3	16.2	17.1	18.4	16.8	16.6
M18-113009	17.2	17.7	16.9	18.6	16.8	16.9	16.9	16.9	17.0
M18-113012	16.6	18.0	16.6	17.8	14.9	15.9	17.3	16.2	16.4
M18-145057	19.0	19.9	18.1	18.7	19.0	18.5	19.8	18.8	19.4
M18-155056	17.6	18.4	18.0	16.7	17.8	16.8	19.1	16.9	16.7
M18-193017	14.0	15.1	13.1	15.8	13.4	13.8	14.6	13.1	13.1
M18-201022	17.4	17.9	17.5	19.4	16.3	16.7	18.2	16.1	16.8
M18-228055	16.9	17.2	17.5	17.0	15.7	16.7	17.7	16.6	16.8
MSC09-774074HO-4	14.5	15.6	13.1	15.6	13.2	14.3	15.6	14.7	14.1

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**SEED QUALITY (score)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	1.4	1.0	1.0	1.0	1.5	3.0	2.0	1.0	1.0
MN1905CN (L)	1.5	1.0	1.0	1.0	2.5	2.5	2.0	1.0	1.0
AG11XF2 (E)	1.3	1.0	1.0	1.0	2.0	2.0	1.0	1.0	1.0
AG17XF2	1.2	1.0	1.0	1.0	1.5	2.0	1.0	1.0	1.0
A18302-39	1.4	1.0	1.0	1.0	1.5	2.5	2.0	1.0	1.0
M05-209037HO-4	1.3	1.0	1.0	1.0	1.0	2.5	2.0	1.0	1.0
M05-363022HO-6	1.3	1.0	1.0	1.0	1.5	2.5	1.0	1.0	1.0
M08-354011HOLL-35	1.2	1.0	1.0	1.0	1.5	2.0	1.0	1.0	1.0
M08-362051HOLL-4	1.1	1.0	1.0	1.0	1.0	2.0	1.0	1.0	1.0
M08-362051HOLL-5	1.3	1.0	1.0	1.0	1.5	2.5	1.0	1.0	1.0
M08-362051HOLL-7	1.3	1.0	1.0	1.0	1.5	2.5	1.0	1.0	1.0
M17-124036	1.4	1.0	1.5	1.0	1.5	3.0	1.0	1.0	1.0
M17-253029	1.5	1.0	1.0	1.0	2.0	2.0	2.0	2.0	1.0
M17R-908-1002	1.5	1.0	1.5	1.0	2.0	2.5	2.0	1.0	1.0
M17R-908-1003	1.5	1.0	1.0	1.0	1.5	2.5	2.0	1.0	2.0
M18-113009	1.5	1.0	1.0	1.0	2.0	3.0	2.0	1.0	1.0
M18-113012	1.3	1.0	1.0	1.0	1.5	2.0	2.0	1.0	1.0
M18-145057	1.6	1.0	1.5	1.0	2.0	2.0	2.0	1.0	2.0
M18-155056	1.4	1.0	1.0	1.0	2.0	2.5	1.0	2.0	1.0
M18-193017	1.4	1.0	1.0	1.0	1.5	1.5	2.0	2.0	1.0
M18-201022	1.5	1.0	1.0	1.5	1.5	3.0	2.0	1.0	1.0
M18-228055	1.8	1.0	1.0	1.5	2.0	3.0	2.0	2.0	2.0
MSC09-774074HO-4	1.4	1.0	1.0	2.0	1.0	2.0	2.0	1.0	1.0

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**PROTEIN (%)**

Strain	Mean 7 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	33.7	32.6	33.9	35.2	32.8		33.6	34.0	33.9
MN1905CN (L)	34.2	34.3	34.1	34.1	35.0		33.7	34.8	33.5
AG11XF2 (E)	34.0	33.9	33.7	34.4	34.5		33.2	34.4	33.8
AG17XF2	33.9	32.7	34.4	35.1	33.2		33.9	34.2	33.9
A18302-39	34.5	34.1	34.5	34.6	35.1		34.7	35.2	33.3
M05-209037HO-4	34.6	34.8	35.1	36.0	34.3		34.4	34.1	33.9
M05-363022HO-6	34.8	34.3	34.1	34.9	35.1		34.4	35.2	35.7
M08-354011HOLL-35	36.3	35.5	36.5	37.2	36.0		36.1	37.3	35.4
M08-362051HOLL-4	35.7	35.5	35.9	35.5	35.8		34.9	37.1	35.0
M08-362051HOLL-5	35.6	35.3	35.7	35.6	35.4		35.5	37.1	34.6
M08-362051HOLL-7	35.7	35.0	35.5	36.1	35.4		36.4	35.9	35.7
M17-124036	38.6	38.3	39.3	39.8	37.7		38.2	38.9	38.3
M17-253029	37.5	37.2	38.6	38.2	35.6		37.6	38.6	36.6
M17R-908-1002	34.0	33.0	33.7	35.0	33.1		35.0	34.4	33.6
M17R-908-1003	35.1	35.0	35.4	36.0	34.5		35.1	35.2	34.4
M18-113009	36.3	36.6	36.1	36.9	36.4		36.3	37.1	35.1
M18-113012	34.9	33.8	36.0	34.9	34.4		35.1	35.6	34.7
M18-145057	39.8	39.8	38.3	41.0	39.1		41.2	40.2	39.1
M18-155056	38.7	38.1	39.3	39.5	37.9		39.0	39.3	37.4
M18-193017	35.7	35.4	34.8	36.0	35.9		36.2	36.2	35.5
M18-201022	37.0	37.2	37.8	38.5	36.5		36.5	36.9	35.5
M18-228055	36.0	35.3	37.0	36.3	35.4		36.0	37.1	34.7
MSC09-774074HO-4	34.1	34.1	33.6	34.4	34.2		34.4	34.2	33.7

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**OIL (%)**

Strain	Mean 7 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	19.4	20.1	19.3	19.2	19.4		19.4	19.2	19.2
MN1905CN (L)	19.9	19.8	20.3	20.4	19.1		20.1	19.7	20.1
AG11XF2 (E)	19.4	19.8	20.3	19.8	18.7		19.5	19.0	18.8
AG17XF2	19.8	20.3	20.1	19.6	19.7		19.8	19.5	19.3
A18302-39	19.3	19.4	19.7	19.7	19.4		19.2	18.8	19.1
M05-209037HO-4	20.3	20.2	20.5	20.1	20.2		20.4	20.1	20.4
M05-363022HO-6	20.2	20.6	20.9	20.7	19.3		20.3	19.8	20.1
M08-354011HOLL-35	19.8	20.6	20.1	19.8	19.7		19.9	19.3	19.5
M08-362051HOLL-4	19.6	19.6	20.0	19.6	19.5		19.8	18.8	19.6
M08-362051HOLL-5	19.7	19.7	20.1	19.8	19.8		19.6	19.0	19.7
M08-362051HOLL-7	19.5	19.9	19.9	19.5	19.1		19.1	19.4	19.3
M17-124036	17.6	18.0	17.4	17.5	18.0		17.5	17.2	17.5
M17-253029	18.8	19.1	18.6	18.8	19.4		18.7	18.0	19.0
M17R-908-1002	19.3	20.2	20.0	19.3	19.4		19.0	18.8	18.8
M17R-908-1003	18.5	18.7	18.8	19.0	18.3		18.3	18.0	18.6
M18-113009	18.3	18.5	18.9	18.7	18.0		18.2	17.7	18.4
M18-113012	19.3	19.8	19.1	19.9	19.6		19.5	18.7	18.9
M18-145057	16.9	17.1	17.6	16.4	17.0		16.5	16.5	16.8
M18-155056	17.9	18.6	18.0	17.4	17.6		18.1	17.6	17.8
M18-193017	19.1	19.3	19.8	19.4	18.9		18.7	18.8	19.1
M18-201022	19.0	19.1	18.8	18.5	18.8		19.2	18.8	19.6
M18-228055	18.1	18.6	18.0	18.2	18.2		17.8	17.4	18.4
MSC09-774074HO-4	20.4	20.2	21.1	20.6	20.5		20.3	20.0	20.4

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

No. of Tests Strain	Palmitic 8 %	Stearic 8 %	Oleic 8 %	Linoleic 8 %	Linolenic 8 %
MN1511CN (SCN) (I)	11.1	3.9	22.2	54.7	8.1
MN1905CN (L)	10.2	4.2	22.8	56.2	6.7
A18302-39	9.7	4.4	35.8	44.4	5.8
M05-209037HO-4	7.2	3.3	82.5	3.7	3.3
M05-363022HO-6	6.9	3.7	82.8	2.8	3.7
M08-354011HOLL-35	6.7	3.2	84.4	3.5	2.2
M08-362051HOLL-4	8.0	3.6	81.2	4.5	2.7
M08-362051HOLL-5	8.0	3.5	81.2	4.3	3.0
M08-362051HOLL-7	8.0	3.6	78.6	6.8	2.9
M18-193017	7.2	3.7	78.8	5.1	5.2
M18-201022	6.6	3.3	80.6	7.0	2.4
MSC09-774074HO-4	7.6	3.8	82.4	2.7	3.6
Mean	8.1	3.7	67.8	16.3	4.1

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**FATTY ACID, PALMITIC (%)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	11.1	11.4	11.1	11.3	10.6	10.8	11.0	11.1	11.5
MN1905CN (L)	10.2	9.9	10.4	10.1	9.9	10.1	10.4	10.3	10.4
A18302-39	9.7	9.5	9.8	9.7	9.6	9.4	9.5	10.1	10.0
M05-209037HO-4	7.2	7.2	7.6	7.1	7.2	7.2	7.4	7.1	7.1
M05-363022HO-6	6.9	6.7	6.9	6.7	6.8	6.8	7.0	7.1	7.1
M08-354011HOLL-35	6.7	6.7	6.7	6.8	6.7	6.7	6.7	6.5	6.7
M08-362051HOLL-4	8.0	7.7	8.2	7.9	7.5	8.1	8.2	8.6	8.1
M08-362051HOLL-5	8.0	7.6	8.4	8.0	7.6	8.3	8.0	7.7	8.2
M08-362051HOLL-7	8.0	7.9	7.9	8.2	7.3	9.2	8.1	7.7	8.1
M18-193017	7.2	7.2	7.0	6.9	6.4	7.3	8.4	7.4	7.2
M18-201022	6.6	7.3	3.3	7.0	6.5	7.6	7.2	7.0	7.2
MSC09-774074HO-4	7.6	7.7	7.5	7.4	7.3	7.7	7.6	7.6	7.6

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**FATTY ACID, STEARIC (%)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	3.9	3.7	4.0	3.6	3.8	3.8	4.4	3.8	3.8
MN1905CN (L)	4.2	3.5	4.1	3.7	3.8	4.5	4.6	4.7	4.3
A18302-39	4.4	4.2	4.3	4.0	4.4	4.6	4.7	4.6	4.1
M05-209037HO-4	3.3	3.4	3.3	3.1	3.1	3.3	3.3	3.5	3.3
M05-363022HO-6	3.7	3.6	3.8	3.7	3.6	3.8	3.9	3.8	3.8
M08-354011HOLL-35	3.2	3.2	3.3	2.9	3.1	3.2	3.3	3.2	3.3
M08-362051HOLL-4	3.6	3.6	3.6	3.3	3.2	3.4	3.9	3.7	3.8
M08-362051HOLL-5	3.5	3.4	3.6	3.5	3.1	3.6	3.8	3.6	3.5
M08-362051HOLL-7	3.6	3.4	3.6	3.5	3.2	4.1	3.6	4.0	3.5
M18-193017	3.7	3.8	3.7	3.6	3.4	3.9	3.8	3.7	3.8
M18-201022	3.3	3.2	3.2	3.4	3.0	3.9	3.5	3.2	3.2
MSC09-774074HO-4	3.8	3.5	3.8	3.4	3.6	4.3	3.9	3.8	3.9

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**FATTY ACID, OLEIC (%)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	22.2	23.8	23.2	21.9	19.1	22.3	24.4	20.3	22.9
MN1905CN (L)	22.8	22.9	21.7	21.4	20.9	24.0	24.2	22.7	25.0
A18302-39	35.8	36.4	32.8	32.3	40.7	41.0	37.2	32.2	33.5
M05-209037HO-4	82.5	82.2	82.4	83.1	82.1	82.4	81.8	82.5	83.1
M05-363022HO-6	82.8	83.5	83.1	83.3	81.8	82.9	83.1	82.2	82.7
M08-354011HOLL-35	84.4	84.5	84.4	85.2	83.6	83.6	84.5	84.6	84.8
M08-362051HOLL-4	81.2	82.2	81.6	82.7	81.5	79.7	81.6	79.7	80.9
M08-362051HOLL-5	81.2	82.6	80.7	81.6	81.3	79.5	81.3	81.3	81.2
M08-362051HOLL-7	78.6	82.1	82.5	82.1	80.9	57.5	82.0	81.0	81.0
M18-193017	78.8	78.4	80.4	80.2	78.5	75.8	81.2	77.8	77.8
M18-201022	80.6	82.2	85.8	82.9	82.1	68.3	81.3	81.5	81.0
MSC09-774074HO-4	82.4	82.6	82.2	83.8	82.3	80.8	82.7	82.7	82.3

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLEIC (%)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	54.7	53.3	54.5	55.7	57.8	54.2	52.7	55.8	53.6
MN1905CN (L)	56.2	56.9	57.5	58.7	58.0	54.6	54.4	55.5	53.9
A18302-39	44.4	44.9	48.0	48.5	38.7	39.4	43.2	46.6	46.2
M05-209037HO-4	3.7	3.4	4.2	3.0	4.2	3.2	4.1	4.0	3.9
M05-363022HO-6	2.8	2.7	2.8	3.0	3.5	2.7	2.3	3.0	2.6
M08-354011HOLL-35	3.5	3.5	3.6	3.1	4.1	3.9	3.3	3.4	2.9
M08-362051HOLL-4	4.5	4.1	4.1	3.4	5.2	5.9	3.8	5.0	4.1
M08-362051HOLL-5	4.3	3.6	4.2	4.4	5.3	5.5	3.4	4.0	4.0
M08-362051HOLL-7	6.8	4.3	3.4	4.0	6.0	24.3	3.5	4.0	4.7
M18-193017	5.1	5.1	4.1	4.2	6.0	7.1	3.8	5.3	5.4
M18-201022	7.0	5.1	5.9	4.6	6.0	16.8	5.6	5.9	6.0
MSC09-774074HO-4	2.7	2.7	3.2	2.0	3.1	3.3	2.3	2.1	2.6

