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2021 OHIO POTATO GERMPLASM EVALUATION REPORT

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IN COOPERATION WITH
THE
NORTHEAST REGIONAL PROJECT (NE-1731)

THE OHIO STATE UNIVERSITY
COLLEGE OF FOOD, AGRICULTURAL,
AND ENVIRONMENTAL SCIENCES

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TABLE of CONTENTS

OHIO POTATO GERMPLASM EVALUATIONS - 2021

Summary

Ohio cooperates with private and public breeders in the U.S. and elsewhere in evaluating varieties and experimental lines of fresh market and processing potatoes. A total of one-hundred fifteen varieties and experimental lines developed in three breeding programs were evaluated in 2021 (Table 1). Entries were placed into one of four experiments completed at the Ohio Agricultural Research and Development Center (OARDC) at The Ohio State University in Wooster, Ohio. The experiments were the Northeast Regional Project 1731 (NE-1731), Triple Observation (OBT), Double Observation (OBD) and Single Observation (OBS). Named varieties were included in one experiment, and numbered entries in all experiment. Entries were contributed by breeding programs in Maine (ME), New York (NY) and North Carolina (NC). Entries are listed in Table 2 and include a total of one-hundred five entries contributed by ME, one by NY, one by NC, and eight varieties as standards.

The experiments were established to evaluate the growth and market traits of each entry when grown under non-irrigated conditions in Ohio. The fact that the trials at OARDC are not irrigated tends to affect the performance of individual entries. Marketable yield of six varieties for 2011-2021 at OARDC are shown in Figure 1.

Procedures

Planting, Stand Establishment and Cultural Practices

Seed potatoes were cut on April 20-21, 2021 and allowed to cure under recommended temperature and humidity conditions. Plots were established on April 27, 2021. All entries in the NE-1731 experiment were replicated three times. Entries in the Observation experiments were replicated once, twice or three times depending on the experiment. Percent stand was recorded at 5, 6 and 8 weeks after planting.

Table 3 and Figure 2 contain plot management and climatic data for the experimental site, located on a well-drained Wooster silt loam. Pest, weed, and disease pressure were minimized using procedures and materials consistent with local commercial practices, including weekly pesticide applications. Vine kill desiccant was applied on September 20, 2021.

Crop Maturity, Yield and Quality

During weeks 7-12 after planting, all plots were inspected 3-4 days per week to record the first date when at least 50% of plants in each plot were flowering. Once a plot was noted as having at least 50% of plants in flower, the plot was no longer inspected for this purpose. For replicated entries (NE-1731, OBT, OBD) the reported date to at least 50% flowering was taken as the midpoint or average date. Across all experiments, the first plot to reach at least 50% flower did so on June 18 and this was considered Day 0 of the maturity period. Also, all plots were inspected between weeks 14-19 after planting for evidence of senescence. The percent of the canopy brown in color was recorded for each plot 5 times over the six-week period. Using percent ratings and averaging as in flower ratings described earlier (replicated plots only), the date when the plot or entry reached 75% brown in was identified. The maturity period spanned June 18 – September 20 (flowering to vine kill, 94 days) and was divided into three categories: early (0-30 days), mid (31-60 days), and late (61+ days). The date at which an entry reached at least 75% brown was then compared to the maturity period so that an “early,” “mid”, or “late” rating could be assigned to each entry. See Table 4.

Whole plots in the NE-1731 and Observation experiments were harvested on September 29, 2021, with tubers placed in wood crates. Tubers were held in a barn under ambient conditions until October 6, 2021, then transferred to humidified and refrigerated (47-49°F) storage.

On October 6, 2021, the total weight of tubers produced by each genotype (across multiple plots, if present) was recorded. A subset of the harvested weight for the NE-1731, OBT and OBD plots and the entire harvested weight for the OBS plots of each genotype were retained and sized. A subset of A-size tubers for each genotype was retained and transferred to humidified refrigerated storage and the weight of B-sized tubers recorded. On October 8 and 12, 2021, the A-sized subset was weighed and graded and the weight of culled tubers was recorded. B-sized tuber and cull weights were expressed as percentages of their respective subsets and then applied to the total weight of the potatoes harvested for each genotype to calculate its marketable yield (cwt/A).

Tubers for internal and external quality ratings were retained at sizing and chipping samples were retained at grading. Tubers set aside for quality ratings and for chipping were retained in humidified and refrigerated (47-49°F) storage until November 4, 2021.

Tubers were rated for internal and external quality on November 3-4, 2021. Ten randomly selected, representative A-size tubers collected at sizing were scored for tuber shape, skin and flesh color, surface texture, eye depth, general appearance, and the presence or absence of hollow heart, brown center, internal necrosis, and vascular discoloration using accepted protocols. (See Tuber Data Rating System on p. 29). Tubers with colored skin (red, purple, pink) or flesh (yellow, pink) were further rated using a Sherwin-Williams color fan deck. Two to three tubers were compared against paint chips to determine the best color match. Digital images representing internal and external quality of each NE-1731 genotype were recorded.

Chipping Quality Evaluation

Tubers were held in refrigerated humidified storage (47-49°F) until October 26, 2021. They were removed and held under ambient conditions (approx. 70-73°F) until being processed on October 27, 2021.

Chipping quality evaluation began with measurements of specific gravity on October 25-26, 2021. Eight pounds of potatoes were placed in a hydrometer. Tuber and water temperatures and raw specific gravity was recorded. Specific gravity data was adjusted using correction factor values of either -0.0007 or -0.0016 as indicated by the SNAC International (See Correction Table for Specific Gravity on page 30).

On October 27, a subset of four potatoes was selected and peeled using a Rotato Express electric potato peeler or by hand for all NE-1731 and OBT entries and entries with non-colored skin (brown, tan, buff, cream, white) or flesh (white, cream) in the OBD and OBS experiments. Peeled potatoes were sliced to a thickness of 0.049-0.051 inches using a Hobart meat slicer (Model 410). Slices were rinsed in cold water and 20-25 slices fried in a Commercial Pro Model CPF32 electric fryer containing corn oil donated by Shearer's Foods, Inc. at 177-178°C (350-352°F) for approximately 3:00 minutes. After frying, the sample was visually evaluated for color using color standards in the Potato Chip Color Reference Chart published by the Snack Food Association. Chips that are very light in color are scored "1" and very dark chips are scored "6". The number of chips out of twenty or twenty-five with blister(s) greater than 1 cm (0.39 in) in diameter was recorded. Digital images of chips for each genotype were recorded.

Results

Yield, tuber characteristics, and chipping quality data are presented in Tables 5-11. Total yield and US #1 yield averaged 403 and 303 (cwt/A) across all studies respectively, with a range of 204-669 (total) and 147-508 (US #1). Average total yield in the NE-1731 experiment was 406 cwt/A among varieties and 473 cwt/A among the selections, with a study range of 319-597 cwt/A. Of the 115 entries evaluated, overall tuber appearance was rated poor-fair (scale rating of 1-3), fair-good (scale rating of 4-6), and good-excellent (scale rating of 7-9) in 2, 25, and 88 entries, respectively.

1. Entries having an overall appearance rating of ≥ 7 (good-excellent) at grading:
    - NE-1731: Chieftain, Dark Red Norland, Katahdin, Snowden, Superior, AF 5280-5, AF 5563-5, AF 5819-2, MSAFB 609-12, NC 470-3, NDAF 102629C-4, NDAF 113484B-1, NY 165
    - Triple Observation: AF 6165-9, AF 6206-5, AF 6237-3, AF 6289-2, AF 6550-2, AF 6562-1, AF 6575-6, AF 6582-1, NDAF 12143-1, NDAF 13273-1, WAF 13058-1
    - Double Observation: AF 6522-1, AF 6526-7, AF 6527-3, AF 6541-3, AF 6543-2, AF 6551-4, AF 6552-2, AF 6559-4, NDAF 13136Y-5, WAF 16107-2, WAF 16220-2
    - Single Observation: AF 5973-3, AF 6048-4, AF 6618-1, AF 6618-2, AF 6626-2, AF 6647-4, AF 6652-3, AF 6655-1, AF 6668-3, AF 6669-10, AF 6670-1, AF 6671-10, AF 6675-1, AF 6680-2, AF 6684-9, AF 6687-3, AF 6688-2, AF 6692-1, AF 6692-7, AF 6693-1, AF 6694-1, AF 6694-8, AF 6694-9, AF 6695-3, AF 6698-8, AF 6698-9, AF 6702-1, AF 6705-2, AF 6705-6, AF 6705-8, AF 6708-2, AF 6709-4, AF 6712-7, AF 6717-1, AF 6722-3, AF 6729-1, AF 6729-2, AF 6729-6, AF 6731-1, AF 6735-2, AF 6743-6, COAF 16023-3, NDAF 12238Y-2, NDAF 13296Y-4, NDAF 14188-5, NDAF 14280CB-1, NDAF 14316CABY-3, WAF 17022-4, WAF 17022-6, WAF 17037-1, WAF 17042-7, WAF 17045-2, WAF 17060-5

2. Entries having an overall appearance rating of ≥ 7 (good-excellent) at grading and marketable yield ≥ the experiment average:
    - NE-1731: Chieftain, Snowden, AF 5280-5, AF 5819-2, MSAFB 609-12, NDAF 113484B-1, NY 165
    - Triple Observation: AF 6165-9, AF 6206-5, AF 6237-3, AF 6289-2, AF 6550-2, AF 6562-1, AF 6575-6
    - Double Observation: AF 6522-1, AF 6526-7, AF 6551-4, AF 6552-2, WAF 16220-2
    - Single Observation: AF 6618-1, AF 6626-2, AF 6655-1, AF 6668-3, AF 6669-10, AF 6670-1, AF 6675-1, AF 6684-9, AF 6688-2, AF 6698-9, AF 6705-2, AF 6712-7, AF 6717-1, AF 6722-3, AF 6729-1, AF 6729-6, AF 6735-2, AF 6743-6, NDAF 12238Y-2, NDAF 14188-5, NDAF 14280CB-1, NDAF 14316CABY-3, WAF 17037-1

3. Entries having a chip score of ≤ 3:
    - NE-1731: Atlantic, Kennebec, Snowden, AF 5280-5, AF 5563-5, AF 5819-2, MSAFB 609-12, MSAFB 635-15, NC 470-3, NDAF 102629C-4, NDAF 113484B-1, NY 165
    - Triple Observation: AF 6165-9, AF 6200-7, AF 6206-5, AF 6237-3, AF 6542-16, AF 6550-2, AF 6562-1, AF 6575-6, AF 6582-1, WAF 13058-1, WAF 15184-4
    - Double Observation: AF 6522-1, AF 6526-7, AF 6541-3, AF 6543-2, AF 6551-4, AF 6552-2, AF 6555-2, AF 6559-4, AF 6598-6, AF 6601-2, AF 6603-5, WAF 16107-2, WAF 16134-2, WAF 16220-2, WAF 16220-4
    - Single Observation: AF 5973-3, AF 6526-3, AF 6618-2, AF 6626-2, AF 6647-4, AF 6655-1, AF 6664-8, AF 6669-10, AF 6671-10, AF 6675-1, AF 6680-2, AF 6684-9, AF 6686-5, AF 6687-3, AF 6688-2, AF 6688-8, AF 6717-1, AF 6724-2, AF 6731-1, AF 6735-2, COAF 16023-3, NDAF 14188-5, NDAF 14316CABY-3, WAF 17037-1, WAF 17042-7, WAF 17045-1, WAF 17045-2, WAF 17060-5

Table 1. Breeding programs participating in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

			2021 experiments				
Number	Program	Genotype Codes	NE-1731	Triple Observation	Double Observation	Single[1] Observation	Total
1	Univ. Maine	AF, COAF, MSAFB, NDAF, WAF	7	14	21	63	105
2	Cornell Univ.	NY	1				1
3	NC State Univ.	NC	1				1
4	Various	named	8				8
		Total	17	14	21	63	115

[1] Refers to number of single row replicates. All other experiments contained two (Double Observation) or three (NE-1731, Triple Observation) replicates.

Table 2. Varieties and experimental lines planted in the potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Experiments				
NE-1731	Triple Observation	Double Observation	Single Observation	
1 Atlantic	18 AF 6165-9	32 AF 6522-1	53 AF 5973-3	96 AF 6729-1
2 Chieftain	19 AF 6200-7	33 AF 6526-7	54 AF 6048-4	97 AF 6729-2
3 Dark Red Norland	20 AF 6206-5	34 AF 6527-3	55 AF 6526-3	98 AF 6729-6
4 Katahdin	21 AF 6237-3	35 AF 6541-3	56 AF 6618-1	99 AF 6731-1
5 Kennebec	22 AF 6289-2	36 AF 6543-2	57 AF 6618-2	100 AF 6735-2
6 Snowden	23 AF 6542-16	37 AF 6551-4	58 AF 6626-2	101 AF 6743-6
7 Superior	24 AF 6550-2	38 AF 6552-2	59 AF 6647-4	102 COAF 16023-3
8 Yukon Gold	25 AF 6562-1	39 AF 6555-2	60 AF 6652-3	103 NDAF 12238Y-2
9 AF 5280-5	26 AF 6575-6	40 AF 6559-4	61 AF 6655-1	104 NDAF 13296Y-4
10 AF 5563-5	27 AF 6582-1	41 AF 6566-1	62 AF 6664-8	105 NDAF 14188-5
11 AF 5819-2	28 NDAF 12143-1	42 AF 6598-6	63 AF 6664-9	106 NDAF 14280CB-1
12 MSAFB 609-12	29 NDAF 13273-1	43 AF 6601-2	64 AF 6665-3	107 NDAF 14316CABY-3
13 MSAFB 635-15	30 WAF 13058-1	44 AF 6603-5	65 AF 6668-3	108 WAF 17010-9
14 NC 470-3	31 WAF 15184-4	45 AF 6606-2	66 AF 6669-10	109 WAF 17022-4
15 NDAF 102629C-4		46 AF 6608-4	67 AF 6670-1	110 WAF 17022-6
16 NDAF 113484B-1		47 AF 6610-2	68 AF 6671-10	111 WAF 17037-1
17 NY 165		48 NDAF 13136Y-5	69 AF 6675-1	112 WAF 17042-7
		49 WAF 16107-2	70 AF 6680-2	113 WAF 17045-1
		50 WAF 16134-2	71 AF 6684-9	114 WAF 17045-2
		51 WAF 16220-2	72 AF 6686-5	115 WAF 17060-5
		52 WAF 16220-4	73 AF 6687-3	
			74 AF 6688-2	
			75 AF 6688-8	
			76 AF 6691-1	
			77 AF 6692-1	
			78 AF 6692-7	
			79 AF 6693-1	
			80 AF 6694-1	
			81 AF 6694-8	
			82 AF 6694-9	
			83 AF 6695-3	
			84 AF 6698-8	
			85 AF 6698-9	
			86 AF 6702-1	
			87 AF 6705-2	
			88 AF 6705-6	
			89 AF 6705-8	
			90 AF 6708-2	
			91 AF 6709-4	
			92 AF 6712-7	
			93 AF 6717-1	
			94 AF 6722-3	
			95 AF 6724-2	

Figure 1. Yield of marketable, A-size tubers for 6 varieties grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2011-2021.

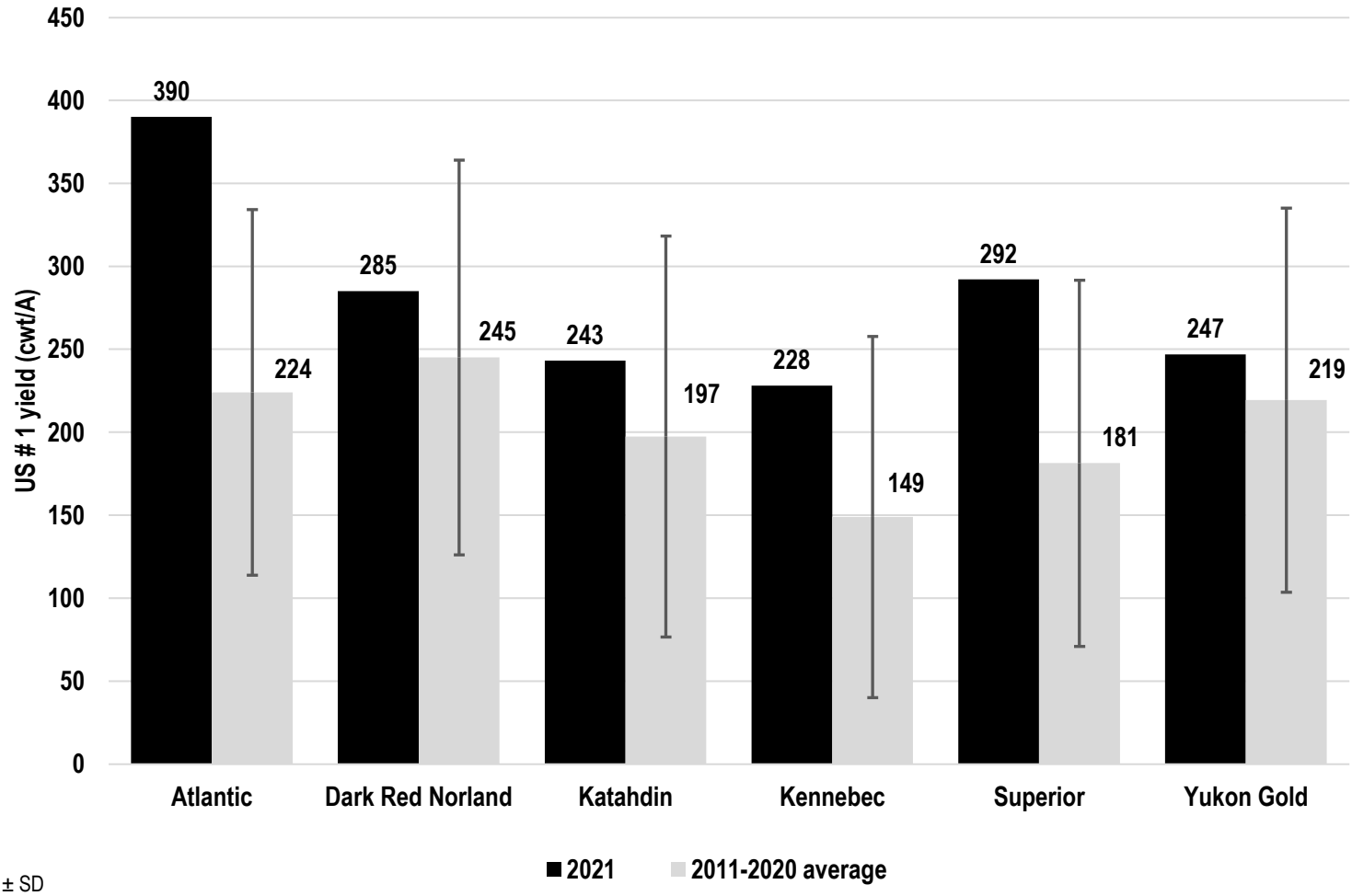

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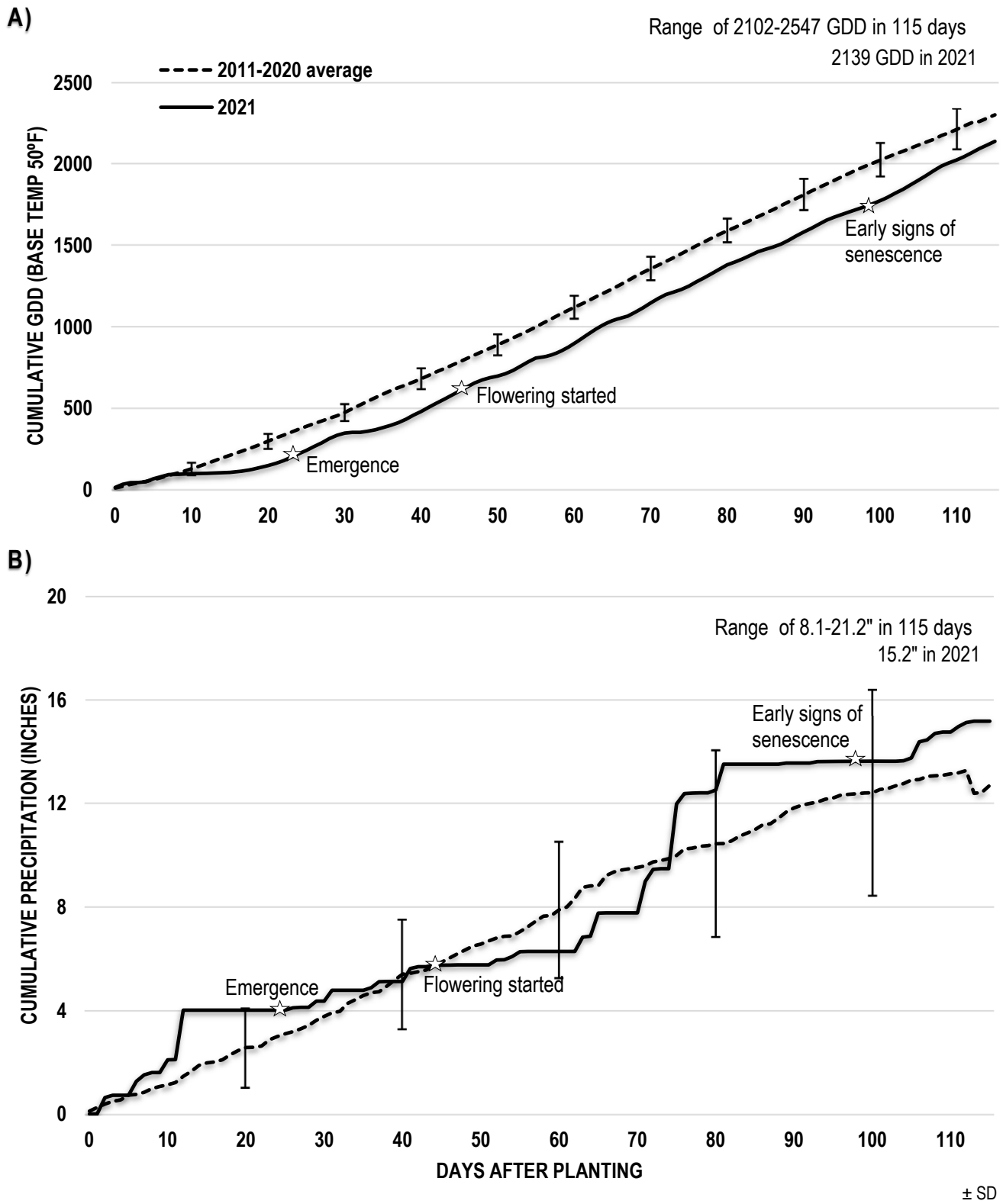
Table 3. Cultural, nutrient, and pest management practices for the potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Date planted	Apr-27
Date vine kill	Sep-20
2020 main crop	Red Clover
Spacing (ft.) within, between row	1 x 3.7
Plot width, length (ft.)	3.7 x 30
Soil conditions at planting	Dry
Irrigation (inches)	None
Dates hilled	Jun-1, Jun 11