**UNIFORM TEST I TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLENIC (%)**

Strain	Mean 8 Tests	Ames IA	Wanatah IN	West Lafayette IN	East Lansing MI	Saginaw MI	Lamber- ton MN	Rose- Mount MN	Waseca MN
MN1511CN (SCN) (I)	8.1	7.8	7.2	7.5	8.8	8.9	7.6	9.0	8.2
MN1905CN (L)	6.7	6.8	6.4	6.1	7.4	6.8	6.3	6.9	6.5
A18302-39	5.8	5.1	5.1	5.4	6.7	5.5	5.5	6.5	6.2
M05-209037HO-4	3.3	3.8	2.5	3.6	3.4	3.9	3.4	2.9	2.6
M05-363022HO-6	3.7	3.5	3.4	3.4	4.3	3.8	3.7	4.0	3.8
M08-354011HOLL-35	2.2	2.0	2.0	2.0	2.6	2.4	2.3	2.3	2.3
M08-362051HOLL-4	2.7	2.4	2.4	2.6	2.6	2.9	2.5	3.0	3.1
M08-362051HOLL-5	3.0	2.8	3.0	2.5	2.7	3.1	3.5	3.3	3.1
M08-362051HOLL-7	2.9	2.3	2.6	2.3	2.6	4.9	2.9	3.2	2.7
M18-193017	5.2	5.5	4.8	5.1	5.7	6.0	2.8	5.7	5.7
M18-201022	2.4	2.2	1.8	2.0	2.3	3.5	2.4	2.4	2.5
MSC09-774074HO-4	3.6	3.5	3.3	3.3	3.7	3.9	3.5	3.9	3.6

**Northern Regional Uniform Test  
Uniform Test II, Traited Material, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	IA2102 (II)	A04-545045	AgriPro 98180-A0	Cai	12	F4	
2	U14-910097 (SCN) (L)	U09-105007	LD07-3419	Graef	6	F6	SCN, HR, MR, IDC
3	AG17XF2 (E)			Cai	2		RR2, Xtend Flex
4	AG25XF3			Cai	Initial		RR2, Xtend Flex
5	A18304-10	A14058-33	A14054-63	Singh	Initial	F5	HOLL
6	A18304-35	A14058-33	A14054-63	Singh	Initial	F5	HOLL, SCN
7	A18304-75	A14058-33	A14054-63	Singh	Initial	F5	HOLL
8	A18328-22Y	A14056-187	A14004-58	Singh	Initial	F5	Protein, Large Seeded
9	A18328-60Y	A14056-187	A14004-58	Singh	Initial	F5	Protein, Large Seeded
10	E20195	E16826	U12-909109R	Wang	1	F5	High Oleic, Rps1k
11	E20316T	NE3400	E11128T	Wang	1	F5	High Protein
12	E20394	E17805-12	LD13-13228R1a	Wang	Initial	F5	SCN, Rps1, high oleic
13	E21062T	E16901T	E14077	Wang	1	F5	high protein, SCN, Rps1
14	E21326GT	E17801-08	U12-909109R	Wang	Initial	F5	SCN, Rps1, high oleic, RR
15	E22036T	E11128T	Lai 2	Wang	Initial	F5	SCN, Rps1, high protein
16	E22061	BARC-6	DF 227 N	Wang	Initial	F5	SCN, Rps1, high protein
17	E22121	E14077	E18902	Wang	Initial	F5	SCN, Rps1, high oleic
18	E22122	E14077	E18902	Wang	Initial	F5	SCN, Rps1, high oleic
19	E22163	DF 227 N	E19828	Wang	Initial	F5	SCN, Rps1, high oleic
20	E22169	DF 227 N	E19857	Wang	Initial	F5	SCN, Rps1, high oleic
21	E22186	E18907	E14077	Wang	Initial	F5	SCN, Rps1, high oleic
22	E22254	DF 227 N	E19857	Wang	Initial	F5	SCN, Rps1, high oleic
23	E22296	E15351	E18171-16	Wang	Initial	F5	SCN, Rps1, high oleic
24	LD20-12206	LD16-10150 x LD15-5776793	LD16-10150 x LD15-3818	Monteverde	1	F4	HOLL, SCN
25	LD21-100211	LD13-6678(4)	HOLL Donor Parent	Monteverde	1	F3	HOLL, SCN
26	LD21-3904	LD11-2170	LDX18-245-2-4	Monteverde	Initial	F4	HOLL, SCN
27	LD21-3906	LD11-2170	LDX18-245-2-4	Monteverde	Initial	F4	HOLL, SCN
28	LD21-7822	LD16-10150 x U14-108007	LD16-10150 x LD11-2170	Monteverde	Initial	F4	HOLL, SCN
29	LD21-7914	LD16-10150 x LD11-2170	LD16-10150 x LD15-5776793	Monteverde	Initial	F4	HOLL, SCN
30	LD21-8536	SA13-1363 (4) x KB13-15 F3 14-224	LD16-10150 x LD11-2170	Monteverde	Initial	F4	HOLL, SCN

UNIFORM TEST II TRAITED MATERIAL, 2024

DESCRIPTIVE AND DISEASE DATA

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Strain	Descriptive Code
IA2102 (II)	WGTDYYI
U14-910097 (SCN) (L)	PGTDYBfI
AG17XF2 (E)	PLtBDYBI
AG25XF3	PGBDYIbI
A18304-10	PGTDYYI
A18304-35	PGTDYYI
A18304-75	PGTDYYI
A18328-22Y	P+WGBDYYI
A18328-60Y	WGBDYYI
E20195	WTTDYBI
E20316T	PGTSYHI
E20394	PTBDYBrI
E21062T	P+WLtTSYI
E21326GT	PTBDYBrI
E22036T	PGTSYI
E22061	PTB+TSYBI
E22121	PLtBDYBI
E22122	PLtB+TDYBI
E22163	PGTDYHI
E22169	PLtTSYBrI
E22186	PTTDYBI
E22254	PLtTSYHI
E22296	WGBDYBfI
LD20-12206	PLtBDYHI
LD21-100211	PLtBDYBI
LD21-3904	PLtBDYHI
LD21-3906	PLtBDYBI
LD21-7822	PLtBDYYI
LD21-7914	PLtBDYGI
LD21-8536	PT+LtBDYBI

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**UNIFORM TEST II TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	7 bu/a	7 No.	6 Date	7 Score	6 In.	6 g/100	6 Score	Protein 6 %	Oil 6 %
IA2102 (II)	66.3	9	9/14	2.4	37	16.3	1.5	34.5	19.4
U14-910097 (SCN) (L)	74.5	1	6.7	2.0	34	14.7	1.1	32.5	20.7
AG17XF2 (E)	60.8	25	-5.2	1.0	33	15.8	1.3	34.4	19.9
AG25XF3	69.5	5	4.7	1.0	37	15.2	1.3	33.7	18.7
A18304-10	65.3	14	-2.8	1.5	34	15.7	1.3	35.1	20.0
A18304-35	65.9	12	-2.9	1.2	33	16.3	1.1	35.0	19.8
A18304-75	66.3	8	-2.6	1.6	34	16.2	1.3	35.2	19.9
A18328-22Y	64.2	18	-2.0	1.2	31	17.1	1.3	35.8	19.4
A18328-60Y	68.9	6	2.9	1.2	37	18.0	1.3	36.3	18.9
E20195	61.0	24	2.8	1.6	32	16.2	1.2	34.3	19.5
E20316T	66.2	10	4.6	1.7	37	16.3	1.3	36.4	19.2
E20394	58.5	28	0.7	2.3	40	14.8	1.0	36.4	19.6
E21062T	64.4	17	-0.8	1.3	34	16.8	1.6	35.4	19.5
E21326GT	58.2	29	4.4	2.0	39	13.9	1.2	35.3	19.3
E22036T	60.2	26	3.6	1.5	37	20.2	1.3	36.4	18.4
E22061	63.3	20	5.8	1.3	35	15.2	1.3	37.8	17.7
E22121	62.6	21	5.3	1.5	37	17.6	1.9	35.2	18.9
E22122	63.7	19	2.6	1.4	37	17.3	1.4	35.2	19.4
E22163	61.4	23	3.5	1.1	37	14.0	1.4	35.7	19.2
E22169	64.5	16	2.5	1.6	36	14.3	1.0	35.5	19.6
E22186	59.8	27	3.6	1.8	37	15.2	1.6	34.2	19.7
E22254	57.5	30	1.3	2.0	37	14.5	1.3	37.2	19.1
E22296	64.7	15	3.7	2.0	41	14.5	1.3	35.7	19.4
LD20-12206	70.8	2	2.2	1.1	33	16.5	1.4	34.8	20.3
LD21-100211	65.9	11	3.4	1.1	31	15.0	1.5	35.0	20.2
LD21-3904	70.7	3	1.5	1.1	34	14.4	1.1	34.6	20.5
LD21-3906	69.9	4	3.5	1.3	36	14.3	1.2	34.4	20.6
LD21-7822	65.3	13	2.3	1.0	34	13.2	1.5	35.6	20.1
LD21-7914	62.4	22	1.5	1.0	28	15.3	1.4	34.6	20.2
LD21-8536	68.1	7	5.5	1.1	31	14.5	1.3	35.4	19.1
Mean	64.7			1.5	35.0	15.6	1.3	35.3	19.6
C.V. (%)	8.1								
L.S.D. (5%)	3.2								

122.0 Days After Planting

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	12 bu/a	12 No.	12 Date	13 Score	12 In.	11 g/100	11 Score	Protein %	Oil %
IA2102 (II)	66.1	5	9/17	2.8	37	17.1	1.5	34.5	19.5
U14-910097 (SCN) (L)	70.9	2	6.1	2.5	35	15.8	1.3	33.2	20.5
AG17XF2 (E)	62.5	8	-5.3	1.6	34	16.7	1.3	34.3	19.9
E20195	63.1	7	2.7	2.1	33	17.0	1.5	34.7	19.3
E20316T	68.1	3	4.7	2.1	38	17.3	1.4	36.6	19.0
E21062T	65.4	6	0.0	1.6	34	17.4	1.6	35.5	19.4
LD20-12206	71.0	1	2.4	1.6	34	17.5	1.5	35.4	19.9
LD21-100211	66.6	4	3.0	1.6	32	15.7	1.6	35.2	20.1

125.6 Days After Planting

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**YIELD (bu/a)**

Strain	Mean 7 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	66.3	85.0	51.0	63.5	66.4	71.6	71.4	64.0
U14-910097 (SCN) (L)	74.5	100.0	59.3	80.1	70.2	86.4	66.5	67.6
AG17XF2 (E)	60.8	76.6	47.6	55.7	58.4	66.4	67.0	62.9
AG25XF3	69.5	88.6	49.8	65.9	70.6	84.0	77.4	57.5
A18304-10	65.3	88.6	49.6	61.1	61.4	69.2	71.6	64.2
A18304-35	65.9	90.0	48.8	62.1	59.7	76.8	72.0	60.6
A18304-75	66.3	84.7	48.6	65.2	64.1	62.1	74.0	74.3
A18328-22Y	64.2	85.1	51.5	56.3	69.7	70.7	71.4	53.4
A18328-60Y	68.9	86.9	48.7	65.9	70.8	74.5	72.7	71.5
E20195	61.0	78.8	40.1	62.6	61.8	70.2	64.7	57.6
E20316T	66.2	85.3	46.2	61.7	67.8	76.0	72.5	63.0
E20394	58.5	71.7	43.2	57.2	58.2	67.7	66.8	53.7
E21062T	64.4	83.4	52.7	63.2	64.7	67.1	69.1	59.7
E21326GT	58.2	72.8	46.7	61.5	57.3	67.0	58.7	52.7
E22036T	60.2	77.3	39.6	56.4	61.1	71.6	64.8	59.7
E22061	63.3	83.6	50.9	60.4	58.8	73.6	68.0	56.8
E22121	62.6	76.2	44.2	57.6	67.1	74.2	66.3	62.0
E22122	63.7	78.3	43.0	62.2	67.9	76.0	68.3	59.2
E22163	61.4	76.8	46.3	58.2	57.7	74.2	65.0	60.6
E22169	64.5	85.1	53.1	63.0	62.0	75.5	63.7	58.2
E22186	59.8	74.7	38.3	56.9	62.8	69.3	65.8	59.7
E22254	57.5	72.1	42.6	59.3	60.0	62.9	64.0	50.4
E22296	64.7	79.3	50.1	67.8	64.9	76.7	69.1	54.0
LD20-12206	70.8	87.4	58.8	66.8	74.2	82.8	75.0	59.5
LD21-100211	65.9	81.8	49.3	73.8	62.0	77.4	76.2	50.0
LD21-3904	70.7	84.2	56.0	74.1	70.1	82.4	73.6	63.5
LD21-3906	69.9	81.9	59.0	72.7	69.4	78.0	72.2	65.1
LD21-7822	65.3	82.4	51.3	64.9	64.5	81.0	64.7	57.1
LD21-7914	62.4	73.9	47.6	58.1	59.3	78.5	71.3	56.9
LD21-8536	68.1	75.3	54.7	69.5	74.5	80.5	72.4	58.4
Location Mean		81.6	48.9	63.4	64.6	74.1	69.2	59.8
C.V. (%)		7.7	7.7	6.4	9.0	5.8	5.4	8.1
L.S.D. (5%)		10.2	7.7	8.3	11.9	8.8	7.7	9.9
Row sp. (In.)		30	30	30	30	30	15	15
Rows/Plot		4	4	4	4	4	6	6
Reps		3	2	2	2	2	2	2

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**YIELD RANK**

Strain	Yield Rank	Ames IA	Mon-mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	9	10	10	12	12	20	12	6
U14-910097 (SCN) (L)	1	1	1	1	5	1	21	3
AG17XF2 (E)	25	23	20	30	27	28	19	9
AG25XF3	5	3	13	8	4	2	1	21
A18304-10	14	4	14	20	21	24	11	5
A18304-35	12	2	16	17	24	10	10	12
A18304-75	8	11	18	10	16	30	4	1
A18328-22Y	18	8	8	29	7	21	13	27
A18328-60Y	6	6	17	9	3	15	6	2
E20195	24	19	28	15	20	22	26	20
E20316T	10	7	23	18	10	13	7	8
E20394	28	30	25	26	28	25	20	26
E21062T	17	14	7	13	14	26	15	15
E21326GT	29	28	21	19	30	27	30	28
E22036T	26	21	29	28	22	19	25	13
E22061	20	13	11	21	26	18	18	24
E22121	21	24	24	25	11	16	22	10
E22122	19	20	26	16	9	12	17	17
E22163	23	22	22	23	29	16	24	11
E22169	16	8	6	14	18	14	29	19
E22186	27	26	30	27	17	23	23	13
E22254	30	29	27	22	23	29	28	29
E22296	15	18	12	6	13	11	16	25
LD20-12206	2	5	3	7	2	3	3	16
LD21-100211	11	17	15	3	18	9	2	30
LD21-3904	3	12	4	2	6	4	5	7
LD21-3906	4	16	2	4	8	8	9	4
LD21-7822	13	15	9	11	15	5	27	22
LD21-7914	22	27	19	24	25	7	14	23
LD21-8536	7	25	5	5	1	6	8	18