	Date	Product	Rate (A)
Fertilizer	Apr-19	0-0-60	200 pounds
	Apr-27	10-20-20	400 pounds
Insecticide	Apr-27	Admire Pro	4 ounces
Herbicide	May-1	Dual II-Magnum	2 pints
		Metribuzin EXT	1 pound
Cover Sprays	Jun-4	Bravo	1.5 pints
	Jun-10	Quadris	6 ounces
	Jun-17	Penncozeb	2 pounds
		Tanos	8 ounces
	Jun-24	Echo	1.5 pints
		Pyganic	10 ounces
		PBO	4 ounces
	Jul-1	Miravis Prime	11 ounces
	Jul-8	Penncozeb	2 pounds
		Tanos	8 ounces
		Warrior	1.5 ounces
	Jul-15	Echo	1.5 pints
		Entrust	6 ounces
	Jul-22	Quadris Top	14 ounces
	Jul-29	Miravis Prime	11 ounces
	Aug-5	Penncozeb	2 pounds
		Tanos	8 ounces
	Aug-12	Quadris Top	14 ounces
		Coragen	5 ounces
	Aug-19	Echo	1.5 pints
	Aug-25	Echo	1.5 pints
Vine kill	Sep-20	ForFeit 280	21 ounces

Figure 2. Historical A) cumulative growing degree days (GDD) and B) cumulative precipitation for potato germplasm evaluations at OSU-OARDC in Wooster, OH in 2011-2021 from planting through 115 days after planting. GDD was calculated using the Baskerville-Emin method[1].



[1] Baskerville, G. L.; Emin, P. 1969. Rapid estimation of heat accumulation from maximum and minimum temperatures. Ecology 50:514-517.

Table 4. Estimated dates to flowering, senescence and maturity for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Flower[1]	Senescence[2]	Maturity[3]	Entry	Flower	Senescence	Maturity
1 Atlantic	20-Jun	7-Sep	L	32 AF 6522-1	02-Jul	07-Sep	L
2 Chieftain	28-Jun	7-Sep	L	33 AF 6526-7	21-Jun	07-Sep	L
3 Dark Red Norland	25-Jun	27-Aug	L	34 AF 6527-3	21-Jun	07-Sep	L
4 Katahdin	27-Jun	7-Sep	L	35 AF 6541-3	24-Jun	20-Aug	L
5 Kennebec	28-Jun	7-Sep	L	36 AF 6543-2	25-Jun	07-Sep	L
6 Snowden	27-Jun	7-Sep	L	37 AF 6551-4	25-Jun	07-Sep	L
7 Superior	22-Jun	27-Aug	L	38 AF 6552-2	01-Jul	07-Sep	L
8 Yukon Gold	29-Jun	7-Sep	L	39 AF 6555-2	30-Jun	27-Aug	L
9 AF 5280-5	19-Jun	7-Sep	L	40 AF 6559-4	02-Jul	27-Aug	L
10 AF 5563-5	27-Jun	7-Sep	L	41 AF 6566-1	30-Jun	07-Sep	L
11 AF 5819-2	26-Jun	7-Sep	L	42 AF 6598-6	21-Jun	07-Sep	L
12 MSAFB 609-12	28-Jun	7-Sep	L	43 AF 6601-2	26-Jun	20-Aug	L
13 MSAFB 635-15	27-Jun	7-Sep	L	44 AF 6603-5	25-Jun	27-Aug	L
14 NC 470-3	28-Jun	7-Sep	L	45 AF 6606-2	23-Jun	07-Sep	L
15 NDAF 102629C-4	18-Jun	27-Aug	L	46 AF 6608-4	28-Jun	07-Sep	L
16 NDAF 113484B-1	25-Jun	7-Sep	L	47 AF 6610-2	28-Jun	07-Sep	L
17 NY 165	27-Jun	7-Sep	L	48 NDAF 13136Y-5	21-Jun	20-Aug	L
				49 WAF 16107-2	24-Jun	07-Sep	L
18 AF 6165-9	21-Jun	07-Sep	L	50 WAF 16134-2	21-Jun	07-Sep	L
19 AF 6200-7	21-Jun	07-Sep	L	51 WAF 16220-2	28-Jun	07-Sep	L
20 AF 6206-5	21-Jun	07-Sep	L	52 WAF 16220-4	21-Jul	07-Sep	L
21 AF 6237-3	28-Jun	07-Sep	L				
22 AF 6289-2	02-Jul	20-Aug	M	53 AF 5973-3	28-Jun	07-Sep	L
23 AF 6542-16	22-Jun	07-Sep	L	54 AF 6048-4	09-Jul	11-Aug	M
24 AF 6550-2	30-Jun	07-Sep	L	55 AF 6526-3	28-Jun	07-Sep	L
25 AF 6562-1	01-Jul	07-Sep	L	56 AF 6618-1	02-Jul	07-Sep	L
26 AF 6575-6	23-Jun	27-Aug	L	57 AF 6618-2	21-Jun	07-Sep	L
27 AF 6582-1	23-Jun	07-Sep	L	58 AF 6626-2	21-Jun	07-Sep	L
28 NDAF 12143-1	30-Jun	27-Aug	L	59 AF 6647-4	30-Jun	27-Aug	L
29 NDAF 13273-1	28-Jun	20-Aug	M	60 AF 6652-3	30-Jun	07-Sep	L
30 WAF 13058-1	18-Jun	11-Aug	M	61 AF 6655-1	30-Jun	07-Sep	L
31 WAF 15184-4	21-Jun	07-Sep	L	62 AF 6664-8	30-Jun	07-Sep	L

[1]Average date when at least 50% of the plants were flowering. See page 2 for reference.

[2]Average date when at least 75% of plants had senescence. See page 2 for reference.

[3] Maturity categories: E=early, M=mid, L=late

Table 4 (cont.). Estimated dates to flowering, senescence and maturity for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Flower[1]	Senescence[2]	Maturity[3]	Entry	Flower	Senescence	Maturity
63 AF 6664-9	30-Jun	07-Sep	L	90 AF 6708-2	21-Jul	20-Aug	L
64 AF 6665-3	30-Jun	07-Sep	L	91 AF 6709-4	21-Jul	07-Sep	L
65 AF 6668-3	30-Jun	07-Sep	L	92 AF 6712-7	09-Jul	07-Sep	L
66 AF 6669-10	28-Jun	07-Sep	L	93 AF 6717-1	30-Jun	07-Sep	L
67 AF 6670-1	25-Jun	07-Sep	L	94 AF 6722-3	30-Jun	07-Sep	L
68 AF 6671-10	28-Jun	20-Aug	L	95 AF 6724-2	30-Jun	20-Aug	L
69 AF 6675-1	28-Jun	07-Sep	L	96 AF 6729-1	28-Jun	07-Sep	L
70 AF 6680-2	28-Jun	07-Sep	L	97 AF 6729-2	30-Jun	07-Sep	L
71 AF 6684-9	30-Jun	07-Sep	L	98 AF 6729-6	30-Jun	07-Sep	L
72 AF 6686-5	09-Jul	07-Sep	L	99 AF 6731-1	21-Jun	07-Sep	L
73 AF 6687-3	30-Jun	07-Sep	L	100 AF 6735-2	30-Jun	07-Sep	L
74 AF 6688-2	28-Jun	07-Sep	L	101 AF 6743-6	28-Jun	07-Sep	L
75 AF 6688-8	21-Jun	07-Sep	L	102 COAF 16023-3	30-Jun	07-Sep	L
76 AF 6691-1	30-Jun	07-Sep	L	103 NDAF 12238Y-2	28-Jun	07-Sep	L
77 AF 6692-1	02-Jul	07-Sep	L	104 NDAF 13296Y-4	30-Jun	07-Sep	L
78 AF 6692-7	30-Jun	27-Aug	L	105 NDAF 14188-5	28-Jun	07-Sep	L
79 AF 6693-1	28-Jun	27-Aug	L	106 NDAF 14280CB-1	25-Jun	07-Sep	L
80 AF 6694-1	02-Jul	27-Aug	L	107 NDAF 14316CABY-3	23-Jun	07-Sep	L
81 AF 6694-8	28-Jun	07-Sep	L	108 WAF 17010-9	02-Jul	20-Aug	L
82 AF 6694-9	30-Jun	27-Aug	L	109 WAF 17022-4	21-Jul	20-Aug	L
83 AF 6695-3	09-Jul	07-Sep	L	110 WAF 17022-6	28-Jun	27-Aug	L
84 AF 6698-8	05-Jul	07-Sep	L	111 WAF 17037-1	28-Jun	07-Sep	L
85 AF 6698-9	05-Jul	07-Sep	L	112 WAF 17042-7	02-Jul	11-Aug	M
86 AF 6702-1	21-Jul	07-Sep	L	113 WAF 17045-1	28-Jun	07-Sep	L
87 AF 6705-2	30-Jun	07-Sep	L	114 WAF 17045-2	23-Jun	07-Sep	L
88 AF 6705-6	21-Jul	07-Sep	L	115 WAF 17060-5	21-Jun	07-Sep	L
89 AF 6705-8	21-Jul	20-Aug	L				

[1]Average date when at least 50% of the plants were flowering. See page 2 for reference.

[2]Average date when at least 75% of plants had senescence. See page 2 for reference.

[3] Maturity categories: E=early, M=mid, L=late

Table 5. Yield (cwt/A) of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

	Entry	Total	US #1		Entry	Total	US #1
1	Atlantic	436.3	390.1	32	AF 6522-1	532.9	439.7
2	Chieftain	457.9	354.5	33	AF 6526-7	459.1	379.9
3	Dark Red Norland	318.7	285.0	34	AF 6527-3	343.4	279.7
4	Katahdin	421.5	243.2	35	AF 6541-3	332.5	257.0
5	Kennebec	368.1	228.0	36	AF 6543-2	371.8	301.4
6	Snowden	489.9	368.9	37	AF 6551-4	441.2	394.7
7	Superior	404.5	292.0	38	AF 6552-2	467.4	354.7
8	Yukon Gold	352.1	246.8	39	AF 6555-2	369.6	315.6
9	AF 5280-5	431.9	337.9	40	AF 6559-4	310.7	231.1
10	AF 5563-5	360.9	290.4	41	AF 6566-1	317.2	216.8
11	AF 5819-2	584.2	462.9	42	AF 6598-6	356.5	290.0
12	MSAFB 609-12	588.6	487.3	43	AF 6601-2	358.7	308.4
13	MSAFB 635-15	597.3	508.2	44	AF 6603-5	411.1	340.7
14	NC 470-3	390.0	292.2	45	AF 6606-2	422.0	269.0
15	NDAF 102629C-4	341.9	292.4	46	AF 6608-4	430.7	246.5
16	NDAF 113484B-1	443.5	394.0	47	AF 6610-2	461.3	362.3
17	NY 165	520.4	430.7	48	NDAF 13136Y-5	282.3	216.3
				49	WAF 16107-2	358.7	301.1
18	AF 6165-9	472.4	418.5	50	WAF 16134-2	286.6	181.8
19	AF 6200-7	391.2	237.3	51	WAF 16220-2	515.5	373.6
20	AF 6206-5	479.7	362.4	52	WAF 16220-4	378.3	294.7
21	AF 6237-3	439.2	393.9				
22	AF 6289-2	494.2	376.7	53	AF 5973-3	365.2	272.4
23	AF 6542-16	392.6	273.9	54	AF 6048-4	277.9	147.2
24	AF 6550-2	454.9	307.1	55	AF 6526-3	417.6	258.6
25	AF 6562-1	471.0	370.6	56	AF 6618-1	343.4	243.3
26	AF 6575-6	529.2	341.1	57	AF 6618-2	347.8	308.4
27	AF 6582-1	327.4	271.6	58	AF 6626-2	582.7	380.4
28	NDAF 12143-1	350.7	261.8	59	AF 6647-4	347.8	231.1
29	NDAF 13273-1	340.5	261.4	60	AF 6652-3	312.8	218.8
30	WAF 13058-1	334.7	258.4	61	AF 6655-1	430.7	323.5
31	WAF 15184-4	340.5	257.9	62	AF 6664-8	373.9	234.0

Table 5 (cont.). Yield (cwt/A) of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Total	US #1	Entry	Total	US #1
63 AF 6664-9	391.4	301.0	90 AF 6708-2	273.5	239.4
64 AF 6665-3	369.6	321.9	91 AF 6709-4	417.6	240.7
65 AF 6668-3	422.0	356.9	92 AF 6712-7	478.0	389.9
66 AF 6669-10	408.9	336.2	93 AF 6717-1	669.3	484.2
67 AF 6670-1	465.6	355.3	94 AF 6722-3	408.9	365.2
68 AF 6671-10	256.8	197.4	95 AF 6724-2	277.9	209.6
69 AF 6675-1	526.0	366.5	96 AF 6729-1	269.2	244.6
70 AF 6680-2	391.4	245.8	97 AF 6729-2	469.3	328.0
71 AF 6684-9	560.9	479.8	98 AF 6729-6	400.1	305.3
72 AF 6686-5	417.6	288.8	99 AF 6731-1	356.5	283.0
73 AF 6687-3	448.2	251.0	100 AF 6735-2	426.3	337.9
74 AF 6688-2	443.8	350.4	101 AF 6743-6	395.8	340.6
75 AF 6688-8	461.3	348.5	102 COAF 16023-3	473.6	212.0
76 AF 6691-1	448.2	284.2	103 NDAF 12238Y-2	491.1	411.9
77 AF 6692-1	334.7	224.0	104 NDAF 13296Y-4	387.0	236.1
78 AF 6692-7	321.6	186.9	105 NDAF 14188-5	426.3	367.3
79 AF 6693-1	378.3	291.7	106 NDAF 14280CB-1	443.8	346.9
80 AF 6694-1	356.5	286.4	107 NDAF 14316CABY-3	413.2	306.2
81 AF 6694-8	387.0	277.7	108 WAF 17010-9	277.9	167.1
82 AF 6694-9	400.1	302.7	109 WAF 17022-4	204.4	159.6
83 AF 6695-3	373.9	302.3	110 WAF 17022-6	299.7	219.1
84 AF 6698-8	417.6	296.0	111 WAF 17037-1	430.7	324.5
85 AF 6698-9	422.0	362.5	112 WAF 17042-7	248.1	165.9
86 AF 6702-1	461.3	294.6	113 WAF 17045-1	295.4	227.5
87 AF 6705-2	595.8	324.6	114 WAF 17045-2	295.4	213.7
88 AF 6705-6	373.9	261.1	115 WAF 17060-5	356.5	257.6
89 AF 6705-8	325.9	240.2			
Average	403.3	302.5			

Table 5 (cont.). Yield (%, by wt) of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	US #1	B-size	Entry	US #1	B-size
1 Atlantic	89.4	1.4	32 AF 6522-1	82.5	4.8
2 Chieftain	77.4	4.5	33 AF 6526-7	82.7	1.4
3 Dark Red Norland	89.4	4.6	34 AF 6527-3	81.4	2.9
4 Katahdin	57.7	3.3	35 AF 6541-3	77.3	4.0
5 Kennebec	61.9	4.1	36 AF 6543-2	81.1	3.9
6 Snowden	75.3	3.0	37 AF 6551-4	89.5	1.6
7 Superior	72.2	2.4	38 AF 6552-2	75.9	1.4
8 Yukon Gold	70.1	1.5	39 AF 6555-2	85.4	3.6
9 AF 5280-5	78.2	5.6	40 AF 6559-4	74.4	5.4
10 AF 5563-5	80.5	2.0	41 AF 6566-1	68.3	3.6
11 AF 5819-2	79.2	2.7	42 AF 6598-6	81.4	1.5
12 MSAFB 609-12	82.8	2.9	43 AF 6601-2	86.0	4.2
13 MSAFB 635-15	85.1	5.1	44 AF 6603-5	82.9	3.9
14 NC 470-3	74.9	4.4	45 AF 6606-2	63.7	4.4
15 NDAF 102629C-4	85.5	2.6	46 AF 6608-4	57.2	6.7
16 NDAF 113484B-1	88.8	4.6	47 AF 6610-2	78.5	2.3
17 NY 165	82.8	2.0	48 NDAF 13136Y-5	76.6	7.0
			49 WAF 16107-2	83.9	1.4
18 AF 6165-9	88.6	4.5	50 WAF 16134-2	63.4	4.6
19 AF 6200-7	60.7	1.0	51 WAF 16220-2	72.5	3.7
20 AF 6206-5	75.6	6.4	52 WAF 16220-4	77.9	0.4
21 AF 6237-3	89.7	3.6			
22 AF 6289-2	76.2	5.3	53 AF 5973-3	74.6	2.3
23 AF 6542-16	69.8	7.4	54 AF 6048-4	53.0	6.8
24 AF 6550-2	67.5	4.1	55 AF 6526-3	61.9	3.8
25 AF 6562-1	78.7	2.3	56 AF 6618-1	70.8	1.9
26 AF 6575-6	64.5	4.5	57 AF 6618-2	88.7	2.6
27 AF 6582-1	83.0	1.1	58 AF 6626-2	65.3	5.9
28 NDAF 12143-1	74.7	9.2	59 AF 6647-4	66.4	2.8
29 NDAF 13273-1	76.8	7.3	60 AF 6652-3	69.9	5.9
30 WAF 13058-1	77.2	4.4	61 AF 6655-1	75.1	4.9
31 WAF 15184-4	75.7	3.1	62 AF 6664-8	62.6	2.8

* % culls =100% minus the sum of % US #1 and % B-size

Table 5 (cont.). Yield (%, by wt) of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	US #1	B-size	Entry	US #1	B-size
63 AF 6664-9	76.9	2.4	90 AF 6708-2	87.5	2.5
64 AF 6665-3	87.1	6.1	91 AF 6709-4	57.6	8.6
65 AF 6668-3	84.6	2.1	92 AF 6712-7	81.6	4.5
66 AF 6669-10	82.2	2.7	93 AF 6717-1	72.3	10.8
67 AF 6670-1	76.3	3.6	94 AF 6722-3	89.3	2.9
68 AF 6671-10	76.9	2.8	95 AF 6724-2	75.4	4.7
69 AF 6675-1	69.7	6.8	96 AF 6729-1	90.9	1.6
70 AF 6680-2	62.8	4.4	97 AF 6729-2	69.9	3.2
71 AF 6684-9	85.5	2.6	98 AF 6729-6	76.3	4.0
72 AF 6686-5	69.2	3.5	99 AF 6731-1	79.4	3.0
73 AF 6687-3	56.0	3.0	100 AF 6735-2	79.3	2.5
74 AF 6688-2	79.0	6.7	101 AF 6743-6	86.1	3.2
75 AF 6688-8	75.5	3.5	102 COAF 16023-3	44.8	12.2
76 AF 6691-1	63.4	1.8	103 NDAF 12238Y-2	83.9	8.2
77 AF 6692-1	66.9	4.3	104 NDAF 13296Y-4	61.0	3.3
78 AF 6692-7	58.1	8.5	105 NDAF 14188-5	86.2	4.0
79 AF 6693-1	77.1	6.4	106 NDAF 14280CB-1	78.2	4.9
80 AF 6694-1	80.3	9.6	107 NDAF 14316CABY-3	74.1	5.7
81 AF 6694-8	71.7	6.2	108 WAF 17010-9	60.1	6.3
82 AF 6694-9	75.6	6.5	109 WAF 17022-4	78.1	14.6
83 AF 6695-3	80.9	5.4	110 WAF 17022-6	73.1	6.5
84 AF 6698-8	70.9	5.2	111 WAF 17037-1	75.4	4.6
85 AF 6698-9	85.9	4.9	112 WAF 17042-7	66.9	5.9
86 AF 6702-1	63.9	7.2	113 WAF 17045-1	77.0	4.0
87 AF 6705-2	54.5	4.5	114 WAF 17045-2	72.3	6.2
88 AF 6705-6	69.8	7.2	115 WAF 17060-5	72.2	1.8
89 AF 6705-8	73.7	7.1			
Average	75.0	4.4			

* % culls =100% minus the sum of % US #1 and % B-size

Table 6. Tuber skin and flesh characteristics of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Skin[1] Color	Flesh Color	Skin Texture	Entry	Skin Color	Flesh Color	Skin Texture
1 Atlantic	5	2	6	32 AF 6522-1	6	1	5
2 Chieftain	3	1	6	33 AF 6526-7	7	1	7
3 Dark Red Norland	3	1	7	34 AF 6527-3	6	2	5
4 Katahdin	7	1	6	35 AF 6541-3	7	2	7
5 Kennebec	6	2	8	36 AF 6543-2	7	2	5
6 Snowden	6	1	5	37 AF 6551-4	7	1	6
7 Superior	6	1	6	38 AF 6552-2	6	2	5
8 Yukon Gold	7	4	7	39 AF 6555-2	7	2	6
9 AF 5280-5	7	2	8	40 AF 6559-4	7	2	8
10 AF 5563-5	7	1	7	41 AF 6566-1	7	3	7
11 AF 5819-2	7	2	6	42 AF 6598-6	6	1	7
12 MSAFB 609-12	6	2	6	43 AF 6601-2	7	2	5
13 MSAFB 635-15	6	2	6	44 AF 6603-5	6	1	6
14 NC 470-3	5	2	5	45 AF 6606-2	6	4	6
15 NDAF 102629C-4	7	1	7	46 AF 6608-4	6	3	6
16 NDAF 113484B-1	3	1	7	47 AF 6610-2	7	4	7
17 NY 165	6	2	6	48 NDAF 13136Y-5	2	2	7
				49 WAF 16107-2	7	1	5
18 AF 6165-9	7	2	6	50 WAF 16134-2	7	1	6
19 AF 6200-7	6	1	6	51 WAF 16220-2	6	1	7
20 AF 6206-5	6	1	6	52 WAF 16220-4	7	2	7
21 AF 6237-3	6	2	6				
22 AF 6289-2	2	1	8	53 AF 5973-3	7	2	7
23 AF 6542-16	7	3	7	54 AF 6048-4	2	1	8
24 AF 6550-2	7	1	7	55 AF 6526-3	7	3	7
25 AF 6562-1	7	1	7	56 AF 6618-1	6	3	6
26 AF 6575-6	1	4	8	57 AF 6618-2	6	2	5
27 AF 6582-1	7	3	7	58 AF 6626-2	7	2	6
28 NDAF 12143-1	3	1	8	59 AF 6647-4	7	2	9
29 NDAF 13273-1	2	1	8	60 AF 6652-3	7	1	6
30 WAF 13058-1	7	4	7	61 AF 6655-1	6	3	6
31 WAF 15184-4	7	2	6	62 AF 6664-8	6	1	7

[1] See reference table for rating system on page 29.