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**MATURITY (date)**

Strain	Mean 6 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	9/14	9/20	9/15	9/15	9/1	9/8		9/30
U14-910097 (SCN) (L)	7	6	4	9	9	9		4
AG17XF2 (E)	-5	-10	0	-3	-4	-6		-9
AG25XF3	5	4	2	7	6	7		3
A18304-10	-3	-5	1	-1	-3	-3		-6
A18304-35	-3	-4	0	-4	-3	-3		-4
A18304-75	-3	-5	1	-1	-2	-4		-6
A18328-22Y	-2	-6	1	-1	-2	-2		-4
A18328-60Y	3	1	2	5	3	3		5
E20195	3	1	2	4	3	5		3
E20316T	5	3	3	5	7	6		5
E20394	1	-4	0	2	3	1		2
E21062T	-1	-3	1	3	0	-3		-3
E21326GT	4	-1	3	7	7	5		5
E22036T	4	4	2	5	4	4		4
E22061	6	4	2	9	8	7		5
E22121	5	1	2	8	8	8		5
E22122	3	-1	1	5	4	5		2
E22163	4	2	1	5	5	3		7
E22169	2	-1	1	6	4	3		3
E22186	4	2	1	5	5	6		4
E22254	1	-2	1	3	4	1		1
E22296	4	0	2	6	6	7		1
LD20-12206	2	0	1	5	2	3		3
LD21-100211	3	0	0	7	6	5		3
LD21-3904	1	-3	0	3	2	4		4
LD21-3906	3	-3	4	7	5	5		3
LD21-7822	2	-1	1	6	3	2		3
LD21-7914	2	-2	-1	4	4	4		1
LD21-8536	5	3	4	8	8	7		4
Date Planted	5/15	5/19	5/16	5/22	5/6	5/8		5/24
Days to Mature	122	124	122	116	118	123		129

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**LODGING (score)**

Strain	Mean 7 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	2.4	3.0	1.5	2.5	2.0	3.0	2.5	2.5
U14-910097 (SCN) (L)	2.0	1.7	1.8	2.5	2.0	2.0	2.0	2.0
AG17XF2 (E)	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
AG25XF3	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
A18304-10	1.5	1.3	1.0	1.5	1.5	2.5	1.5	1.0
A18304-35	1.2	1.0	1.5	1.0	1.0	2.0	1.0	1.0
A18304-75	1.6	2.0	1.0	1.0	2.0	2.0	1.5	1.5
A18328-22Y	1.2	1.3	1.0	1.0	1.0	2.0	1.0	1.0
A18328-60Y	1.2	1.0	1.3	1.5	1.0	1.0	1.0	1.5
E20195	1.6	2.0	1.3	2.0	2.0	2.0	1.0	1.0
E20316T	1.7	2.3	1.3	1.5	2.0	2.0	1.0	2.0
E20394	2.3	3.0	1.8	1.5	2.0	3.5	2.0	2.0
E21062T	1.3	1.0	1.3	1.0	1.0	2.0	1.5	1.0
E21326GT	2.0	2.7	1.0	2.0	2.0	3.0	2.0	1.5
E22036T	1.5	2.0	1.8	1.5	1.0	1.5	1.0	2.0
E22061	1.3	1.3	1.0	1.0	1.0	2.0	1.5	1.5
E22121	1.5	1.3	1.3	1.0	1.5	1.5	2.0	2.0
E22122	1.4	1.0	1.3	1.0	1.5	2.0	1.0	2.0
E22163	1.1	1.0	1.0	1.0	1.0	1.0	1.0	2.0
E22169	1.6	1.3	1.8	1.0	2.0	2.0	1.5	1.5
E22186	1.8	2.0	1.3	1.0	2.0	2.0	3.0	1.0
E22254	2.0	2.7	1.3	1.0	2.5	2.5	2.5	1.5
E22296	2.0	3.0	1.3	1.0	2.0	2.5	2.5	2.0
LD20-12206	1.1	1.0	1.3	1.5	1.0	1.0	1.0	1.0
LD21-100211	1.1	1.0	1.5	1.0	1.0	1.0	1.0	1.0
LD21-3904	1.1	1.0	1.0	1.0	1.0	1.5	1.0	1.5
LD21-3906	1.3	1.0	1.3	1.0	1.5	2.0	1.0	1.5
LD21-7822	1.0	1.0	1.3	1.0	1.0	1.0	1.0	1.0
LD21-7914	1.0	1.0	1.0	1.0	1.0	1.0	1.0	1.0
LD21-8536	1.1	1.0	1.3	1.0	1.5	1.0	1.0	1.0

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 6 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	37	36		37	34	38	39	39
U14-910097 (SCN) (L)	34	35		34	32	35	33	34
AG17XF2 (E)	33	35		31	32	34	35	34
AG25XF3	37	39		37	36	39	37	36
A18304-10	34	35		34	31	34	35	35
A18304-35	33	34		31	34	34	32	32
A18304-75	34	35		35	33	33	34	35
A18328-22Y	31	33		30	31	31	33	31
A18328-60Y	37	38		39	35	36	37	38
E20195	32	35		33	31	34	27	31
E20316T	37	36		38	35	38	38	38
E20394	40	33		42	39	40	42	42
E21062T	34	33		33	33	34	37	33
E21326GT	39	35		40	37	38	41	42
E22036T	37	38		37	33	38	35	39
E22061	35	37		35	32	37	37	35
E22121	37	39		37	37	36	36	37
E22122	37	37		38	37	40	36	39
E22163	37	38		36	34	37	39	40
E22169	36	36		36	34	38	34	38
E22186	37	38		36	36	37	40	36
E22254	37	35		39	37	39	39	35
E22296	41	37		42	40	42	44	43
LD20-12206	33	34		32	31	33	35	32
LD21-100211	31	33		33	29	33	28	30
LD21-3904	34	36		36	34	36	32	33
LD21-3906	36	36		37	35	37	34	38
LD21-7822	34	35		34	32	37	32	35
LD21-7914	28	29		28	26	29	29	30
LD21-8536	31	31		31	31	32	33	29

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**SEED SIZE (g/100)**

Strain	Mean 6 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	16.3	17.5		16.5	14.2	16.7	17.3	15.5
U14-910097 (SCN) (L)	14.7	15.3		15.7	12.1	15.7	15.0	14.3
AG17XF2 (E)	15.8	16.1		15.9	14.7	16.9	16.4	14.5
AG25XF3	15.2	15.9		15.9	13.3	16.2	15.8	14.2
A18304-10	15.7	17.0		15.5	14.2	16.4	15.6	15.5
A18304-35	16.3	17.7		16.2	14.0	17.6	16.8	15.2
A18304-75	16.2	17.5		16.1	14.4	17.0	16.2	16.0
A18328-22Y	17.1	19.0		18.1	16.6	15.6	17.6	15.5
A18328-60Y	18.0	18.9		19.5	15.6	17.7	18.6	17.9
E20195	16.2	17.4		16.0	13.9	16.1	17.9	16.0
E20316T	16.3	17.9		16.8	14.5	15.6	17.0	15.8
E20394	14.8	15.5		15.0	12.9	15.5	16.0	13.8
E21062T	16.8	17.2		17.5	15.3	18.0	17.7	15.1
E21326GT	13.9	14.5		14.4	11.3	15.0	14.9	13.0
E22036T	20.2	21.4		20.9	16.2	20.2	21.8	20.7
E22061	15.2	16.4		15.0	12.9	16.6	16.3	14.0
E22121	17.6	18.5		18.2	15.1	18.0	19.3	16.4
E22122	17.3	17.7		17.7	14.8	18.1	18.4	16.8
E22163	14.0	15.0		14.6	11.9	14.2	14.8	13.2
E22169	14.3	15.0		14.5	12.4	14.8	15.4	13.5
E22186	15.2	15.8		15.5	12.5	16.1	17.1	14.4
E22254	14.5	15.2		15.5	13.5	15.0	14.5	13.1
E22296	14.5	15.3		15.1	12.2	15.5	15.5	13.5
LD20-12206	16.5	17.6		16.7	15.3	17.3	16.7	15.2
LD21-100211	15.0	16.1		15.4	12.8	15.0	16.4	14.4
LD21-3904	14.4	14.6		15.6	12.0	15.3	15.0	13.8
LD21-3906	14.3	14.5		14.5	12.7	14.6	15.4	14.0
LD21-7822	13.2	14.0		13.4	11.2	13.7	14.4	12.7
LD21-7914	15.3	16.4		16.0	14.0	15.0	15.7	14.7
LD21-8536	14.5	15.4		14.6	12.7	14.9	14.9	14.6

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**SEED QUALITY (score)**

Strain	Mean 6 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	1.5	1.0		2.0	2.0	1.0	2.0	1.0
U14-910097 (SCN) (L)	1.1	1.0		1.0	1.0	1.0	1.5	1.0
AG17XF2 (E)	1.3	1.0		2.0	1.0	1.0	1.0	1.5
AG25XF3	1.3	1.0		1.0	1.0	1.5	1.0	2.0
A18304-10	1.3	1.0		1.0	1.0	1.5	1.5	1.5
A18304-35	1.1	1.0		1.0	1.0	1.5	1.0	1.0
A18304-75	1.3	1.0		2.0	2.0	1.0	1.0	1.0
A18328-22Y	1.3	1.0		2.0	1.0	1.0	1.5	1.0
A18328-60Y	1.3	1.0		2.0	1.0	1.0	2.0	1.0
E20195	1.2	1.0		2.0	1.0	1.0	1.0	1.0
E20316T	1.3	1.0		1.0	1.5	1.0	1.5	1.5
E20394	1.0	1.0		1.0	1.0	1.0	1.0	1.0
E21062T	1.6	1.0		2.0	2.5	1.0	2.0	1.0
E21326GT	1.2	1.0		1.0	1.5	1.0	1.0	1.5
E22036T	1.3	1.0		2.0	1.0	1.0	2.0	1.0
E22061	1.3	1.0		2.0	1.0	1.5	1.0	1.5
E22121	1.9	1.0		2.0	1.0	2.5	3.0	2.0
E22122	1.4	1.0		2.0	1.0	1.5	2.0	1.0
E22163	1.4	1.0		2.0	1.5	1.0	1.0	2.0
E22169	1.0	1.0		1.0	1.0	1.0	1.0	1.0
E22186	1.6	1.0		2.0	1.0	2.0	2.0	1.5
E22254	1.3	1.0		2.0	1.0	1.0	2.0	1.0
E22296	1.3	1.3		1.0	1.0	1.0	1.5	2.0
LD20-12206	1.4	1.0		1.0	1.0	2.0	2.0	1.5
LD21-100211	1.5	1.0		2.0	2.0	1.0	2.0	1.0
LD21-3904	1.1	1.0		1.0	1.0	1.0	1.5	1.0
LD21-3906	1.2	1.0		1.0	1.0	1.0	1.5	1.5
LD21-7822	1.5	1.0		2.0	1.5	1.0	2.0	1.5
LD21-7914	1.4	1.0		2.0	2.0	1.0	1.5	1.0
LD21-8536	1.3	1.0		2.0	1.0	1.0	1.5	1.0

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**PROTEIN (%)**

Strain	Mean 6 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	34.5	35.4	34.2	34.2	34.0	34.3		35.0
U14-910097 (SCN) (L)	32.5	32.8	33.1	32.0	32.6	32.6		32.1
AG17XF2 (E)	34.4	34.0	35.7	34.8	33.4	34.8		33.9
AG25XF3	33.7	33.1	34.5	34.3	34.3	33.6		32.6
A18304-10	35.1	35.1	35.0	34.9	34.7	35.8		34.8
A18304-35	35.0	34.3	36.7	34.5	34.1	35.4		35.2
A18304-75	35.2	34.9	35.5	34.9	35.1	34.8		35.9
A18328-22Y	35.8	35.8	36.1	35.4	34.8	36.3		36.2
A18328-60Y	36.3	35.3	36.9	36.0	36.6	35.8		37.4
E20195	34.3	34.8	34.5	33.2	34.3	34.4		34.5
E20316T	36.4	36.3	36.5	35.8	35.9	36.7		37.4
E20394	36.4	36.6	36.6	36.1	36.3	37.3		35.8
E21062T	35.4	34.4	35.7	35.5	35.7	35.7		35.3
E21326GT	35.3	36.0	35.6	35.6	34.4	35.1		35.5
E22036T	36.4	36.6	37.3	35.7	36.2	35.4		37.5
E22061	37.8	37.8	35.0	38.4	38.0	39.5		37.8
E22121	35.2	34.9	35.7	35.0	34.5	35.6		35.5
E22122	35.2	34.6	34.7	34.9	35.5	35.8		36.0
E22163	35.7	36.0	35.0	35.8	34.7	36.2		36.3
E22169	35.5	35.3	35.3	36.0	34.6	34.7		37.2
E22186	34.2	34.2	34.0	34.3	34.4	34.4		33.9
E22254	37.2	37.6	36.9	38.0	37.0	37.3		36.8
E22296	35.7	35.9	35.5	35.6	35.2	36.4		35.4
LD20-12206	34.8	35.1	35.1	33.1	35.0	35.1		35.6
LD21-100211	35.0	36.2	35.0	35.8	34.9	34.3		33.9
LD21-3904	34.6	34.8	34.2	35.5	34.1	34.1		34.8
LD21-3906	34.4	34.5	34.1	34.4	34.0	34.0		35.7
LD21-7822	35.6	34.9	35.6	34.9	35.7	36.1		36.3
LD21-7914	34.6	34.6	34.8	34.4	34.1	35.8		34.4
LD21-8536	35.4	35.4	35.2	35.2	35.1	35.5		36.2