Table 6 (cont.). Tuber skin and flesh characteristics of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Skin[1] Color	Flesh Color	Skin Texture	Entry	Skin Color	Flesh Color	Skin Texture
63 AF 6664-9	6	3	6	90 AF 6708-2	2	1	7
64 AF 6665-3	6	1	7	91 AF 6709-4	2	1	8
65 AF 6668-3	6	3	7	92 AF 6712-7	2	2	8
66 AF 6669-10	6	2	7	93 AF 6717-1	7	1	6
67 AF 6670-1	6	2	6	94 AF 6722-3	6	2	7
68 AF 6671-10	6	1	6	95 AF 6724-2	6	2	7
69 AF 6675-1	7	2	6	96 AF 6729-1	6	2	6
70 AF 6680-2	6	2	6	97 AF 6729-2	7	2	6
71 AF 6684-9	6	2	5	98 AF 6729-6	6	2	6
72 AF 6686-5	6	2	5	99 AF 6731-1	7	2	6
73 AF 6687-3	6	1	5	100 AF 6735-2	7	2	8
74 AF 6688-2	6	2	7	101 AF 6743-6	6	4	5
75 AF 6688-8	6	2	7	102 COAF 16023-3	6	1	8
76 AF 6691-1	7	2	8	103 NDAF 12238Y-2	3	1	8
77 AF 6692-1	3	1	8	104 NDAF 13296Y-4	3	1	6
78 AF 6692-7	3	1	8	105 NDAF 14188-5	6	1	7
79 AF 6693-1	2	2	8	106 NDAF 14280CB-1	2	5	8
80 AF 6694-1	1	2	8	107 NDAF 14316CABY-3	7	1	7
81 AF 6694-8	2	2	8	108 WAF 17010-9	3	2	6
82 AF 6694-9	1	1	9	109 WAF 17022-4	2	1	8
83 AF 6695-3	3	2	8	110 WAF 17022-6	2	1	7
84 AF 6698-8	2	1	8	111 WAF 17037-1	7	2	6
85 AF 6698-9	3	1	7	112 WAF 17042-7	6	1	7
86 AF 6702-1	2	6	7	113 WAF 17045-1	6	2	5
87 AF 6705-2	1	2	8	114 WAF 17045-2	6	2	5
88 AF 6705-6	3	1	8	115 WAF 17060-5	6	2	6
89 AF 6705-8	1	1	7				

[1] See reference table for rating system on page 29.

Table 7. Tuber skin and flesh colors of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

	Skin		Flesh	
Entry	TDRS[1]	SW[2]	TDRS	SW
2 Chieftain	3	6313		
3 Dark Red Norland	3	6862		
8 Yukon Gold			4	6901
16 NDAF 113484B-1	3	6862		
22 AF 6289-2	2	6580		
23 AF 6542-16			3	6694
26 AF 6575-6	1	6839	4	6695
27 AF 6582-1			3	6694
28 NDAF 12143-1	3	6579		
29 NDAF 13273-1	2	6580		
30 WAF 13058-1			4	6688
41 AF 6566-1			3	6695
45 AF 6606-2			4	6695
46 AF 6608-4			3	6688
47 AF 6610-2			4	6695
48 NDAF 13136Y-5	2	6580		
54 AF 6048-4	2	6580		
55 AF 6526-3			3	6694
56 AF 6618-1			3	6694
61 AF 6655-1			3	6687
63 AF 6664-9			3	6695
65 AF 6668-3			3	6900
77 AF 6692-1	3	6579		
78 AF 6692-7	3	6579		
79 AF 6693-1	2	6580		
80 AF 6694-1	1	6981, 6838, 6839		
81 AF 6694-8	2	6580		
82 AF 6694-9	1	6839		
83 AF 6695-3	3	6579		

[1] Tuber Data Rating Sytem. See reference table on page 29.

[2] Sherwin Williams color number. See text on page 2.

Table 7 (cont.). Tuber skin and flesh colors of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

	Skin		Flesh	
Entry	TDRS[1]	SW[2]	TDRS	SW
84 AF 6698-8	2	6580		
85 AF 6698-9	3	6306		
86 AF 6702-1	2	6580	6	6572
87 AF 6705-2	1	6293		
88 AF 6705-6	3	6312, 6313		
89 AF 6705-8	1	6839		
90 AF 6708-2	2	6305		
91 AF 6709-4	2	6580		
92 AF 6712-7	2	6580		
101 AF 6743-6			4	6695
103 NDAF 12238Y-2	3	6579		
104 NDAF 13296Y-4	3	6306		
106 NDAF 14280CB-1	2	6573	5	6901
108 WAF 17010-9	3	6573		
109 WAF 17022-4	2	6299		
110 WAF 17022-6	2	6573		

[1] Tuber Data Rating Sytem. See reference table on page 29.

[2] Sherwin Williams color number. See text on page 2.

Table 8. External tuber characteristics of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Shape[1]	Eye Depth	Entry	Shape	Eye Depth
1 Atlantic	3	5	32 AF 6522-1	2	7
2 Chieftain	4	1	33 AF 6526-7	4	3
3 Dark Red Norland	3	3	34 AF 6527-3	4	5
4 Katahdin	3	5	35 AF 6541-3	4	7
5 Kennebec	4	5	36 AF 6543-2	3	7
6 Snowden	2	3	37 AF 6551-4	5	9
7 Superior	4	5	38 AF 6552-2	4	5
8 Yukon Gold	3	3	39 AF 6555-2	3	3
9 AF 5280-5	3	5	40 AF 6559-4	5	9
10 AF 5563-5	4	5	41 AF 6566-1	3	5
11 AF 5819-2	3	3	42 AF 6598-6	5	3
12 MSAFB 609-12	2	5	43 AF 6601-2	3	7
13 MSAFB 635-15	2	7	44 AF 6603-5	3	5
14 NC 470-3	2	1	45 AF 6606-2	4	5
15 NDAF 102629C-4	3	7	46 AF 6608-4	3	7
16 NDAF 113484B-1	2	5	47 AF 6610-2	4	3
17 NY 165	2	7	48 NDAF 13136Y-5	2	3
			49 WAF 16107-2	4	5
18 AF 6165-9	3	7	50 WAF 16134-2	3	5
19 AF 6200-7	4	9	51 WAF 16220-2	4	3
20 AF 6206-5	3	7	52 WAF 16220-4	5	7
21 AF 6237-3	3	5			
22 AF 6289-2	6	5	53 AF 5973-3	3	5
23 AF 6542-16	5	7	54 AF 6048-4	2	3
24 AF 6550-2	5	7	55 AF 6526-3	2	5
25 AF 6562-1	3	7	56 AF 6618-1	2	5
26 AF 6575-6	6	7	57 AF 6618-2	2	7
27 AF 6582-1	3	7	58 AF 6626-2	3	5
28 NDAF 12143-1	3	5	59 AF 6647-4	4	9
29 NDAF 13273-1	6	3	60 AF 6652-3	3	3
30 WAF 13058-1	2	7	61 AF 6655-1	2	7
31 WAF 15184-4	2	7	62 AF 6664-8	4	7

[1] See reference table for rating system on page 29.

Table 8 (cont.). External tuber characteristics of entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Shape[1]	Eye Depth	Entry	Shape	Eye Depth
63 AF 6664-9	3	7	90 AF 6708-2	2	5
64 AF 6665-3	3	5	91 AF 6709-4	4	5
65 AF 6668-3	2	5	92 AF 6712-7	2	7
66 AF 6669-10	3	5	93 AF 6717-1	2	7
67 AF 6670-1	4	7	94 AF 6722-3	3	7
68 AF 6671-10	5	5	95 AF 6724-2	5	5
69 AF 6675-1	4	5	96 AF 6729-1	4	1
70 AF 6680-2	4	7	97 AF 6729-2	2	3
71 AF 6684-9	4	3	98 AF 6729-6	4	7
72 AF 6686-5	4	7	99 AF 6731-1	2	5
73 AF 6687-3	5	3	100 AF 6735-2	2	5
74 AF 6688-2	2	7	101 AF 6743-6	3	5
75 AF 6688-8	3	5	102 COAF 16023-3	2	5
76 AF 6691-1	4	5	103 NDAF 12238Y-2	3	5
77 AF 6692-1	5	7	104 NDAF 13296Y-4	2	5
78 AF 6692-7	3	5	105 NDAF 14188-5	4	7
79 AF 6693-1	2	5	106 NDAF 14280CB-1	3	1
80 AF 6694-1	5	5	107 NDAF 14316CABY-3	3	7
81 AF 6694-8	2	7	108 WAF 17010-9	4	3
82 AF 6694-9	5	5	109 WAF 17022-4	2	3
83 AF 6695-3	5	5	110 WAF 17022-6	2	7
84 AF 6698-8	3	3	111 WAF 17037-1	3	5
85 AF 6698-9	2	7	112 WAF 17042-7	3	5
86 AF 6702-1	3	7	113 WAF 17045-1	3	7
87 AF 6705-2	3	7	114 WAF 17045-2	3	5
88 AF 6705-6	2	5	115 WAF 17060-5	5	1
89 AF 6705-8	4	3			

[1] See reference table for rating system on page 29.