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**OIL (%)**

Strain	Mean 6 Tests	Ames IA	Mon- mouth IL	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	19.4	19.0	20.6	19.5	19.4	19.6		18.4
U14-910097 (SCN) (L)	20.7	20.8	21.7	21.0	20.3	20.4		20.3
AG17XF2 (E)	19.9	19.8	20.5	20.1	20.2	19.7		19.1
AG25XF3	18.7	18.6	19.9	18.7	18.4	18.4		18.4
A18304-10	20.0	19.7	20.9	20.2	20.2	19.7		19.4
A18304-35	19.8	19.8	19.6	20.1	20.3	20.1		19.3
A18304-75	19.9	19.5	20.7	20.2	20.0	20.3		18.9
A18328-22Y	19.4	18.9	20.1	19.8	19.6	19.1		18.9
A18328-60Y	18.9	18.7	19.8	18.9	18.9	19.2		18.0
E20195	19.5	18.3	20.2	20.0	19.9	19.6		19.1
E20316T	19.2	18.8	20.0	19.5	19.6	19.1		18.2
E20394	19.6	19.4	20.1	19.8	19.5	19.4		19.2
E21062T	19.5	19.5	20.3	19.5	19.2	19.7		19.1
E21326GT	19.3	18.8	19.9	19.0	19.9	19.6		18.6
E22036T	18.4	18.1	18.9	19.1	18.5	18.6		17.6
E22061	17.7	17.2	20.8	17.4	17.1	16.9		17.1
E22121	18.9	18.5	19.5	19.0	19.1	18.8		18.6
E22122	19.4	19.8	20.6	19.4	19.3	18.9		18.7
E22163	19.2	18.5	20.3	19.2	19.8	19.1		18.1
E22169	19.6	19.1	20.2	19.7	20.0	20.2		18.7
E22186	19.7	19.1	20.5	19.5	19.8	19.6		19.7
E22254	19.1	18.5	19.7	19.0	19.3	19.0		19.2
E22296	19.4	19.0	20.0	19.6	19.7	19.2		19.2
LD20-12206	20.3	20.0	21.1	20.3	20.6	20.6		19.4
LD21-100211	20.2	19.7	20.2	19.9	20.4	20.3		20.5
LD21-3904	20.5	20.7	21.5	20.4	21.0	21.2		18.4
LD21-3906	20.6	20.4	21.1	20.7	21.0	20.6		19.7
LD21-7822	20.1	20.3	20.4	20.7	19.9	20.0		19.6
LD21-7914	20.2	19.8	21.1	20.5	20.8	20.0		19.3
LD21-8536	19.1	19.2	19.5	19.3	19.3	19.0		18.4

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

No. of Tests Strain	Palmitic 6 %	Stearic 6 %	Oleic 6 %	Linoleic 6 %	Linolenic 6 %
IA2102 (II)	11.3	4.6	21.5	53.7	8.9
U14-910097 (SCN) (L)	10.9	4.4	24.2	53.0	7.5
A18304-10	10.8	4.5	27.6	49.5	7.6
A18304-35	10.9	4.4	27.9	48.8	7.9
A18304-75	10.8	4.5	26.7	50.3	7.8
E20195	4.4	3.3	80.5	9.5	2.3
E20394	7.0	4.0	78.7	7.0	3.4
E21326GT	6.4	4.4	78.4	6.0	4.7
E22121	6.1	4.2	78.5	8.4	2.8
E22122	7.0	4.0	77.8	8.1	3.1
E22163	4.7	3.3	80.0	9.0	3.0
E22169	5.9	3.5	79.6	7.8	3.1
E22186	4.5	3.8	80.8	8.6	2.3
E22254	6.6	3.9	79.3	8.1	2.1
E22296	6.3	3.9	79.6	7.6	2.6
LD20-12206	7.0	3.5	83.4	3.9	2.3
LD21-100211	6.2	3.2	84.1	4.0	2.4
LD21-3904	7.1	3.7	83.2	3.8	2.2
LD21-3906	7.0	3.8	82.9	4.1	2.2
LD21-7822	7.4	3.6	82.5	4.2	2.4
LD21-7914	6.3	3.7	84.4	3.4	2.2
LD21-8536	7.3	3.6	82.0	4.6	2.6
Mean	7.4	3.9	68.3	16.5	3.9

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**FATTY ACID, PALMITIC (%)**

Strain	Mean 6 Tests	Ames IA	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	11.3	11.2	11.5	11.4	11.4	11.3	10.9
U14-910097 (SCN) (L)	10.9	11.3	11.1	11.1	10.7	10.9	10.3
A18304-10	10.8	10.9	10.8	11.0	10.7	10.5	10.7
A18304-35	10.9	10.7	10.9	10.9	11.0	11.0	11.0
A18304-75	10.8	10.7	10.8	10.9	10.4	10.9	10.8
E20195	4.4	3.8	4.0	7.3	3.6	3.8	3.8
E20394	7.0	7.2	6.9	7.0	6.7	6.9	7.0
E21326GT	6.4	6.6	5.3	5.2	6.8	7.2	7.3
E22121	6.1	5.7	6.2	5.4	6.4	7.0	6.3
E22122	7.0	7.4	7.2	5.8	6.9	7.2	7.4
E22163	4.7	4.8	4.5	4.7	4.7	5.0	4.7
E22169	5.9	5.4	6.0	6.2	5.2	6.5	6.2
E22186	4.5	4.6	4.4	4.3	4.5	4.5	4.6
E22254	6.6	6.8	6.0	6.9	6.5	6.9	6.7
E22296	6.3	6.7	5.2	7.0	6.4	5.8	6.8
LD20-12206	7.0	7.1	6.8	7.0	6.8	7.1	7.1
LD21-100211	6.2	6.5	6.0	6.4	6.2	6.4	5.7
LD21-3904	7.1	7.2	7.0	7.1	6.9	7.2	7.1
LD21-3906	7.0	7.0	6.9	6.9	6.8	7.1	7.1
LD21-7822	7.4	7.6	7.4	7.1	7.3	7.4	7.4
LD21-7914	6.3	6.4	6.3	6.3	6.4	6.1	6.0
LD21-8536	7.3	7.7	7.1	7.4	7.2	7.2	7.2

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**FATTY ACID, STEARIC (%)**

Strain	Mean 6 Tests	Ames IA	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	4.6	4.2	4.1	4.4	4.0	5.6	5.3
U14-910097 (SCN) (L)	4.4	4.1	4.1	4.3	3.8	5.5	4.7
A18304-10	4.5	3.9	4.2	4.6	4.3	5.5	4.7
A18304-35	4.4	4.0	4.1	4.1	4.1	5.5	4.6
A18304-75	4.5	4.0	4.2	4.6	4.2	4.9	5.1
E20195	3.3	3.0	3.0	4.1	3.1	3.6	3.2
E20394	4.0	3.5	3.6	3.9	3.2	5.1	4.4
E21326GT	4.4	4.2	3.9	4.0	3.9	5.6	4.8
E22121	4.2	4.0	4.1	4.3	4.2	4.4	4.3
E22122	4.0	3.9	3.8	3.5	3.7	4.9	4.1
E22163	3.3	3.0	3.1	3.3	3.0	3.8	3.5
E22169	3.5	3.0	3.1	3.5	3.3	4.0	4.1
E22186	3.8	3.6	3.8	3.8	3.4	4.4	3.9
E22254	3.9	3.7	3.7	4.0	3.4	4.4	4.1
E22296	3.9	4.0	3.8	3.8	3.7	4.2	3.8
LD20-12206	3.5	3.3	3.1	3.7	3.0	3.8	3.9
LD21-100211	3.2	2.9	3.1	3.6	3.0	3.3	3.1
LD21-3904	3.7	3.1	3.4	3.9	3.3	4.0	4.2
LD21-3906	3.8	3.6	3.4	3.9	3.5	4.5	4.1
LD21-7822	3.6	3.4	3.4	4.0	3.2	3.8	3.6
LD21-7914	3.7	3.5	3.4	4.0	3.3	4.1	3.9
LD21-8536	3.6	3.9	3.2	3.6	3.1	3.8	4.0

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**FATTY ACID, OLEIC (%)**

Strain	Mean 6 Tests	Ames IA	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	21.5	23.0	21.0	21.0	20.7	22.0	21.4
U14-910097 (SCN) (L)	24.2	25.3	24.1	23.8	24.8	23.5	23.4
A18304-10	27.6	29.1	26.2	26.4	29.7	28.4	25.6
A18304-35	27.9	32.3	28.3	24.5	30.3	26.8	25.2
A18304-75	26.7	30.0	26.9	25.2	28.6	24.5	24.9
E20195	80.5	82.4	81.5	77.7	82.7	80.1	79.0
E20394	78.7	78.9	79.5	80.1	81.6	75.9	76.2
E21326GT	78.4	79.0	80.9	81.3	80.6	74.4	74.3
E22121	78.5	80.1	79.0	80.3	79.4	76.1	76.1
E22122	77.8	77.7	78.7	81.2	79.1	75.0	75.4
E22163	80.0	80.9	82.1	80.7	81.9	77.3	77.1
E22169	79.6	81.4	80.9	79.7	82.4	76.5	76.8
E22186	80.8	81.7	81.1	82.4	82.6	78.2	78.6
E22254	79.3	79.9	80.8	80.0	81.4	77.4	76.1
E22296	79.6	78.9	81.0	82.8	79.6	77.7	77.4
LD20-12206	83.4	83.6	84.5	83.0	84.6	82.4	81.9
LD21-100211	84.1	84.0	84.9	83.3	84.7	83.7	84.1
LD21-3904	83.2	83.3	83.7	83.4	84.0	82.7	82.0
LD21-3906	82.9	83.4	83.5	82.9	83.8	82.1	81.8
LD21-7822	82.5	82.8	82.8	82.3	83.4	82.5	81.0
LD21-7914	84.4	84.9	84.8	84.3	84.6	84.2	83.7
LD21-8536	82.0	76.2	83.9	82.6	84.0	83.0	82.3

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLEIC (%)**

Strain	Mean 6 Tests	Ames IA	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	53.7	53.2	54.5	54.3	55.1	52.2	53.0
U14-910097 (SCN) (L)	53.0	52.0	53.2	53.5	53.6	52.4	53.5
A18304-10	49.5	48.8	50.4	50.4	48.1	48.4	51.0
A18304-35	48.8	45.7	48.6	52.0	47.2	48.7	50.6
A18304-75	50.3	48.0	50.1	51.1	50.0	51.3	51.1
E20195	9.5	8.6	9.2	8.3	8.5	10.4	11.7
E20394	7.0	7.0	6.4	5.8	5.5	8.2	8.9
E21326GT	6.0	6.2	5.2	4.7	4.1	7.7	8.3
E22121	8.4	5.3	8.4	7.9	7.8	9.9	10.9
E22122	8.1	8.5	6.8	6.7	6.9	10.5	9.4
E22163	9.0	7.6	7.5	8.7	7.3	11.0	11.5
E22169	7.8	7.4	6.9	8.1	6.5	9.1	9.1
E22186	8.6	7.9	8.3	7.3	7.4	10.4	10.4
E22254	8.1	7.5	7.4	7.1	6.7	9.2	10.8
E22296	7.6	7.7	8.3	4.1	7.2	9.7	8.7
LD20-12206	3.9	3.9	3.4	4.1	3.5	4.3	4.5
LD21-100211	4.0	4.1	3.6	4.3	3.8	3.9	4.5
LD21-3904	3.8	4.1	3.8	3.5	3.8	3.6	4.2
LD21-3906	4.1	3.8	4.2	4.1	3.9	3.9	4.6
LD21-7822	4.2	3.9	4.2	4.3	3.9	3.9	5.2
LD21-7914	3.4	3.0	3.4	3.3	3.6	3.4	4.0
LD21-8536	4.6	9.2	3.4	3.9	3.4	3.5	3.9

**UNIFORM TEST II TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLENIC (%)**

Strain	Mean 6 Tests	Ames IA	Urbana IL	Wanatah IN	West Lafayette IN	Britton MI	East Lansing MI
IA2102 (II)	8.9	8.4	8.9	8.9	8.8	8.8	9.3
U14-910097 (SCN) (L)	7.5	7.3	7.4	7.3	7.2	7.7	8.0
A18304-10	7.6	7.4	8.4	7.5	7.3	7.1	7.9
A18304-35	7.9	7.2	8.1	8.5	7.4	7.9	8.6
A18304-75	7.8	7.3	8.0	8.1	6.8	8.4	8.1
E20195	2.3	2.2	2.2	2.6	2.1	2.2	2.3
E20394	3.4	3.4	3.5	3.1	3.0	3.8	3.6
E21326GT	4.7	3.9	4.6	4.8	4.6	5.1	5.3
E22121	2.8	4.9	2.4	2.2	2.2	2.7	2.4
E22122	3.1	2.6	3.6	2.8	3.4	2.4	3.7
E22163	3.0	3.6	2.7	2.6	3.1	2.9	3.2
E22169	3.1	2.8	3.1	2.6	2.6	3.9	3.8
E22186	2.3	2.3	2.4	2.1	2.1	2.5	2.6
E22254	2.1	2.1	2.1	2.0	2.0	2.2	2.3
E22296	2.6	2.7	1.8	2.3	3.1	2.6	3.4
LD20-12206	2.3	2.2	2.1	2.2	2.0	2.4	2.6
LD21-100211	2.4	2.5	2.4	2.4	2.3	2.6	2.5
LD21-3904	2.2	2.2	2.2	2.1	2.0	2.4	2.5
LD21-3906	2.2	2.2	2.1	2.1	2.0	2.4	2.5
LD21-7822	2.4	2.4	2.3	2.2	2.2	2.5	2.9
LD21-7914	2.2	2.2	2.1	2.1	2.1	2.2	2.4
LD21-8536	2.6	3.1	2.4	2.5	2.3	2.5	2.7

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**Northern Regional Uniform Test  
Uniform Test III, Traited Material, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	LD11-2170 (III)	LD11-2170 (III)	Syngenta 03JR313108	Monteverde	9	F5	SCN, Rps1k
2	LD18-6596	U11-616086	LD11-2170	Monteverde	Initial	F5	SCN, Rps1k
3	AG25XF3 (E)			Cai	Initial		RR2, Xtend Flex
4	AG37XF1 (L)			Cai	Initial		RR2, Xtend Flex
5	A16336-119	IA3051HS x LD07-3395bf (SCN)	U11-911079	Singh	1	F5	Sugar, Rps1k
6	LD19-22127	LD12-3903 x LDX16-241-2-2	LD11-2170 x LDX16-234-1-5	Monteverde	23 PT III TM	F4	HOLL, SCN
7	LD20-12214	LD16-10150 x LD15-5776793	LD16-10150 x LD15-3818	Monteverde	1	F4	HOLL, SCN
8	LD20-12217	LD16-10150 x LD15-5776793	LD16-10150 x LD15-3818	Monteverde	1	F4	HOLL, SCN
9	LD20-8968	LD12-3903 x LDX16-237-1-2	LD12-459 x LDX16-216-1-2	Monteverde	1	F5	HOLL, SCN, Rps1c
10	LD20-9131	LD12-3903 x LDX16-241-2-2	LD11-2170 x LDX16-234-1-5	Monteverde	1	F5	HOLL, SCN, Rps1k
11	LD21-100207	LD13-6678(4)	HOLL Donor Parent	Monteverde	23 PT III TM	F3	HOLL, SCN
12	LD21-3214	HOLL 04- 3	HOLL 11- 6	Monteverde	Initial	F4	HOLL, SCN
13	LD21-3429	HOLL 15-1	HOLL 20-12	Monteverde	Initial	F4	HOLL, SCN
14	LD21-3593	LD15-5776793	LDX18-256-2-2	Monteverde	Initial	F4	HOLL, SCN
15	LD21-7953	LD16-10150 x LD11-2170	LD16-10150 x LD15-5776793	Monteverde	Initial	F4	HOLL, SCN
16	LD21-8716	LD16-10159 x U14-924158	LDX17-351-1-3 x LD14-3702	Monteverde	Initial	F4	HOLL, SCN
17	LD21-9470	LD16-10150 x LD15-5776793	LD16-10150 x LD15-3818	Monteverde	Initial	F4	HOLL, SCN
18	LD23-20706-5	21FieldPop237-1	LDX21-244-1	Monteverde	Initial	F4	Low Stachyose, HOLL, SCN
19	LD23-20801-1	21FieldPop240-1	LDX21-243-5	Monteverde	Initial	F4	Low Stachyose, HOLL, SCN
20	SA19-23535	SA13-1363	KB13-15 F3 14-224	Scaboo	23 PT III TM		Rhg1-b, Rdc3
21	SA21-11508	SA18-350PR	LD11-2170	Scaboo	23 PT III TM		
22	U15-606207 (SCN)	LD07-3419	U09-105007	Graef	4	F5	SCN (HR, HR), Rps6
23	U19-604203	U14-910097	LD11-2170	Graef	23 SCN III	F5	Rps1k, SCN