Table 9. Internal tuber defects for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	% tubers[1] with hollow heart	% tubers with brown center	Entry	% tubers with hollow heart	% tubers with brown center
1 Atlantic	20	10	32 AF 6522-1	0	0
2 Chieftain	0	0	33 AF 6526-7	0	0
3 Dark Red Norland	0	0	34 AF 6527-3	0	0
4 Katahdin	0	0	35 AF 6541-3	0	0
5 Kennebec	10	10	36 AF 6543-2	10	0
6 Snowden	0	0	37 AF 6551-4	0	0
7 Superior	0	10	38 AF 6552-2	0	0
8 Yukon Gold	0	0	39 AF 6555-2	0	0
9 AF 5280-5	0	0	40 AF 6559-4	0	0
10 AF 5563-5	10	0	41 AF 6566-1	0	0
11 AF 5819-2	0	0	42 AF 6598-6	0	0
12 MSAFB 609-12	0	0	43 AF 6601-2	0	0
13 MSAFB 635-15	0	0	44 AF 6603-5	0	0
14 NC 470-3	0	0	45 AF 6606-2	0	0
15 NDAF 102629C-4	0	0	46 AF 6608-4	0	0
16 NDAF 113484B-1	0	0	47 AF 6610-2	0	0
17 NY 165	0	0	48 NDAF 13136Y-5	0	0
			49 WAF 16107-2	0	0
18 AF 6165-9	0	0	50 WAF 16134-2	0	0
19 AF 6200-7	0	0	51 WAF 16220-2	0	0
20 AF 6206-5	0	0	52 WAF 16220-4	0	0
21 AF 6237-3	0	0			
22 AF 6289-2	0	0	53 AF 5973-3	0	0
23 AF 6542-16	0	0	54 AF 6048-4	0	0
24 AF 6550-2	0	0	55 AF 6526-3	0	0
25 AF 6562-1	0	0	56 AF 6618-1	10	10
26 AF 6575-6	0	0	57 AF 6618-2	20	10
27 AF 6582-1	10	0	58 AF 6626-2	0	0
28 NDAF 12143-1	0	0	59 AF 6647-4	0	0
29 NDAF 13273-1	0	0	60 AF 6652-3	0	0
30 WAF 13058-1	0	0	61 AF 6655-1	0	0
31 WAF 15184-4	0	0	62 AF 6664-8	0	0

[1] % of tubers out of 10 tubers that contain the defect.

Table 9 (cont.). Internal tuber defects for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	% tubers[1] with hollow heart	% tubers with brown center	Entry	% tubers with hollow heart	% tubers with brown center
63 AF 6664-9	20	10	90 AF 6708-2	0	0
64 AF 6665-3	0	0	91 AF 6709-4	0	0
65 AF 6668-3	0	0	92 AF 6712-7	0	0
66 AF 6669-10	0	0	93 AF 6717-1	0	0
67 AF 6670-1	20	0	94 AF 6722-3	0	0
68 AF 6671-10	0	0	95 AF 6724-2	0	10
69 AF 6675-1	0	0	96 AF 6729-1	0	0
70 AF 6680-2	0	0	97 AF 6729-2	0	0
71 AF 6684-9	0	0	98 AF 6729-6	0	0
72 AF 6686-5	0	0	99 AF 6731-1	10	0
73 AF 6687-3	0	0	100 AF 6735-2	0	0
74 AF 6688-2	0	0	101 AF 6743-6	0	0
75 AF 6688-8	0	0	102 COAF 16023-3	0	0
76 AF 6691-1	0	0	103 NDAF 12238Y-2	0	0
77 AF 6692-1	0	0	104 NDAF 13296Y-4	0	0
78 AF 6692-7	0	0	105 NDAF 14188-5	0	0
79 AF 6693-1	0	0	106 NDAF 14280CB-1	0	0
80 AF 6694-1	0	0	107 NDAF 14316CABY-3	0	0
81 AF 6694-8	0	0	108 WAF 17010-9	0	0
82 AF 6694-9	0	0	109 WAF 17022-4	0	0
83 AF 6695-3	0	0	110 WAF 17022-6	0	0
84 AF 6698-8	0	0	111 WAF 17037-1	0	10
85 AF 6698-9	0	0	112 WAF 17042-7	0	0
86 AF 6702-1	0	0	113 WAF 17045-1	0	0
87 AF 6705-2	0	0	114 WAF 17045-2	10	0
88 AF 6705-6	0	0	115 WAF 17060-5	0	0
89 AF 6705-8	0	0			

[1] % of tubers out of 10 tubers that contain the defect.

Table 9 (cont.). Internal tuber defects for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	% tubers[1] with necrosis	% tubers with vasc. discoloration	Entry	% tubers with necrosis	% tubers with vasc. discoloration
1 Atlantic	30	0	32 AF 6522-1	10	0
2 Chieftain	40	0	33 AF 6526-7	0	0
3 Dark Red Norland	0	0	34 AF 6527-3	0	0
4 Katahdin	10	20	35 AF 6541-3	0	0
5 Kennebec	0	0	36 AF 6543-2	0	10
6 Snowden	0	20	37 AF 6551-4	0	0
7 Superior	0	0	38 AF 6552-2	0	0
8 Yukon Gold	10	0	39 AF 6555-2	10	0
9 AF 5280-5	0	0	40 AF 6559-4	0	0
10 AF 5563-5	0	0	41 AF 6566-1	30	0
11 AF 5819-2	0	10	42 AF 6598-6	10	0
12 MSAFB 609-12	0	10	43 AF 6601-2	0	0
13 MSAFB 635-15	0	10	44 AF 6603-5	0	0
14 NC 470-3	0	0	45 AF 6606-2	10	0
15 NDAF 102629C-4	0	0	46 AF 6608-4	0	0
16 NDAF 113484B-1	0	0	47 AF 6610-2	10	0
17 NY 165	0	0	48 NDAF 13136Y-5	10	0
			49 WAF 16107-2	0	0
18 AF 6165-9	0	20	50 WAF 16134-2	0	0
19 AF 6200-7	0	0	51 WAF 16220-2	0	20
20 AF 6206-5	0	0	52 WAF 16220-4	0	0
21 AF 6237-3	0	0			
22 AF 6289-2	0	0	53 AF 5973-3	0	10
23 AF 6542-16	0	10	54 AF 6048-4	0	0
24 AF 6550-2	0	10	55 AF 6526-3	20	0
25 AF 6562-1	0	0	56 AF 6618-1	0	0
26 AF 6575-6	0	0	57 AF 6618-2	0	0
27 AF 6582-1	0	0	58 AF 6626-2	20	10
28 NDAF 12143-1	0	0	59 AF 6647-4	0	0
29 NDAF 13273-1	0	0	60 AF 6652-3	0	10
30 WAF 13058-1	0	0	61 AF 6655-1	0	0
31 WAF 15184-4	10	10	62 AF 6664-8	0	0

[1] % of tubers out of 10 tubers that contain the defect.

Table 9 (cont.). Internal tuber defects for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	% tubers[1] with necrosis	% tubers with vasc. discoloration	Entry	% tubers with necrosis	% tubers with vasc. discoloration
63 AF 6664-9	10	0	90 AF 6708-2	20	0
64 AF 6665-3	10	0	91 AF 6709-4	0	0
65 AF 6668-3	10	0	92 AF 6712-7	0	0
66 AF 6669-10	10	10	93 AF 6717-1	0	0
67 AF 6670-1	100	0	94 AF 6722-3	0	0
68 AF 6671-10	0	0	95 AF 6724-2	0	0
69 AF 6675-1	0	0	96 AF 6729-1	20	10
70 AF 6680-2	0	0	97 AF 6729-2	0	0
71 AF 6684-9	0	10	98 AF 6729-6	0	0
72 AF 6686-5	10	0	99 AF 6731-1	10	0
73 AF 6687-3	0	0	100 AF 6735-2	0	0
74 AF 6688-2	0	10	101 AF 6743-6	0	0
75 AF 6688-8	0	0	102 COAF 16023-3	0	0
76 AF 6691-1	0	0	103 NDAF 12238Y-2	0	0
77 AF 6692-1	0	0	104 NDAF 13296Y-4	0	0
78 AF 6692-7	20	0	105 NDAF 14188-5	0	0
79 AF 6693-1	10	0	106 NDAF 14280CB-1	0	0
80 AF 6694-1	0	0	107 NDAF 14316CABY-3	0	0
81 AF 6694-8	0	10	108 WAF 17010-9	20	0
82 AF 6694-9	0	0	109 WAF 17022-4	0	10
83 AF 6695-3	0	0	110 WAF 17022-6	10	0
84 AF 6698-8	10	10	111 WAF 17037-1	0	10
85 AF 6698-9	10	10	112 WAF 17042-7	0	0
86 AF 6702-1	0	0	113 WAF 17045-1	10	0
87 AF 6705-2	0	0	114 WAF 17045-2	0	0
88 AF 6705-6	0	0	115 WAF 17060-5	0	0
89 AF 6705-8	0	0			

[1] % of tubers out of 10 tubers that contain the defect.

Table 10. Overall quality for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Overall[1] Appearance	% tubers[2] with defects	Entry	Overall Appearance	% tubers with defects
1 Atlantic	5	30	32 AF 6522-1	7	10
2 Chieftain	7	40	33 AF 6526-7	7	0
3 Dark Red Norland	7	0	34 AF 6527-3	9	0
4 Katahdin	7	30	35 AF 6541-3	9	0
5 Kennebec	5	10	36 AF 6543-2	9	20
6 Snowden	7	20	37 AF 6551-4	9	0
7 Superior	7	10	38 AF 6552-2	7	0
8 Yukon Gold	5	10	39 AF 6555-2	5	10
9 AF 5280-5	7	0	40 AF 6559-4	7	0
10 AF 5563-5	7	10	41 AF 6566-1	5	30
11 AF 5819-2	7	10	42 AF 6598-6	5	10
12 MSAFB 609-12	9	10	43 AF 6601-2	5	0
13 MSAFB 635-15	5	10	44 AF 6603-5	5	0
14 NC 470-3	9	0	45 AF 6606-2	5	10
15 NDAF 102629C-4	7	0	46 AF 6608-4	5	0
16 NDAF 113484B-1	9	0	47 AF 6610-2	5	10
17 NY 165	9	0	48 NDAF 13136Y-5	7	10
			49 WAF 16107-2	7	0
18 AF 6165-9	7	20	50 WAF 16134-2	3	0
19 AF 6200-7	5	0	51 WAF 16220-2	7	20
20 AF 6206-5	7	0	52 WAF 16220-4	5	0
21 AF 6237-3	9	0			
22 AF 6289-2	9	0	53 AF 5973-3	7	10
23 AF 6542-16	3	10	54 AF 6048-4	9	0
24 AF 6550-2	7	10	55 AF 6526-3	5	20
25 AF 6562-1	7	0	56 AF 6618-1	9	10
26 AF 6575-6	7	0	57 AF 6618-2	9	30
27 AF 6582-1	9	10	58 AF 6626-2	7	20
28 NDAF 12143-1	9	0	59 AF 6647-4	7	0
29 NDAF 13273-1	9	0	60 AF 6652-3	9	10
30 WAF 13058-1	7	0	61 AF 6655-1	7	0
31 WAF 15184-4	5	20	62 AF 6664-8	5	0

[1] See reference table for rating system on page 29.

[2] % of tubers out of 10 tubers that contain defects.