UNIFORM TEST III TRAITED MATERIAL, 2024

DESCRIPTIVE AND DISEASE DATA

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Strain	Descriptive Code
LD11-2170 (III)	PLtBDYBrI
LD18-6596	WLtBDYYI
AG25XF3 (E)	PGBDYIbI
AG37XF1 (L)	PGBDYIbI
A16336-119	WGTSYYI
LD19-22127	PLtBSYHI
LD20-12214	PLtBDYBI
LD20-12217	PLtBDYBI
LD20-8968	PGBSYBfI
LD20-9131	P+WLtBDYBrI
LD21-100207	PLtBDYBI
LD21-3214	PLtBDYBrI
LD21-3429	PLtBDYGI
LD21-3593	PLtBDYGI
LD21-7953	PLtBDYBI
LD21-8716	PLtBDYGI
LD21-9470	PLtBDYBI
LD23-20706-5	PLtBDYBI
LD23-20801-1	PLtBDYBI
SA19-23535	WLtTDYBrI
SA21-11508	PTBDYBI
U15-606207 (SCN)	PGTDYBfI
U19-604203	PLtBSYBrI

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**UNIFORM TEST III TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant	Seed	Seed	<u>Composition</u>	
	7 bu/a	7 No.	7 Date	8 Score	7 In.	7 g/100	7 Score	8 Protein %	8 Oil %
LD11-2170 (III)	82.2	4	9/20	1.3	34	16.0	1.1	33.9	20.7
LD18-6596	82.4	2	3.0	1.5	34	15.4	1.3	32.9	20.4
AG25XF3 (E)	76.3	17	-0.4	1.3	36	16.0	1.1	33.8	19.0
AG37XF1 (L)	81.5	6	7.0	1.6	41	17.0	1.3	35.3	19.1
A16336-119	74.2	20	0.5	1.6	33	19.3	1.1	34.2	20.0
LD19-22127	79.0	10	-0.1	1.6	33	13.0	1.1	34.5	20.3
LD20-12214	78.8	11	2.4	1.2	32	16.9	1.3	35.4	20.0
LD20-12217	77.5	15	1.5	1.1	32	17.8	1.3	35.5	19.7
LD20-8968	78.7	12	2.7	1.6	37	15.0	1.1	34.5	20.3
LD20-9131	79.9	9	-1.1	1.5	32	14.2	1.0	34.5	20.3
LD21-100207	72.3	23	-1.3	1.3	31	14.8	1.0	34.4	20.6
LD21-3214	77.2	16	0.9	1.3	34	15.4	1.0	35.0	20.5
LD21-3429	81.8	5	4.8	1.3	32	16.9	1.2	35.0	20.3
LD21-3593	78.4	13	2.0	1.2	33	14.6	1.1	34.3	19.3
LD21-7953	75.5	18	0.7	1.1	33	14.8	1.1	34.6	20.7
LD21-8716	75.2	19	-1.9	1.5	33	16.3	1.4	36.2	19.9
LD21-9470	81.3	7	1.1	1.2	31	16.9	1.1	34.7	20.3
LD23-20706-5	78.2	14	0.6	1.3	31	14.4	1.2	35.4	20.1
LD23-20801-1	81.1	8	0.5	1.4	33	15.3	1.1	34.5	20.2
SA19-23535	72.5	22	4.4	1.6	35	13.0	1.3	34.3	20.6
SA21-11508	73.9	21	5.4	1.7	38	13.8	1.1	34.3	20.5
U15-606207 (SCN)	82.3	3	2.1	1.5	36	15.9	1.0	31.8	21.2
U19-604203	84.5	1	2.9	1.6	36	14.8	1.2	33.2	20.6
Mean	78.5			1.4	33.9	15.5	1.2	34.4	20.2
C.V. (%)	6.9								
L.S.D. (5%)	3.3								

121.3 Days After Planting

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	14 bu/a	14 No.	14 Date	15 Score	14 In.	14 g/100	14 Score	15 %	15 %
LD11-2170 (III)	77.7	1	9/21	1.3	34	15.9	1.3	34.2	20.5
A16336-119	72.2	7	1.2	1.5	33	19.0	1.3	34.6	19.8
LD20-12214	75.0	4	3.1	1.3	31	16.8	1.4	35.4	19.8
LD20-12217	74.2	6	2.3	1.1	32	18.1	1.4	35.7	19.5
LD20-8968	76.8	3	3.3	1.5	37	14.7	1.2	34.6	20.1
LD20-9131	75.0	5	-0.8	1.4	32	14.1	1.3	34.9	20.1
U15-606207 (SCN)	77.2	2	2.9	1.4	35	15.9	1.2	32.5	20.8

122.6 Days After Planting

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**YIELD (bu/a)**

Strain	Mean 7 Tests	Ames IA	Perry IL*	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	82.2	88.9	44.6	80.3	87.2	73.6	83.2	84.2	80.8
LD18-6596	82.4	87.0	41.2	76.0	93.4	76.8	86.1	79.2	80.8
AG25XF3 (E)	76.3	84.1	37.7	68.4	86.5	76.4	73.8	79.2	68.8
AG37XF1 (L)	81.5	85.3	46.9	76.5	89.4	84.4	85.7	78.3	73.9
A16336-119	74.2	77.2	34.1	74.0	86.6	73.7	73.9	71.0	66.0
LD19-22127	79.0	84.2	43.7	80.5	85.9	76.6	82.4	77.4	68.7
LD20-12214	78.8	82.1	46.7	74.7	86.0	75.4	82.9	77.5	75.8
LD20-12217	77.5	86.7	35.0	69.0	85.9	68.8	84.3	76.8	74.0
LD20-8968	78.7	79.6	47.3	75.8	81.6	80.7	87.4	70.1	78.2
LD20-9131	79.9	93.3	41.7	77.6	82.7	72.4	81.0	82.6	72.3
LD21-100207	72.3	75.6	43.5	69.3	80.7	69.5	77.6	67.6	68.7
LD21-3214	77.2	83.9	39.6	72.3	83.9	72.3	80.8	75.1	74.6
LD21-3429	81.8	87.6	46.5	81.5	95.9	69.3	86.2	74.2	80.9
LD21-3593	78.4	88.4	36.6	73.5	84.1	70.6	85.2	83.2	66.9
LD21-7953	75.5	78.0	49.0	71.0	86.7	77.6	76.6	77.7	63.8
LD21-8716	75.2	83.5	52.8	68.4	82.4	76.1	77.3	73.9	67.4
LD21-9470	81.3	96.5	54.6	78.4	90.2	76.8	82.9	74.8	72.3
LD23-20706-5	78.2	87.3	41.3	74.8	82.9	75.8	81.3	78.3	69.5
LD23-20801-1	81.1	87.8	53.9	75.1	87.1	84.4	83.9	82.3	70.0
SA19-23535	72.5	76.2	33.7	72.6	74.0	72.6	76.5	68.9	69.6
SA21-11508	73.9	81.7	49.8	73.8	84.4	68.7	76.5	63.3	71.8
U15-606207 (SCN)	82.3	81.0	41.9	79.4	93.3	78.3	85.6	80.2	81.1
U19-604203	84.5	94.2	52.6	82.9	84.4	86.5	86.9	80.0	79.5
Location Mean		84.8	44.1	75.0	85.9	75.5	81.6	76.3	72.8
C.V. (%)		5.1	19.3	4.4	5.8	10.1	4.1	6.2	8.1
L.S.D. (5%)		7.1	17.8	6.8	10.3	15.9	6.9	7.8	9.7
Row sp. (In.)		30	30	30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4	4	4
Reps		3	2	2	2	2	2	3	3

\* Data not included in mean.

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**YIELD RANK**

Strain	Yield Rank	Ames IA	Perry IL	Urbana IL	Butler-ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	4	4	11	4	6	15	10	1	4
LD18-6596	2	9	17	9	2	7	4	8	3
AG25XF3 (E)	17	13	19	22	10	10	23	7	17
AG37XF1 (L)	6	11	8	8	5	2	5	9	10
A16336-119	20	21	22	14	9	14	22	19	22
LD19-22127	10	12	12	3	13	9	13	13	19
LD20-12214	11	16	9	13	11	13	12	12	7
LD20-12217	15	10	21	21	12	22	8	14	9
LD20-8968	12	19	7	10	21	4	1	20	6
LD20-9131	9	3	15	7	19	17	15	3	12
LD21-100207	23	23	13	20	22	20	17	22	18
LD21-3214	16	14	18	18	17	18	16	15	8
LD21-3429	5	7	10	2	1	21	3	17	2
LD21-3593	13	5	20	16	16	19	7	2	21
LD21-7953	18	20	6	19	8	6	19	11	23
LD21-8716	19	15	3	23	20	11	18	18	20
LD21-9470	7	1	1	6	4	7	11	16	11
LD23-20706-5	14	8	16	12	18	12	14	10	16
LD23-20801-1	8	6	2	11	7	2	9	4	14
SA19-23535	22	22	23	17	23	16	20	21	15
SA21-11508	21	17	5	15	14	23	20	23	13
U15-606207 (SCN)	3	18	14	5	3	5	6	5	1
U19-604203	1	2	4	1	14	1	2	6	5

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**MATURITY (date)**

Strain	Mean 7 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	9/20	9/24		9/26	9/16	9/9	9/16	9/19	10/6
LD18-6596	3	2		5	4	4	3	2	1
AG25XF3 (E)	-0	-0		-2	0	-1	-1	1	0
AG37XF1 (L)	7	4		8	7	10	10	8	2
A16336-119	0	-0		-2	2	2	1	2	-1
LD19-22127	-0	0		-1	2	-1	-2	0	1
LD20-12214	2	2		2	5	4	1	2	1
LD20-12217	1	1		2	2	2	2	3	0
LD20-8968	3	4		2	5	4	3	1	0
LD20-9131	-1	-1		-1	-1	-4	-2	-0	0
LD21-100207	-1	-4		-2	-1	-1	-1	-0	0
LD21-3214	1	1		0	2	3	1	1	0
LD21-3429	5	4		5	7	5	6	2	5
LD21-3593	2	3		2	1	3	3	3	0
LD21-7953	1	-1		0	2	3	-1	1	0
LD21-8716	-2	-4		-1	-1	-4	-3	1	-2
LD21-9470	1	0		1	2	2	1	2	0
LD23-20706-5	1	1		1	1	1	0	1	0
LD23-20801-1	0	1		0	3	-1	-2	2	0
SA19-23535	4	3		4	6	7	7	4	1
SA21-11508	5	4		5	7	7	7	4	4
U15-606207 (SCN)	2	0		1	4	4	2	2	2
U19-604203	3	3		5	4	4	4	2	0
Date Planted	5/22	5/19		5/22	5/30	5/6	5/8	5/30	6/12
Days to Mature	121	128		127	109	126	131	112	116

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**LODGING (score)**

Strain	Mean 8 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	1.3	1.0	1.5	1.0	1.5	1.0	1.0	2.2	1.5
LD18-6596	1.5	1.0	1.0	1.5	1.5	2.0	1.0	1.7	2.0
AG25XF3 (E)	1.3	1.0	1.0	1.0	1.5	1.5	1.5	1.7	1.5
AG37XF1 (L)	1.6	1.3	1.0	1.0	2.5	1.0	1.0	3.3	1.5
A16336-119	1.6	1.0	1.0	1.0	3.0	1.0	1.5	2.8	1.5
LD19-22127	1.6	1.0	1.0	1.0	2.5	2.0	2.0	2.0	1.5
LD20-12214	1.2	1.0	1.0	1.0	1.0	1.5	1.0	1.5	1.5
LD20-12217	1.1	1.0	1.0	1.0	1.0	1.0	1.0	1.3	1.5
LD20-8968	1.6	1.0	1.5	1.0	3.0	1.0	1.0	2.5	2.0
LD20-9131	1.5	1.0	1.0	1.0	2.0	2.0	2.0	1.5	1.5
LD21-100207	1.3	1.0	1.0	1.0	1.0	1.5	1.0	2.0	1.5
LD21-3214	1.3	1.0	1.0	1.0	1.0	1.5	2.0	1.5	1.5
LD21-3429	1.3	1.0	1.0	1.5	2.0	1.0	1.0	1.7	1.5
LD21-3593	1.2	1.0	1.0	1.0	1.0	1.0	1.0	1.3	2.0
LD21-7953	1.1	1.0	1.0	1.0	1.0	1.0	1.0	1.5	1.5
LD21-8716	1.5	1.0	1.0	1.0	1.5	1.5	2.0	1.8	2.0
LD21-9470	1.2	1.0	1.0	1.0	1.5	1.0	1.0	1.7	1.5
LD23-20706-5	1.3	1.0	1.0	1.0	1.5	1.0	1.5	1.5	1.5
LD23-20801-1	1.4	1.0	1.0	1.0	1.5	1.5	2.0	2.0	1.5
SA19-23535	1.6	1.3	1.0	1.0	3.5	2.0	1.0	1.5	1.5
SA21-11508	1.7	1.0	1.0	2.0	2.0	1.5	2.0	2.8	1.5
U15-606207 (SCN)	1.5	1.0	1.0	1.0	1.5	1.5	2.0	1.7	2.0
U19-604203	1.6	1.0	1.0	1.0	2.5	2.0	1.5	2.3	1.5

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 7 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	34.4	37		36	35	34	36	35	29
LD18-6596	33.9	37		32	36	34	36	33	30
AG25XF3 (E)	35.8	38		38	39	36	35	35	30
AG37XF1 (L)	41.1	45		40	45	40	42	40	37
A16336-119	32.9	35		34	34	32	34	33	30
LD19-22127	32.8	35		33	36	33	33	32	28
LD20-12214	31.5	33		32	33	28	34	33	29
LD20-12217	32.5	36		33	33	30	34	32	30
LD20-8968	36.6	40		37	39	36	41	35	29
LD20-9131	32.3	36		32	34	32	33	32	29
LD21-100207	30.9	31		33	32	31	33	31	26
LD21-3214	33.8	37		35	34	34	36	34	29
LD21-3429	31.8	35		33	34	30	34	31	26
LD21-3593	33.4	36		36	35	34	35	34	25
LD21-7953	33.1	35		34	36	33	35	34	26
LD21-8716	33.4	35		35	36	32	34	32	30
LD21-9470	31.0	34		31	33	30	32	30	27
LD23-20706-5	31.4	34		33	33	31	34	31	26
LD23-20801-1	32.9	36		34	34	34	34	31	29
SA19-23535	34.6	41		34	37	33	36	34	28
SA21-11508	38.1	41		39	41	39	39	37	33
U15-606207 (SCN)	35.8	38		37	38	35	37	35	32
U19-604203	35.5	37		36	36	37	36	34	34

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**SEED SIZE (g/100)**

Strain	Mean 7 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	16.0	15.9		17.1	16.1	13.8	16.1	15.8	17.2
LD18-6596	15.4	15.9		15.7	16.4	13.5	15.4	14.6	16.4
AG25XF3 (E)	16.0	15.2		16.6	16.1	14.4	16.7	16.4	16.8
AG37XF1 (L)	17.0	16.9		17.5	18.1	15.2	17.0	16.4	17.8
A16336-119	19.3	19.4		19.8	21.2	16.9	19.7	19.6	18.4
LD19-22127	13.0	12.6		13.6	13.4	11.0	13.5	13.0	14.0
LD20-12214	16.9	16.9		17.8	16.9	14.9	17.2	16.2	18.1
LD20-12217	17.8	18.4		14.4	19.6	15.2	18.6	18.5	20.2
LD20-8968	15.0	15.7		15.1	16.4	12.8	15.0	14.9	14.8
LD20-9131	14.2	14.0		14.2	14.7	12.2	15.2	14.5	14.7
LD21-100207	14.8	14.8		15.3	15.4	12.9	15.3	14.9	15.2
LD21-3214	15.4	14.6		15.7	18.6	13.0	15.2	14.9	15.8
LD21-3429	16.9	17.5		18.3	13.8	14.6	17.9	17.8	18.6
LD21-3593	14.6	15.0		15.2	15.4	12.0	14.9	14.1	15.7
LD21-7953	14.8	14.2		14.9	15.5	14.0	15.0	14.5	15.3
LD21-8716	16.3	16.1		16.7	16.5	14.7	16.9	16.9	16.5
LD21-9470	16.9	17.0		17.3	17.6	14.6	16.0	16.8	18.9
LD23-20706-5	14.4	14.7		14.7	14.1	12.4	15.6	14.8	14.7
LD23-20801-1	15.3	15.5		15.7	15.7	14.2	14.9	15.7	15.7
SA19-23535	13.0	13.5		13.1	13.0	11.4	13.1	13.5	13.2
SA21-11508	13.8	14.1		14.1	14.6	11.9	13.6	13.6	15.0
U15-606207 (SCN)	15.9	15.1		16.2	16.4	14.0	15.8	15.6	18.0
U19-604203	14.8	14.7		15.5	14.9	12.8	14.9	14.6	16.4

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**SEED QUALITY (score)**

Strain	Mean 7 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	1.1	1.0		2.0	1.0	1.0	1.0	1.0	1.0
LD18-6596	1.3	1.0		2.0	1.0	1.5	1.0	1.0	1.5
AG25XF3 (E)	1.1	1.0		2.0	1.0	1.0	1.0	1.0	1.0
AG37XF1 (L)	1.3	1.7		2.0	1.0	1.5	1.0	1.0	1.0
A16336-119	1.1	1.0		2.0	1.0	1.0	1.0	1.0	1.0
LD19-22127	1.1	1.0		1.0	1.0	1.0	1.0	1.0	1.5
LD20-12214	1.3	1.0		2.0	1.0	1.5	1.0	1.0	1.5
LD20-12217	1.3	1.3		2.0	1.0	1.0	1.0	1.0	1.5
LD20-8968	1.1	1.0		1.0	1.5	1.0	1.0	1.0	1.0
LD20-9131	1.0	1.0		1.0	1.0	1.0	1.0	1.0	1.0
LD21-100207	1.0	1.0		1.0	1.0	1.0	1.0	1.0	1.0
LD21-3214	1.0	1.0		1.0	1.0	1.0	1.0	1.0	1.0
LD21-3429	1.2	1.0		2.0	1.0	1.0	1.0	1.0	1.5
LD21-3593	1.1	1.0		1.0	1.0	2.0	1.0	1.0	1.0
LD21-7953	1.1	1.0		1.0	1.5	1.0	1.0	1.0	1.0
LD21-8716	1.4	1.0		2.0	2.0	1.0	1.5	1.0	1.0
LD21-9470	1.1	1.0		1.0	1.0	1.0	1.0	1.0	1.5
LD23-20706-5	1.2	1.0		1.0	1.5	2.0	1.0	1.0	1.0
LD23-20801-1	1.1	1.0		1.0	1.5	1.0	1.0	1.0	1.5
SA19-23535	1.3	1.0		2.0	2.0	1.0	1.0	1.0	1.0
SA21-11508	1.1	1.0		1.0	2.0	1.0	1.0	1.0	1.0
U15-606207 (SCN)	1.0	1.0		1.0	1.0	1.0	1.0	1.0	1.0
U19-604203	1.2	1.0		2.0	1.5	1.0	1.0	1.0	1.0

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**PROTEIN (%)**

Strain	Mean 8 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	33.9	34.3	34.4	33.0	34.1	34.0	34.5	34.1	33.1
LD18-6596	32.9	33.2	33.1	33.1	33.8	32.9	32.7	33.0	31.6
AG25XF3 (E)	33.8	32.8	33.1	33.8	34.6	34.2	34.2	34.7	33.3
AG37XF1 (L)	35.3	35.4	33.8	36.2	35.8	36.6	34.9	35.2	34.4
A16336-119	34.2	34.5	34.1	34.1	34.9	34.5	33.8	35.7	32.4
LD19-22127	34.5	34.9	33.7	35.2	34.8	33.7	34.7	34.9	34.0
LD20-12214	35.4	36.1	34.5	35.7	36.2	35.8	35.4	35.4	34.3
LD20-12217	35.5	35.3	35.2	36.3	35.9	35.6	35.2	35.6	35.0
LD20-8968	34.5	35.1	33.8	34.6	35.9	34.7	33.9	35.0	32.8
LD20-9131	34.5	34.7	33.5	34.7	35.0	35.1	35.1	34.6	33.7
LD21-100207	34.4	35.0	33.5	34.3	34.6	34.6	34.2	35.2	34.0
LD21-3214	35.0	35.5	33.4	34.9	35.9	35.2	35.1	35.1	35.0
LD21-3429	35.0	35.1	33.6	35.5	35.3	35.7	35.6	36.0	33.1
LD21-3593	34.3	34.5	34.0	34.7	34.2	34.1	34.9	34.0	33.9
LD21-7953	34.6	34.7	33.5	34.8	35.4	34.9	35.6	34.7	33.6
LD21-8716	36.2	37.0	34.0	36.3	37.2	36.2	37.1	36.4	35.5
LD21-9470	34.7	35.0	33.1	35.2	35.5	35.7	34.4	35.5	33.4
LD23-20706-5	35.4	35.1	33.6	34.7	35.6	35.1	35.0	35.3	38.5
LD23-20801-1	34.5	33.6	32.7	35.2	34.9	35.0	35.9	35.2	33.7
SA19-23535	34.3	35.5	33.0	34.8	34.4	33.7	34.8	35.3	32.7
SA21-11508	34.3	34.4	33.1	35.0	34.8	34.4	34.3	35.2	33.3
U15-606207 (SCN)	31.8	31.4	32.4	31.8	32.1	31.0	32.1	33.3	30.3
U19-604203	33.2	32.1	33.8	33.8	33.7	33.2	33.4	34.2	31.6

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**OIL (%)**

Strain	Mean 8 Tests	Ames IA	Perry IL	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	20.7	20.1	21.7	20.7	20.8	20.3	20.2	20.9	20.8
LD18-6596	20.4	20.0	21.7	20.3	20.2	19.4	20.0	20.8	20.8
AG25XF3 (E)	19.0	18.7	21.1	18.5	19.1	18.4	18.5	18.8	18.9
AG37XF1 (L)	19.1	18.4	21.7	18.3	19.3	17.7	18.8	19.3	19.3
A16336-119	20.0	19.3	21.0	19.6	19.9	19.6	19.8	19.8	20.8
LD19-22127	20.3	19.9	21.5	19.7	20.5	20.2	20.1	20.1	20.3
LD20-12214	20.0	19.5	21.1	19.8	19.9	19.5	20.2	20.1	20.2
LD20-12217	19.7	19.1	20.5	19.4	20.0	19.3	19.3	20.0	19.9
LD20-8968	20.3	19.8	21.4	20.3	20.3	19.3	19.8	20.6	20.7
LD20-9131	20.3	19.6	21.5	20.0	20.6	19.9	20.3	20.4	20.5
LD21-100207	20.6	20.1	22.0	20.3	20.9	20.1	20.4	20.6	20.8
LD21-3214	20.5	19.9	21.8	20.3	20.7	20.0	20.2	20.8	20.6
LD21-3429	20.3	20.1	22.0	20.0	20.5	19.5	20.4	20.0	20.4
LD21-3593	19.3	19.0	20.3	19.0	19.3	18.9	18.9	19.7	19.5
LD21-7953	20.7	20.0	22.1	20.2	20.9	20.6	20.3	20.7	20.7
LD21-8716	19.9	19.1	21.7	19.5	19.6	19.8	19.5	20.0	20.0
LD21-9470	20.3	19.7	21.9	20.1	20.3	19.8	20.1	20.2	20.6
LD23-20706-5	20.1	19.5	21.3	19.7	20.5	19.8	19.5	19.7	20.5
LD23-20801-1	20.2	20.0	21.9	19.6	20.6	19.5	19.7	20.1	20.4
SA19-23535	20.6	20.3	21.8	20.5	21.1	19.6	20.5	20.5	20.9
SA21-11508	20.5	20.1	21.8	19.8	20.6	19.9	20.4	20.8	20.6
U15-606207 (SCN)	21.2	21.0	22.4	20.7	21.3	20.9	20.7	20.8	21.7
U19-604203	20.6	20.2	21.9	20.2	20.7	19.8	20.1	20.7	21.1

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

No. of Tests Strain	Palmitic 7 %	Stearic 7 %	Oleic 7 %	Linoleic 7 %	Linolenic 7 %
LD11-2170 (III)	11.1	4.1	25.7	52.1	7.1
LD18-6596	11.6	4.1	21.9	54.9	7.5
LD19-22127	7.1	3.4	81.7	5.4	2.4
LD20-12214	6.7	3.6	84.3	3.3	2.1
LD20-12217	6.9	3.7	83.9	3.4	2.1
LD20-8968	6.9	3.5	83.6	3.8	2.3
LD20-9131	6.9	3.5	83.2	4.1	2.3
LD21-100207	6.1	3.1	84.7	3.8	2.3
LD21-3214	7.0	3.6	83.9	3.5	2.1
LD21-3429	6.8	3.6	84.0	3.6	2.1
LD21-3593	6.6	4.3	84.0	3.0	2.1
LD21-7953	6.1	3.4	85.3	3.2	2.0
LD21-8716	7.2	3.4	83.4	3.7	2.3
LD21-9470	6.3	3.3	84.9	3.4	2.1
LD23-20706-5	6.4	3.5	84.3	3.7	2.1
LD23-20801-1	6.5	4.0	84.2	3.2	2.0
SA19-23535	6.9	3.5	83.3	4.0	2.3
SA21-11508	6.9	3.6	83.8	3.5	2.2
Mean	7.2	3.6	77.2	9.2	2.7

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**FATTY ACID, PALMITIC (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	11.1	11.5	10.6	11.1	11.0	11.1	11.4	10.7
LD18-6596	11.6	11.6	12.0	11.8	11.6	11.2	11.7	11.5
LD19-22127	7.1	7.3	7.3	7.2	6.7	6.9	7.2	7.2
LD20-12214	6.7	6.9	6.6	6.9	6.6	6.5	7.1	6.2
LD20-12217	6.9	6.9	6.7	7.2	7.1	6.9	7.0	6.4
LD20-8968	6.9	7.1	6.7	7.0	7.0	6.6	6.9	6.6
LD20-9131	6.9	7.1	6.7	7.0	7.1	6.6	7.0	6.9
LD21-100207	6.1	6.1	6.1	6.6	5.9	5.8	6.1	5.8
LD21-3214	7.0	7.2	6.8	7.1	6.9	6.9	7.3	6.7
LD21-3429	6.8	6.7	6.9	7.1	6.6	6.4	7.0	6.6
LD21-3593	6.6	6.8	6.6	6.8	6.4	6.6	6.8	6.5
LD21-7953	6.1	6.2	6.3	6.2	6.3	5.8	6.2	5.9
LD21-8716	7.2	7.2	7.1	7.3	7.2	7.2	7.2	7.3
LD21-9470	6.3	6.5	6.2	6.5	6.6	6.2	6.4	6.1
LD23-20706-5	6.4	6.5	6.4	6.5	6.2	6.4	6.4	6.3
LD23-20801-1	6.5	6.7	6.6	6.7	6.4	6.4	6.5	6.2
SA19-23535	6.9	7.2	6.9	6.9	6.7	6.7	6.8	7.0
SA21-11508	6.9	6.9	6.8	7.1	6.5	6.6	7.3	6.7

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**FATTY ACID, STEARIC (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	4.1	4.2	4.1	4.3	4.6	3.5	4.1	3.9
LD18-6596	4.1	4.1	4.3	4.1	4.1	3.9	4.2	3.9
LD19-22127	3.4	3.3	3.1	3.8	3.9	3.3	3.5	3.0
LD20-12214	3.6	3.5	3.4	3.5	4.0	3.3	3.5	3.9
LD20-12217	3.7	3.8	3.7	3.7	3.7	3.4	3.8	3.9
LD20-8968	3.5	3.6	3.3	3.8	4.1	3.2	3.6	3.2
LD20-9131	3.5	3.5	3.4	3.6	3.7	3.4	3.5	3.4
LD21-100207	3.1	3.1	2.9	3.0	3.6	3.1	3.2	3.0
LD21-3214	3.6	3.3	3.5	3.6	4.1	3.5	3.2	3.6
LD21-3429	3.6	3.6	3.5	3.6	3.9	3.4	3.6	3.4
LD21-3593	4.3	4.4	4.1	4.1	4.9	3.9	4.3	4.2
LD21-7953	3.4	3.4	3.4	3.5	3.5	3.2	3.5	3.6
LD21-8716	3.4	3.2	3.5	3.5	3.7	3.2	3.7	3.2
LD21-9470	3.3	3.4	3.2	3.2	3.7	3.2	3.4	3.3
LD23-20706-5	3.5	3.6	3.4	3.7	3.6	3.3	3.6	3.4
LD23-20801-1	4.0	4.0	3.6	3.7	4.6	3.7	4.4	4.2
SA19-23535	3.5	3.5	3.5	3.6	3.9	3.3	3.7	3.3
SA21-11508	3.6	3.4	3.5	3.6	4.0	3.3	3.7	3.6