Table 10 (cont.). Overall quality for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Overall[1] Appearance	% tubers[2] with defects	Entry	Overall Appearance	% tubers with defects
63 AF 6664-9	5	30	90 AF 6708-2	7	20
64 AF 6665-3	5	10	91 AF 6709-4	7	0
65 AF 6668-3	7	10	92 AF 6712-7	7	0
66 AF 6669-10	7	20	93 AF 6717-1	7	0
67 AF 6670-1	7	100	94 AF 6722-3	7	0
68 AF 6671-10	9	0	95 AF 6724-2	5	10
69 AF 6675-1	7	0	96 AF 6729-1	7	20
70 AF 6680-2	9	0	97 AF 6729-2	7	0
71 AF 6684-9	7	10	98 AF 6729-6	7	0
72 AF 6686-5	5	10	99 AF 6731-1	9	20
73 AF 6687-3	7	0	100 AF 6735-2	9	0
74 AF 6688-2	7	10	101 AF 6743-6	9	0
75 AF 6688-8	5	0	102 COAF 16023-3	7	0
76 AF 6691-1	5	0	103 NDAF 12238Y-2	9	0
77 AF 6692-1	9	0	104 NDAF 13296Y-4	9	0
78 AF 6692-7	9	20	105 NDAF 14188-5	9	0
79 AF 6693-1	7	10	106 NDAF 14280CB-1	9	0
80 AF 6694-1	9	0	107 NDAF 14316CABY-3	7	0
81 AF 6694-8	9	10	108 WAF 17010-9	5	20
82 AF 6694-9	9	0	109 WAF 17022-4	9	10
83 AF 6695-3	9	0	110 WAF 17022-6	9	10
84 AF 6698-8	7	20	111 WAF 17037-1	7	20
85 AF 6698-9	9	20	112 WAF 17042-7	7	0
86 AF 6702-1	7	0	113 WAF 17045-1	5	10
87 AF 6705-2	9	0	114 WAF 17045-2	7	10
88 AF 6705-6	9	0	115 WAF 17060-5	7	0
89 AF 6705-8	9	0			

[1] See reference table for rating system on page 29.

[2] % of tubers out of 10 tubers that contain defects.

Table 11. Specific gravity and chip quality for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Specific[1] Gravity	Chip[2] Color	%[3] Blister	Entry	Specific Gravity	Chip Color	% Blister
1 Atlantic	1.078	2	12	32 AF 6522-1	1.076	2	20
2 Chieftain	1.067	4	12	33 AF 6526-7	1.084	2	24
3 Dark Red Norland	1.058	5	0	34 AF 6527-3	1.083	ND	ND
4 Katahdin	1.059	4	8	35 AF 6541-3	1.067	2	20
5 Kennebec	1.068	3	20	36 AF 6543-2	1.074	2	4
6 Snowden	1.079	3	8	37 AF 6551-4	1.065	2	8
7 Superior	1.066	4	8	38 AF 6552-2	1.075	2	5
8 Yukon Gold	1.070	5	12	39 AF 6555-2	1.075	2	24
9 AF 5280-5	1.059	1	40	40 AF 6559-4	1.071	3	8
10 AF 5563-5	1.074	1	8	41 AF 6566-1	1.083	ND	ND
11 AF 5819-2	1.061	2	16	42 AF 6598-6	1.072	2	25
12 MSAFB 609-12	1.081	2	36	43 AF 6601-2	1.074	2	40
13 MSAFB 635-15	1.081	2	20	44 AF 6603-5	1.077	2	4
14 NC 470-3	1.077	3	20	45 AF 6606-2	1.070	ND	ND
15 NDAF 102629C-4	1.063	1	4	46 AF 6608-4	1.079	ND	ND
16 NDAF 113484B-1	1.059	3	4	47 AF 6610-2	1.071	ND	ND
17 NY 165	1.079	2	4	48 NDAF 13136Y-5	1.063	ND	ND
				49 WAF 16107-2	1.083	1	25
18 AF 6165-9	1.084	2	4	50 WAF 16134-2	1.083	1	12
19 AF 6200-7	1.089	2	20	51 WAF 16220-2	1.070	2	16
20 AF 6206-5	1.084	2	10	52 WAF 16220-4	1.080	2	32
21 AF 6237-3	1.082	1	20				
22 AF 6289-2	1.065	5	0	53 AF 5973-3	1.083	2	12
23 AF 6542-16	1.077	2	24	54 AF 6048-4	1.062	ND	ND
24 AF 6550-2	1.082	2	40	55 AF 6526-3	1.085	2	20
25 AF 6562-1	1.064	2	10	56 AF 6618-1	1.081	ND	ND
26 AF 6575-6	1.074	2	12	57 AF 6618-2	1.083	3	8
27 AF 6582-1	1.083	2	48	58 AF 6626-2	1.084	2	12
28 NDAF 12143-1	1.062	4	4	59 AF 6647-4	1.076	2	16
29 NDAF 13273-1	1.062	5	4	60 AF 6652-3	1.077	4	8
30 WAF 13058-1	1.070	2	10	61 AF 6655-1	1.080	3	12
31 WAF 15184-4	1.088	1	8	62 AF 6664-8	1.077	3	10

[1] Corrected values. See calculations on page 3 and reference table on page 31 for starch and dry matter conversions.

[2] SFA Standard (1=light, 6 =dark).

[3] Percentage of chips that developed blisters greater than 1 cm in diameter during the frying process.

ND=No data collected.

Table 11 (cont.). Specific gravity and chip quality for entries grown in potato germplasm evaluations at the OSU-OARDC in Wooster, OH in 2021.

Entry	Specific[1] Gravity	Chip[2] Color	%[3] Blister	Entry	Specific Gravity	Chip Color	% Blister
63 AF 6664-9	1.075	ND	ND	90 AF 6708-2	1.058	ND	ND
64 AF 6665-3	1.080	ND	ND	91 AF 6709-4	1.058	ND	ND
65 AF 6668-3	1.079	4	8	92 AF 6712-7	1.064	ND	ND
66 AF 6669-10	1.080	2	8	93 AF 6717-1	1.070	3	20
67 AF 6670-1	1.083	4	8	94 AF 6722-3	1.076	ND	ND
68 AF 6671-10	1.085	2	28	95 AF 6724-2	1.071	2	0
69 AF 6675-1	1.076	2	8	96 AF 6729-1	1.071	4	12
70 AF 6680-2	1.077	2	4	97 AF 6729-2	1.066	4	12
71 AF 6684-9	1.081	3	12	98 AF 6729-6	1.071	4	12
72 AF 6686-5	1.084	2	16	99 AF 6731-1	1.072	3	32
73 AF 6687-3	1.081	2	4	100 AF 6735-2	1.068	3	10
74 AF 6688-2	1.062	2	12	101 AF 6743-6	1.088	ND	ND
75 AF 6688-8	1.075	3	8	102 COAF 16023-3	1.073	3	12
76 AF 6691-1	1.061	5	0	103 NDAF 12238Y-2	1.066	ND	ND
77 AF 6692-1	1.063	ND	ND	104 NDAF 13296Y-4	1.061	ND	ND
78 AF 6692-7	1.059	ND	ND	105 NDAF 14188-5	1.073	2	4
79 AF 6693-1	1.059	ND	ND	106 NDAF 14280CB-1	1.063	ND	ND
80 AF 6694-1	1.065	ND	ND	107 NDAF 14316CABY-3	1.074	3	8
81 AF 6694-8	1.065	ND	ND	108 WAF 17010-9	1.063	ND	ND
82 AF 6694-9	1.063	ND	ND	109 WAF 17022-4	1.059	ND	ND
83 AF 6695-3	1.063	ND	ND	110 WAF 17022-6	1.060	ND	ND
84 AF 6698-8	1.059	ND	ND	111 WAF 17037-1	1.082	2	4
85 AF 6698-9	1.059	ND	ND	112 WAF 17042-7	1.064	1	0
86 AF 6702-1	1.065	ND	ND	113 WAF 17045-1	1.076	3	4
87 AF 6705-2	1.062	ND	ND	114 WAF 17045-2	1.083	2	28
88 AF 6705-6	1.062	ND	ND	115 WAF 17060-5	1.086	2	8
89 AF 6705-8	1.058	ND	ND				

[1] Corrected values. See calculations on page 3 and reference table on page 31 for starch and dry matter conversions.

[2] SFA Standard (1=light, 6 =dark).

[3] Percentage of chips that developed blisters greater than 1 cm in diameter during the frying process.

ND=No data collected.

TUBER DATA RATING SYSTEM

Skin Color
1. Purple
2. Red
3. Pink
4. Dark Brown
5. Brown
6. Tan
7. Buff
8. White
9. Cream

Skin Texture
1. Part. russet
2. Heavy russet
3. Mod. russet
4. Light russet
5. Netted
6. Slight netting
7. Mod. smooth
8. Smooth
9. Very smooth

Shape
1. Round
2. Mostly round
3. Round to oblong
4. Mostly oblong
5. Oblong
6. Oblong to long
7. Mostly long
8. Long
9. Cylindrical

Eye Depth
1. Very deep
2. --
3. Deep
4. --
5. Intermediate
6. --
7. Shallow
8. --
9. Very Shallow

Appearance
1. Very poor
2. –
3. Poor
4. –
5. Fair
6. –
7. Good
8. –
9. Excellent

Flesh Color
1. White
2. Cream
3. Light Yellow
4. Med. Yellow
5. Dark Yellow/Orange
6. Pink
7. Red
8. Blue
9. Purple

TEMPERATURE CORRECTION

The pulp temperature of the potatoes and the temperature of the water shall be recorded immediately before testing and the specific gravity reading corrected as indicated in the following table:

Correction Factors for Specific Gravity of Potatoes*

(Corrected to Zero Base of 50° Tuber Temperatures and 50° Water Temperature)

Water Temperature Degrees Fahrenheit

Tuber Temperature	38°	40°	45°	50°	55°	60°	65°	70°	75°	80°
38°	-.0021	-.0020	-.0018	-.0018	-.0020	-.0023	-.0029	-.0038	-.0047	-.0056
40°	-.0017	-.0018	-.0014	-.0014	-.0016	-.0019	-.0025	-.0034	-.0043	-.0052
45°	-.0009	-.0008	-.0006	-.0006	-.0008	-.0011	-.0017	-.0026	-.0035	-.0044
50°	-.0003	-.0002	0	0	-.0002	-.0005	-.0011	-.0020	-.0029	-.0038
55°	+.0001	+.0002	+.0004	+.0004	+.0002	-.0001	-.0007	-.0016	-.0025	-.0034
60°	+.0004	+.0005	+.0007	+.0007	+.0005	+.0002	-.0004	-.0013	-.0022	-.0031
65°	+.0005	+.0006	+.0008	+.0008	+.0008	+.0003	-.0003	-.0012	-.0021	-.0030
70°	+.0006	+.0007	+.0009	+.0009	+.0007	+.0004	-.0002	-.0011	-.0020	-.0029
75°	+.0007	+.0008	+.0010	+.0010	+.0008	+.0005	-.0001	-.0010	-.0019	-.0028
80°	+.0008	+.0009	+.0011	+.0011	+.0009	+.0006	0	-.0009	-.0018	-.0027
85°	+.0009	+.0010	+.0012	+.0012	+.0010	+.0007	+.0001	-.0008	-.0017	-.0026
90°	+.0010	+.0011	+.0013	+.0013	+.0011	+.0008	+.0002	-.0007	-.0016	-.0025
95°	+.0011	+.0012	+.0014	+.0014	+.0012	+.0009	+.0003	-.0006	-.0015	-.0024
100°	+.0012	+.0013	+.0015	+.0015	+.0013	+.0010	+.0004	-.0005	-.0014	-.0023

* To apply correction factor, change actual specific gravity reading by adding or subtracting the appropriate factor according to the plus or minus sign.