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**FATTY ACID, OLEIC (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	25.7	25.6	25.3	26.5	26.4	23.6	25.8	26.8
LD18-6596	21.9	21.7	21.2	21.9	21.4	23.2	22.2	21.9
LD19-22127	81.7	80.8	81.7	82.6	83.2	81.9	81.3	80.4
LD20-12214	84.3	84.7	84.6	84.3	83.8	84.8	83.4	84.7
LD20-12217	83.9	83.9	84.1	83.7	83.2	83.7	83.9	84.5
LD20-8968	83.6	83.8	83.7	83.5	82.0	83.9	83.7	84.3
LD20-9131	83.2	82.9	83.4	82.4	83.1	83.7	83.3	84.0
LD21-100207	84.7	84.6	84.7	84.4	84.1	85.1	84.8	85.2
LD21-3214	83.9	84.3	84.1	84.0	82.6	84.1	83.8	84.2
LD21-3429	84.0	84.7	84.3	83.7	83.1	84.2	83.8	84.0
LD21-3593	84.0	84.1	84.2	84.0	82.8	84.6	83.7	84.7
LD21-7953	85.3	85.1	85.4	84.9	84.6	85.9	85.0	86.0
LD21-8716	83.4	83.6	83.7	83.5	82.8	83.3	83.3	83.6
LD21-9470	84.9	84.8	85.2	85.0	83.8	85.0	84.7	85.7
LD23-20706-5	84.3	84.4	83.9	84.3	83.7	84.5	84.5	85.0
LD23-20801-1	84.2	83.9	84.3	84.2	83.8	84.5	83.9	84.8
SA19-23535	83.3	83.4	83.1	83.2	83.2	82.9	83.9	83.4
SA21-11508	83.8	84.6	83.4	83.7	83.3	84.2	83.3	84.4

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLEIC (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	52.1	51.9	52.7	51.0	51.1	54.8	51.9	51.1
LD18-6596	54.9	54.9	54.9	54.5	55.3	54.9	54.5	55.1
LD19-22127	5.4	6.1	5.4	4.1	4.0	5.5	5.7	6.8
LD20-12214	3.3	2.7	3.2	3.3	3.4	3.5	3.9	3.2
LD20-12217	3.4	3.1	3.3	3.2	3.8	3.8	3.3	3.1
LD20-8968	3.8	3.2	4.0	3.4	4.4	4.1	3.6	3.7
LD20-9131	4.1	4.2	4.2	4.6	3.8	4.1	3.9	3.6
LD21-100207	3.8	3.7	4.0	3.7	4.0	3.8	3.5	3.7
LD21-3214	3.5	3.1	3.4	3.2	4.1	3.5	3.6	3.3
LD21-3429	3.6	3.0	3.2	3.5	4.2	4.0	3.5	3.7
LD21-3593	3.0	2.6	3.0	3.0	3.7	2.9	3.1	2.6
LD21-7953	3.2	3.1	2.9	3.3	3.6	3.2	3.3	2.7
LD21-8716	3.7	3.7	3.4	3.4	3.9	4.1	3.7	3.6
LD21-9470	3.4	3.2	3.4	3.2	3.9	3.6	3.3	3.0
LD23-20706-5	3.7	3.4	4.0	3.5	4.3	3.8	3.4	3.3
LD23-20801-1	3.2	3.3	3.4	3.3	3.2	3.4	3.2	2.9
SA19-23535	4.0	3.7	4.2	3.9	4.1	4.8	3.5	4.0
SA21-11508	3.5	2.9	3.9	3.4	3.8	3.7	3.5	3.2

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLENIC (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	7.1	6.7	7.2	7.1	6.9	7.1	6.8	7.5
LD18-6596	7.5	7.6	7.7	7.7	7.6	6.9	7.4	7.6
LD19-22127	2.4	2.6	2.4	2.3	2.3	2.4	2.4	2.6
LD20-12214	2.1	2.2	2.1	2.1	2.2	2.0	2.1	2.0
LD20-12217	2.1	2.2	2.1	2.1	2.2	2.1	2.0	2.1
LD20-8968	2.3	2.3	2.3	2.2	2.5	2.2	2.2	2.2
LD20-9131	2.3	2.4	2.3	2.4	2.3	2.2	2.3	2.1
LD21-100207	2.3	2.5	2.3	2.3	2.4	2.2	2.3	2.3
LD21-3214	2.1	2.1	2.1	2.1	2.2	2.0	2.0	2.1
LD21-3429	2.1	2.0	2.1	2.2	2.2	2.1	2.1	2.2
LD21-3593	2.1	2.1	2.1	2.1	2.3	2.0	2.1	2.0
LD21-7953	2.0	2.1	2.0	2.1	2.1	1.9	2.0	1.8
LD21-8716	2.3	2.3	2.3	2.3	2.3	2.3	2.2	2.3
LD21-9470	2.1	2.1	2.1	2.1	2.1	2.1	2.1	1.9
LD23-20706-5	2.1	2.1	2.2	2.1	2.2	2.0	2.0	2.0
LD23-20801-1	2.0	2.1	2.1	2.1	2.0	2.0	2.0	1.9
SA19-23535	2.3	2.3	2.3	2.3	2.2	2.3	2.1	2.3
SA21-11508	2.2	2.2	2.5	2.2	2.3	2.2	2.2	2.0

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

Strain	Sucrose	Raffinose	Stachyose	Total Sugar
	7 %	7 %	7 %	7 %
LD11-2170 (III)	3.2	1.0	3.4	7.6
LD18-6596	3.6	0.7	3.0	7.3
A16336-119	5.8	0.4	1.0	7.1
LD23-20706-5	5.6	0.6	0.6	6.8
LD23-20801-1	6.3	0.6	0.6	7.6
Mean	4.9	0.7	1.7	7.3

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**SEED SUGAR, SUCROSE (%)**

Strain	Mean	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
	7 Tests							
LD11-2170 (III)	3.2	3.8	3.1	2.9	3.2	3.7	3.0	3.0
LD18-6596	3.6	3.7	3.7	3.8	3.7	3.5	3.4	3.4
A16336-119	5.8	5.7	5.4	5.8	5.2	5.6	6.2	6.4
LD23-20706-5	5.6	6.0	5.9	4.6	5.3	5.6	6.1	5.7
LD23-20801-1	6.3	7.0	6.3	6.0	5.7	6.2	6.6	6.6

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**SEED SUGAR, RAFFINOSE (%)**

Strain	Mean	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
	7 Tests							
LD11-2170 (III)	1.0	0.7	1.0	1.0	0.9	1.2	0.9	0.9
LD18-6596	0.7	0.5	0.4	0.9	0.9	1.0	0.7	0.7
A16336-119	0.4	0.4	0.4	0.4	0.4	0.4	0.5	0.4
LD23-20706-5	0.6	0.6	0.6	0.6	0.6	0.6	0.7	0.6
LD23-20801-1	0.6	0.7	0.7	0.6	0.6	0.6	0.6	0.7

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**SEED SUGAR, STACHYOSE (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	3.4	3.3	3.1	3.5	3.5	3.7	3.5	3.2
LD18-6596	3.0	2.6	2.6	3.3	3.2	3.1	3.0	2.8
A16336-119	1.0	0.8	0.9	1.0	1.0	1.0	1.0	1.0
LD23-20706-5	0.6	0.6	0.6	0.7	0.6	0.6	0.7	0.6
LD23-20801-1	0.6	0.6	0.7	0.7	0.6	0.6	0.6	0.6

**UNIFORM TEST III TRAITED MATERIAL, 2024**

**SEED SUGAR, TOTAL (%)**

Strain	Mean 7 Tests	Ames IA	Urbana IL	Butler- ville IN	Wanatah IN	West Lafayette IN	Novelty MO	Rock Port MO
LD11-2170 (III)	7.6	7.8	7.1	7.5	7.6	8.7	7.5	7.2
LD18-6596	7.3	6.9	6.7	8.0	7.8	7.6	7.2	6.9
A16336-119	7.1	6.9	6.7	7.2	6.7	7.0	7.6	7.8
LD23-20706-5	6.8	7.2	7.1	5.9	6.5	6.8	7.5	6.9
LD23-20801-1	7.6	8.4	7.6	7.3	6.9	7.4	7.8	7.9

**Northern Regional Uniform Test  
Uniform Test IV, Traited Material, 2024**

Ent.	Strain	Parentage		Seed Source	Previous Testing	Gen. Comp.	Unique Traits
		Female	Male				
1	LD15-3818 (IV)	LD09-3913	BN09002129	Monteverde	3	F5	SCN, Rps1a
2	LD07-3395bf (SCN) (E)	LD07-3395 Reselection		Monteverde	9	F5	SCN
3	AG37XF1			Cai	Initial		RR2, Xtend Flex
4	AG42XF4 (L)			Cai	Initial		RR2, Xtend Flex
5	LD19-12943	LD12-1843 x LD16-10275	LD13-3483 x LDXGL15-012-1	Monteverde	2	F4	SCN, FA
6	LD20-12210	LD16-10150 x LD15-5776793	LD16-10150 x LD15-3818	Monteverde	Initial	F4	HOLL, SCN
7	LD20-3780	LDXGL15-008-1 x LD12-3903	LD10-9168 x LDXGL15-001-1	Monteverde	1	F5	HOLL, SCN, Rps1c
8	LD21-3549	HOLL 85- 2	HOLL 15- 1	Monteverde	Initial	F4	HOLL, SCN
9	LD21-3582	LD15-5776793	LDX18-256-2-2	Monteverde	Initial	F4	HOLL, SCN
10	LD21-8474	SA13-1363 (4) x KB13-15 F3 14-224	LD16-10150 x LD11-2170	Monteverde	Initial	F4	HOLL, SCN
11	LD21-8509	SA13-1363 (4) x KB13-15 F3 14-224	LD16-10150 x LD11-2170	Monteverde	Initial	F4	HOLL, SCN
12	LD21-9624	LDX17-345-1-5 x U14-910097	LD16-10150 x LD11-2170	Monteverde	Initial	F4	HOLL, SCN
13	SA21-10247	SA18-340PR	LD15-5776793	Scaboo	1	F5	HOLL

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**DESCRIPTIVE AND DISEASE DATA**

Strain	Descriptive Code
LD15-3818 (IV)	PLtTDYBI
LD07-3395bf (SCN) (E)	WGTDYBfi
AG37XF1	PGBDYIbI
AG42XF4 (L)	PLtBDYBI
LD19-12943	WGBDYBfi
LD20-12210	PLtTDYGI
LD20-3780	PTTSYBI
LD21-3549	PLtBDYHI
LD21-3582	PLtBDYGI
LD21-8474	PLtBDYBI
LD21-8509	PTTSYBI
LD21-9624	WT+LtB+TDYHI
SA21-10247	PLtTDYGI

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	6 bu/a	6 No.	5 Date	6 Score	5 In.	5 g/100	5 Score	6 Protein %	6 Oil %
LD15-3818 (IV)	79.1	2	9/30	1.6	37	16.2	1.4	34.6	19.9
LD07-3395bf (SCN) (E)	79.2	1	-3.8	1.5	35	16.9	1.3	31.7	21.3
AG37XF1	74.1	8	-0.2	1.8	40	17.2	1.3	35.3	19.2
AG42XF4 (L)	77.2	3	6.4	1.5	42	15.3	1.0	33.9	19.3
LD19-12943	73.9	10	0.8	1.3	38	14.5	1.3	35.5	20.0
LD20-12210	74.2	7	-1.9	1.3	32	18.2	1.3	34.4	20.5
LD20-3780	72.4	13	-2.7	1.8	39	15.1	1.1	33.9	21.0
LD21-3549	74.4	6	-1.4	1.3	32	17.2	1.2	34.3	20.0
LD21-3582	72.7	12	-3.9	1.2	33	14.8	1.0	34.2	20.1
LD21-8474	74.7	5	-1.4	1.3	35	15.2	1.0	34.7	20.1
LD21-8509	72.9	11	-1.3	1.5	36	16.0	1.2	35.0	20.1
LD21-9624	76.5	4	0.9	1.2	34	16.0	1.5	34.3	20.7
SA21-10247	74.0	9	-1.7	1.3	36	16.2	1.0	35.2	20.1
Mean	75.0			1.4	36.1	16.1	1.2	34.4	20.2
C.V. (%)	5.6								
L.S.D. (5%)	2.8								

126.8 Days After Planting

**UNIFORM TEST IV TRAITED MATERIAL, 2024****2023-2024 2-YEAR MEAN**

No. of Tests Strain	Yield	Rank	Maturity	Lodging	Plant Height	Seed Size	Seed Quality	<u>Composition</u>	
	11 bu/a	11 No.	10 Date	11 Score	10 In.	12 g/100	12 Score	12 Protein %	12 Oil %
LD15-3818 (IV)	75.4	2	9/29	1.4	36	15.6	1.5	34.3	19.9
LD07-3395bf (SCN) (E)	76.1	1	-3.0	1.5	33	16.1	1.4	32.1	21.0
LD19-12943	72.4	3	1.2	1.4	38	14.0	1.4	36.1	19.6
LD20-3780	67.1	5	-2.3	1.6	37	14.2	1.3	34.1	20.8
SA21-10247	70.8	4	-1.0	1.2	35	15.7	1.2	35.5	19.9

126.4 Days After Planting

**2022-2024 3-YEAR MEAN**

No. of Tests Strain	17	17	19	19	16	18	18	17	17
LD15-3818 (IV)	73.2	1	9/30	1.4	35	15.6	1.4	34.6	19.6
LD07-3395bf (SCN) (E)	72.7	2	-2.5	1.5	33	16.3	1.4	32.4	20.7
LD19-12943	70.5	3	1.6	1.4	37	14.2	1.4	36.3	19.4

126.9 Days After Planting

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**YIELD (bu/a)**

Strain	Mean 6 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	79.1	41.7	85.7	82.6	102.6	82.5	82.8
LD07-3395bf (SCN) (E)	79.2	45.8	81.2	85.3	102.3	84.3	79.6
AG37XF1	74.1	43.9	75.8	75.4	102.0	82.2	68.7
AG42XF4 (L)	77.2	48.8	82.3	86.9	98.7	73.2	76.5
LD19-12943	73.9	39.8	74.8	86.1	100.2	71.3	74.2
LD20-12210	74.2	35.3	72.1	90.5	98.4	71.0	80.9
LD20-3780	72.4	40.4	75.1	78.5	94.0	70.1	79.4
LD21-3549	74.4	45.6	72.6	91.7	90.8	80.2	67.0
LD21-3582	72.7	42.3	74.9	78.7	97.0	79.0	67.4
LD21-8474	74.7	43.8	72.2	87.2	99.3	78.2	70.8
LD21-8509	72.9	38.7	74.1	86.1	98.9	72.0	70.7
LD21-9624	76.5	38.2	81.6	91.4	104.0	72.9	74.1
SA21-10247	74.0	43.1	75.7	86.9	96.9	77.2	67.5
Location Mean		42.1	76.8	85.1	98.8	76.5	73.8
C.V. (%)		11.5	5.7	3.1	3.6	5.1	4.4
L.S.D. (5%)		10.5	9.5	5.7	7.9	6.6	5.5
Row sp. (In.)		30	30	30	30	30	30
Rows/Plot		4	4	4	4	4	4
Reps		2	2	2	2	3	3

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**YIELD RANK**

Strain	Yield Rank	Belle-ville IL	Urbana IL	Butler-ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	2	8	1	10	2	2	1
LD07-3395bf (SCN) (E)	1	2	4	9	3	1	3
AG37XF1	8	4	5	13	4	3	10
AG42XF4 (L)	3	1	2	5	8	8	5
LD19-12943	10	10	9	7	5	11	6
LD20-12210	7	13	13	3	9	12	2
LD20-3780	13	9	7	12	12	13	4
LD21-3549	6	3	11	1	13	4	13
LD21-3582	12	7	8	11	10	5	12
LD21-8474	5	5	12	4	6	6	8
LD21-8509	11	11	10	8	7	10	9
LD21-9624	4	12	3	2	1	9	7
SA21-10247	9	6	6	5	11	7	11

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**MATURITY (date)**

Strain	Mean 5 Tests	Belle-ville IL	Urbana IL	Butler-ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	9/30		10/6	9/23	9/28	9/26	10/9
LD07-3395bf (SCN) (E)	-4		-5	-2	-7	-4	-2
AG37XF1	-0		-1	-2	0	1	1
AG42XF4 (L)	6		5	6	9	7	6
LD19-12943	1		0	1	2	0	2
LD20-12210	-2		-3	-2	-2	-2	-1
LD20-3780	-3		-2	-4	-3	-4	-1
LD21-3549	-1		-2	-2	-5	2	-1
LD21-3582	-4		-4	-5	-5	-5	-1
LD21-8474	-1		-3	-2	-3	1	-1
LD21-8509	-1		-2	-1	-2	-1	-1
LD21-9624	1		2	-1	1	2	1
SA21-10247	-2		-3	-1	-4	-1	0
Date Planted	5/26		5/22	5/30	5/8	5/30	6/12
Days to Mature	127		137	116	143	119	119

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**LODGING (score)**

Strain	Mean 6 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	1.6	1.3	1.0	1.5	1.5	2.5	1.5
LD07-3395bf (SCN) (E)	1.5	1.3	1.0	2.0	1.0	2.0	1.5
AG37XF1	1.8	1.0	1.0	3.5	2.0	1.5	1.5
AG42XF4 (L)	1.5	1.0	1.0	1.5	2.0	1.5	2.0
LD19-12943	1.3	1.0	1.0	1.5	1.0	2.0	1.5
LD20-12210	1.3	1.3	1.0	1.0	1.0	2.0	1.5
LD20-3780	1.8	1.0	1.0	3.0	2.0	2.0	1.5
LD21-3549	1.3	1.0	1.0	1.5	1.5	1.5	1.5
LD21-3582	1.2	1.0	1.0	1.0	1.0	1.5	1.5
LD21-8474	1.3	1.0	1.0	2.0	1.0	1.5	1.5
LD21-8509	1.5	1.3	1.0	2.0	1.5	1.5	1.5
LD21-9624	1.2	1.3	1.0	1.0	1.0	1.5	1.5
SA21-10247	1.3	1.0	1.0	1.5	1.0	1.5	1.5

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**PLANT HEIGHT (inches)**

Strain	Mean 5 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	37		37	37	42	37	32
LD07-3395bf (SCN) (E)	35		36	36	39	34	32
AG37XF1	40		39	40	47	41	34
AG42XF4 (L)	42		42	44	47	43	36
LD19-12943	38		37	40	45	38	33
LD20-12210	32		31	33	34	34	29
LD20-3780	39		39	40	46	39	34
LD21-3549	32		31	36	38	30	26
LD21-3582	33		33	34	39	32	26
LD21-8474	35		34	36	43	35	30
LD21-8509	36		35	37	41	37	30
LD21-9624	34		35	35	39	33	30
SA21-10247	36		36	40	42	34	28

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**SEED SIZE (g/100)**

Strain	Mean 5 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	16.2		16.8	15.3	15.8	15.2	17.7
LD07-3395bf (SCN) (E)	16.9		16.5	16.6	16.6	16.1	18.7
AG37XF1	17.2		18.1	16.9	17.6	15.4	18.2
AG42XF4 (L)	15.3		15.6	14.5	15.4	13.5	17.5
LD19-12943	14.5		15.0	14.2	14.2	14.0	15.0
LD20-12210	18.2		18.2	17.8	18.0	17.1	19.7
LD20-3780	15.1		15.5	15.4	15.4	14.4	14.9
LD21-3549	17.2		18.4	17.8	15.9	16.5	17.4
LD21-3582	14.8		15.7	14.7	14.8	13.7	15.3
LD21-8474	15.2		14.9	15.3	15.8	14.5	15.6
LD21-8509	16.0		16.0	16.2	15.9	15.6	16.4
LD21-9624	16.0		16.8	15.8	16.2	14.8	16.4
SA21-10247	16.2		16.3	16.4	16.9	15.3	16.1

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**SEED QUALITY (score)**

Strain	Mean 5 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	1.4		2.0	1.0	2.0	1.0	1.0
LD07-3395bf (SCN) (E)	1.3		2.0	1.0	1.0	1.0	1.5
AG37XF1	1.3		2.0	1.0	1.0	1.0	1.5
AG42XF4 (L)	1.0		1.0	1.0	1.0	1.0	1.0
LD19-12943	1.3		2.0	1.0	1.0	1.0	1.5
LD20-12210	1.3		2.0	1.0	1.0	1.0	1.5
LD20-3780	1.1		1.0	1.0	1.5	1.0	1.0
LD21-3549	1.2		2.0	1.0	1.0	1.0	1.0
LD21-3582	1.0		1.0	1.0	1.0	1.0	1.0
LD21-8474	1.0		1.0	1.0	1.0	1.0	1.0
LD21-8509	1.2		2.0	1.0	1.0	1.0	1.0
LD21-9624	1.5		2.0	1.0	1.5	1.0	2.0
SA21-10247	1.0		1.0	1.0	1.0	1.0	1.0

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**PROTEIN (%)**

Strain	Mean 6 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	34.6	33.3	35.1	36.0	35.3	34.7	33.4
LD07-3395bf (SCN) (E)	31.7	31.8	30.8	33.2	31.6	32.8	30.0
AG37XF1	35.3	33.4	35.6	36.3	36.4	36.6	33.4
AG42XF4 (L)	33.9	32.7	33.9	35.4	34.0	34.8	32.5
LD19-12943	35.5	33.5	36.0	37.0	36.1	36.8	33.9
LD20-12210	34.4	33.2	34.3	35.5	35.0	34.9	33.4
LD20-3780	33.9	32.6	34.2	35.1	34.8	35.0	31.8
LD21-3549	34.3	32.9	34.5	36.1	34.2	35.5	32.7
LD21-3582	34.2	33.6	34.3	35.1	35.0	34.3	32.8
LD21-8474	34.7	33.0	35.0	35.9	35.9	35.4	33.3
LD21-8509	35.0	32.5	35.7	37.0	35.6	36.1	33.4
LD21-9624	34.3	32.9	34.8	36.1	34.7	34.9	32.2
SA21-10247	35.2	32.6	36.1	37.0	34.8	35.6	35.3

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**OIL (%)**

Strain	Mean 6 Tests	Belle- ville IL	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	19.9	21.8	19.1	20.0	18.7	19.9	20.0
LD07-3395bf (SCN) (E)	21.3	22.3	21.1	21.3	20.7	21.1	21.5
AG37XF1	19.2	21.6	18.9	19.1	17.9	18.4	19.4
AG42XF4 (L)	19.3	21.8	18.7	19.3	18.0	18.9	18.9
LD19-12943	20.0	21.7	19.4	20.0	19.2	19.3	20.3
LD20-12210	20.5	22.3	20.4	20.4	19.5	20.0	20.6
LD20-3780	21.0	22.4	20.9	20.9	20.1	20.4	21.4
LD21-3549	20.0	21.5	19.7	19.8	19.2	19.5	20.4
LD21-3582	20.1	21.3	20.0	20.3	19.0	20.0	20.3
LD21-8474	20.1	21.8	19.7	19.8	19.4	19.7	20.2
LD21-8509	20.1	22.5	19.7	19.5	19.0	19.9	20.3
LD21-9624	20.7	22.0	20.2	20.6	20.0	20.6	21.1
SA21-10247	20.1	22.5	19.4	19.9	19.6	20.2	19.3

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**REGIONAL SUMMARY - SEED COMPOSITION**

No. of Tests Strain	Palmitic 5 %	Stearic 5 %	Oleic 5 %	Linoleic 5 %	Linolenic 5 %
LD15-3818 (IV)	9.7	4.7	28.1	50.8	6.7
LD07-3395bf (SCN) (E)	10.2	3.9	25.1	53.3	7.5
LD19-12943	7.0	3.6	82.0	5.0	2.4
LD20-12210	6.5	3.6	84.2	3.7	2.1
LD20-3780	6.3	3.4	84.7	3.5	2.1
LD21-3549	7.3	3.6	83.6	3.4	2.2
LD21-3582	6.5	3.8	84.5	3.1	2.1
LD21-8474	7.2	3.4	83.5	3.6	2.3
LD21-8509	6.6	3.5	84.3	3.4	2.2
LD21-9624	6.3	3.2	84.8	3.6	2.1
SA21-10247	6.1	3.6	85.0	3.2	2.1
Mean	7.2	3.7	73.6	12.4	3.1

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**FATTY ACID, PALMITIC (%)**

Strain	Mean 5 Tests	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	9.7	9.9	9.9	9.3	10.0	9.5
LD07-3395bf (SCN) (E)	10.2	10.4	10.4	10.1	10.2	10.1
LD19-12943	7.0	7.1	7.0	6.6	7.3	6.9
LD20-12210	6.5	6.5	6.6	6.4	6.7	6.2
LD20-3780	6.3	6.3	6.2	6.2	6.4	6.2
LD21-3549	7.3	7.3	7.7	7.2	7.4	7.0
LD21-3582	6.5	6.5	6.7	6.5	6.6	6.4
LD21-8474	7.2	7.0	7.3	7.0	7.1	7.4
LD21-8509	6.6	6.7	6.8	6.4	6.6	6.7
LD21-9624	6.3	6.3	6.5	6.1	6.4	6.1
SA21-10247	6.1	6.0	6.1	6.1	6.2	5.8

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**FATTY ACID, STEARIC (%)**

Strain	Mean 5 Tests	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	4.7	4.7	4.9	4.8	4.4	4.6
LD07-3395bf (SCN) (E)	3.9	3.8	4.1	3.6	4.3	3.8
LD19-12943	3.6	3.4	3.8	3.3	3.8	3.5
LD20-12210	3.6	3.5	3.8	3.3	3.7	3.7
LD20-3780	3.4	3.3	3.5	3.7	3.7	3.0
LD21-3549	3.6	3.4	3.8	3.4	3.8	3.5
LD21-3582	3.8	3.6	4.0	3.8	4.0	3.6
LD21-8474	3.4	3.2	3.6	3.2	3.6	3.3
LD21-8509	3.5	3.3	3.5	3.2	3.9	3.4
LD21-9624	3.2	2.9	3.5	2.9	3.4	3.1
SA21-10247	3.6	3.5	3.7	3.4	3.8	3.6

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**FATTY ACID, OLEIC (%)**

Strain	Mean 5 Tests	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	28.1	27.5	28.6	27.8	28.7	28.1
LD07-3395bf (SCN) (E)	25.1	24.1	25.4	24.5	27.0	24.6
LD19-12943	82.0	81.4	82.0	82.0	81.5	83.2
LD20-12210	84.2	84.5	84.1	84.0	83.5	84.6
LD20-3780	84.7	84.9	85.1	83.9	84.3	85.6
LD21-3549	83.6	83.9	83.1	83.7	83.0	84.0
LD21-3582	84.5	84.6	84.0	84.4	84.2	85.2
LD21-8474	83.5	83.8	83.3	83.6	83.3	83.3
LD21-8509	84.3	84.0	84.1	84.6	84.3	84.3
LD21-9624	84.8	84.6	84.5	85.1	84.7	85.0
SA21-10247	85.0	85.0	84.8	85.2	85.0	85.2

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLEIC (%)**

Strain	Mean 5 Tests	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	50.8	51.0	49.9	51.5	50.2	51.3
LD07-3395bf (SCN) (E)	53.3	53.7	52.6	54.2	51.7	54.3
LD19-12943	5.0	5.5	4.7	5.7	5.0	4.2
LD20-12210	3.7	3.4	3.4	4.2	3.9	3.4
LD20-3780	3.5	3.4	3.2	4.1	3.5	3.3
LD21-3549	3.4	3.3	3.2	3.6	3.6	3.3
LD21-3582	3.1	3.2	3.2	3.2	3.1	2.9
LD21-8474	3.6	3.6	3.4	3.9	3.6	3.7
LD21-8509	3.4	3.7	3.4	3.6	3.1	3.4
LD21-9624	3.6	4.0	3.4	3.9	3.3	3.6
SA21-10247	3.2	3.3	3.3	3.3	3.0	3.3

**UNIFORM TEST IV TRAITED MATERIAL, 2024**

**FATTY ACID, LINOLENIC (%)**

Strain	Mean 5 Tests	Urbana IL	Butler- ville IN	West Lafayette IN	Novelty MO	Rock Port MO
LD15-3818 (IV)	6.7	6.9	6.7	6.5	6.7	6.5
LD07-3395bf (SCN) (E)	7.5	8.0	7.6	7.6	6.9	7.3
LD19-12943	2.4	2.6	2.5	2.4	2.5	2.2
LD20-12210	2.1	2.1	2.1	2.1	2.1	2.0
LD20-3780	2.1	2.1	2.1	2.2	2.1	1.9
LD21-3549	2.2	2.2	2.1	2.2	2.3	2.2
LD21-3582	2.1	2.1	2.1	2.0	2.1	2.0
LD21-8474	2.3	2.3	2.3	2.2	2.3	2.3
LD21-8509	2.2	2.3	2.2	2.1	2.1	2.2
LD21-9624	2.1	2.1	2.2	2.1	2.1	2.1
SA21-10247	2.1	2.1	2.1	2.1	2.0	2.1

Parentage data of strains in Uniform Tests can be found at:  
<https://www.soybase.org/tools/parentage/>