This table is copied and referenced from the Snack Food Association's (nka SNAC International) Potato Hydrometer Information and Instructions Booklet

Conversion Table for Specific Gravity of Potato Tubers to Content of Starch and Dry Matter % (Calculated from Von Scheele equations: % starch = 17.565 + 199.07 (Sp. Gr.-1.0988); % dry matter = 24.181 + 211.04 (Sp. Gr.-1.0988)

Specific Gravity	Starch %	Dry Matter %	Specific Gravity	Starch %	Dry Matter %
1.050	7.85	13.88	1.081	14.02	20.43
1.051	8.05	14.09	1.082	14.22	20.64
1.052	8.25	14.31	1.083	14.42	20.85
1.053	8.45	14.32	1.084	14.62	21.06
1.054	8.65	14.73	1.085	14.82	21.27
1.055	8.85	14.94	1.086	15.02	21.48
1.056	9.04	15.15	1.987	15.22	21.69
1.057	9.24	15.38	1.088	15.41	21.90
1.058	9.44	15.57	1.089	15.61	22.11
1.059	9.64	15.78	1.090	15.81	22.33
1.060	9.84	15.99	1.091	16.01	22.54
1.061	10.04	16.21	1.092	16.20	22.75
1.062	10.24	16.42	1.093	16.41	22.96
1.063	10.44	16.63	1.094	16.61	23.17
1.064	10.64	16.84	1.095	16.81	23.38
1.065	10.84	17.05	1.096	17.01	23.59
1.066	11.04	17.26	1.097	17.21	23.89
1.067	11.23	17.47	1.098	17.41	24.01
1.068	11.43	17.68	1.099	17.60	24.22
1.069	11.63	17.89	1.100	17.80	24.44
1.070	11.83	18.10	1.101	18.00	24.65
1.071	12.03	18.32	1.102	18.20	24.86
1.072	12.23	18.53	1.103	18.40	25.07
1.073	12.43	18.74	1.104	18.60	25.28
1.074	12.63	18.95	1.105	18.80	25.49
1.075	12.83	19.16	1.106	19.00	25.70
1.076	13.03	19.37	1.107	19.20	25.91
1.077	13.22	19.58	1.180	19.40	26.12
1.078	13.42	19.79	1.109	29.60	26.34
1.079	13.62	20.00	1.110	19.79	26.55
1.080	13.82	20.21	1.111	19.99	26.76

Factors Affecting the Specific Gravity of the White Potato in Maine. Maine Agricultural Experiment Station. Bulletin 583. May 1959.

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External and Internal Quality and Potato Chip Images for NE-1731

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3 - Dark Red Norland

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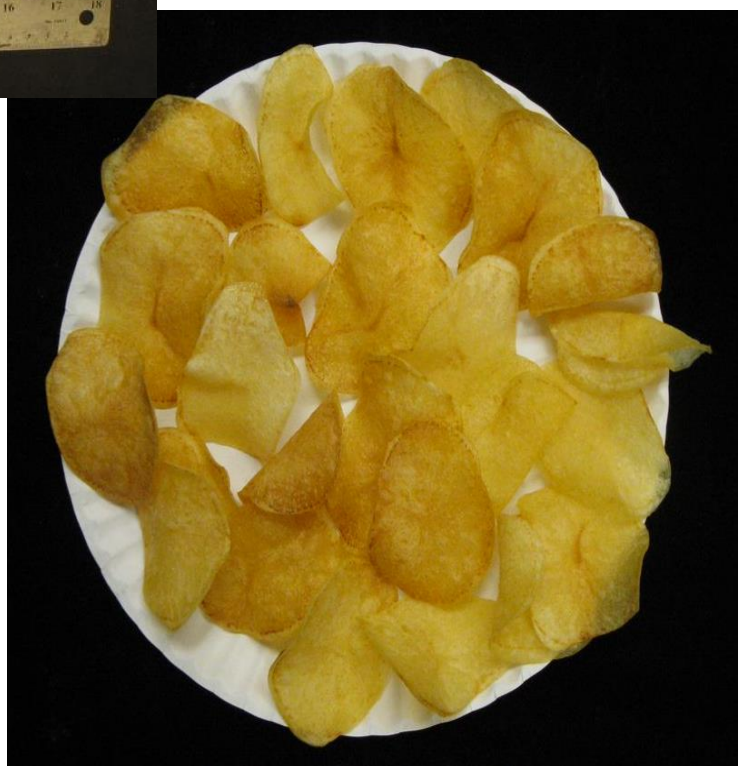

4 - Katahdin

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5 - Kennebec

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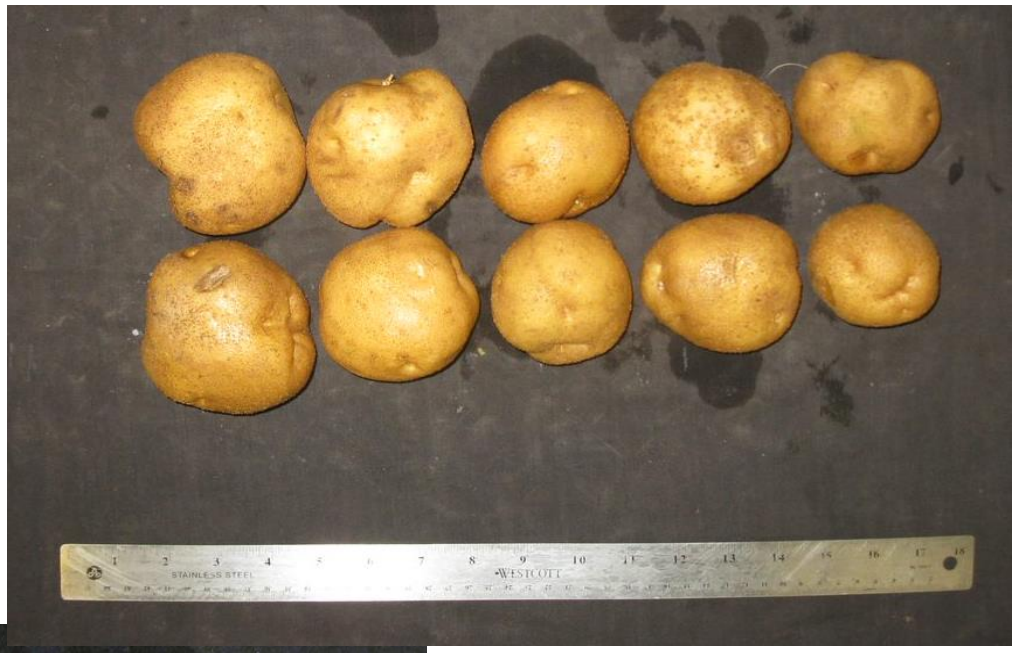

6 - Snowden

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7 - Superior

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8 - Yukon Gold

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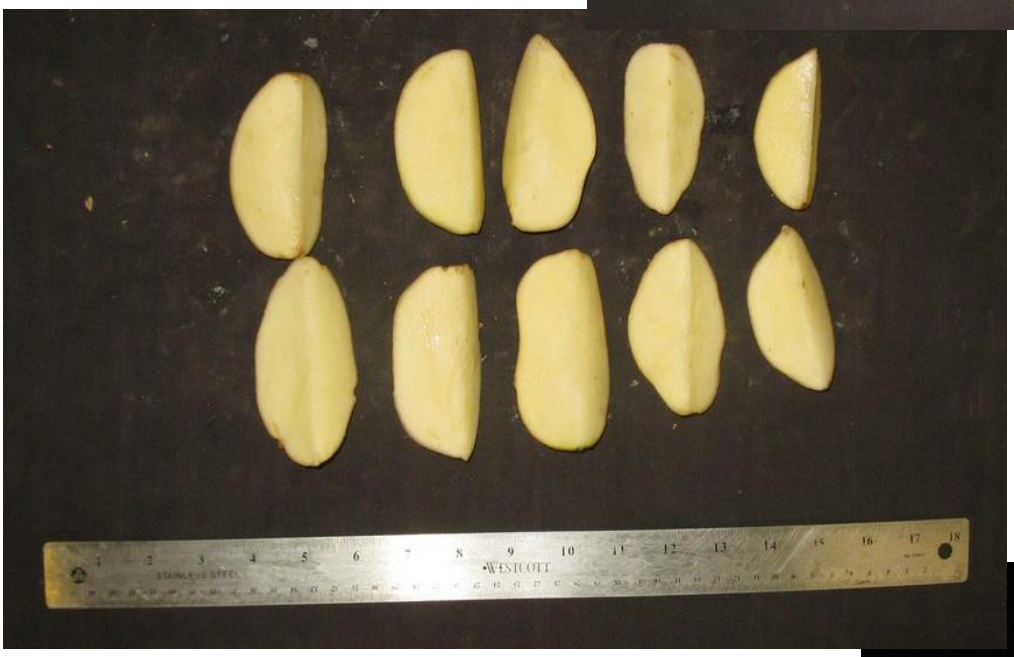

9 - AF 5280-5

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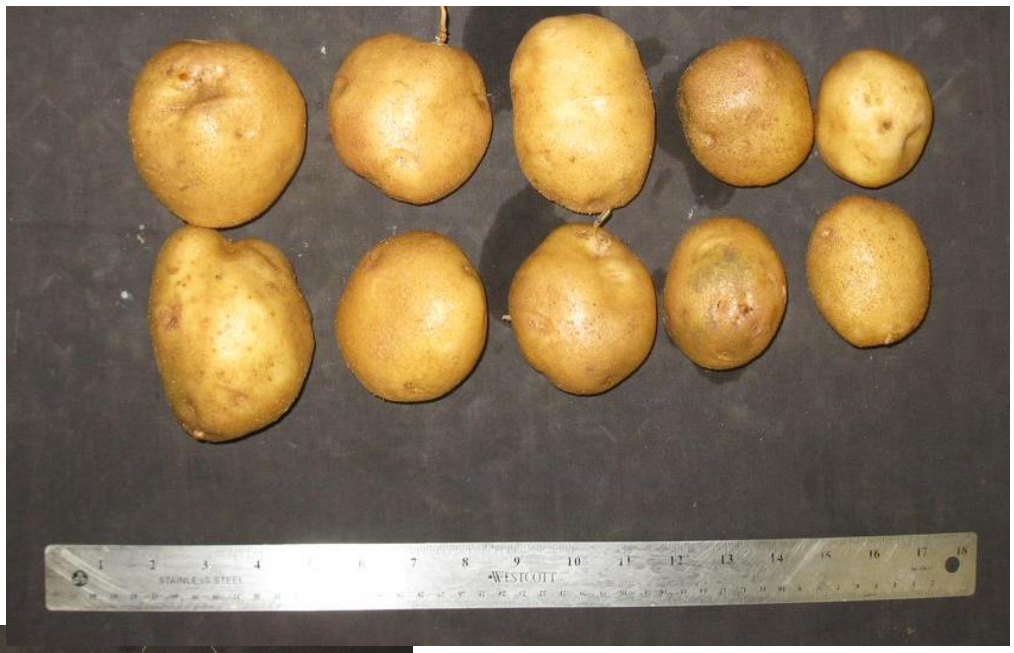

17 - NY 165

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