



Agronomy Facts No. 54 November 9, 2020

2020 Maryland Corn Hybrid Performance Tests

http://www.psla.umd.edu/extension/md-crops

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Test Procedures

The University of Maryland offers a fee-based, corn hybrid performance testing program to local and national seed companies. The results from these replicated trials provide agronomic performance information about corn hybrids tested at five locations in Maryland considered representative of the state's geography and weather conditions. Table 1 summarizes the agronomic and production information for each test site.

Hybrids tested in 2020 were entered by participating seed companies, listed in Table 2, that were solicited for submission of hybrids. These hybrids represented those currently available for purchase to experimental lines still under evaluation. Select Dekalb, Mid-Atlantic Seed, and Pioneer hybrids were identified for use as checks in the test. The inclusion of the performance data for check hybrids that are proven performers in the Mid-Atlantic region allows comparisons of newer hybrids to proven hybrids.

During 2020, 64 hybrids were tested using three maturity groups: early season (13 hybrids, Table 5), mid-season (20 hybrids, Table 6), and full season (31 hybrids, Table 7). Each company designated maturity group assignments for hybrids they submitted. Check hybrids were included in each of the five tests. All hybrid genetic traits and seed treatments are listed in Tables 5-7.

Each hybrid was replicated three times per location. Planting was done with a modified, four-row John Deere 1750 planter equipped with coulters and trash wheels for no-till planting. The modified planter units were manufactured by Clewell Precision Machine, Inc. Milton, PA. Each plot was four rows spaced 30 inches apart. Target population was 30,000 seeds per acre at dryland locations and 34,500 seeds per acre at the irrigated location (Salisbury Facility). Plot harvest length was approximately 32 feet. Harvest stand and number of lodged plants were counted within two weeks of harvest. The center two rows of each plot were harvested with an Almaco R1 research combine (Almaco Co., Nevada, IA). Grain yield, harvest moisture, and test weight were measured for each plot. These data were collected with a Seed Spector LRX system (Almaco Co., Nevada, IA) and recorded on Microsoft xTablet T1600.

Test Results

The overall performance across the locations for the hybrids in each maturity group is reported in Tables 8-10. Hybrid performance at individual locations can be found in Tables 11-25. The agronomic characteristics reported are yield, in bushels/acre at 15% moisture content, harvest moisture content, percent lodging, test weight (lb/bu) at 15% moisture, and harvest population.

This year's weather proved to be a challenge, fitting for the world's events in 2020. Some areas of the state were dealing with near-drought conditions while excessive precipitation plagued other areas of the state to the point that harvest (and subsequent planting of small grains and cover crops) was delayed (Table 3). Yields were generally lower this year; averaged over the five locations, yield for early (15), mid-season (20), and full-season (31) varieties was 157 bu/ac, 167 bu/ac, and 166 bu/ac respectively. These yields were -20%, -16%, and -20%, respectively, to those observed for early, mid-, and full-season hybrids in 2019.

A least significant difference (LSD) value is reported for each test where statistical significant differences ($P \le 0.1$) for a variable were observed among hybrids. The mean separation value has been calculated at the 10% probability level (LSD_{0.1}). The LSD can be used to compare two hybrids within the

same test. For example, when the yield difference between two hybrids is greater than the LSD value, there is a 90% certainty that the difference in yield is real rather than due to random variability. The coefficient of variation (CV) is a measure of the variability that existed at a test site. It is used as an indicator of the degree of precision for a test. In general, CV values below 10% for yield indicate that the precision for distinguishing yield differences was very good. Generally, CV values were mostly low this year, with at least one maturity group at each location lacking power to determine differences in yield among the hybrids.

Relative Yield

The selection of a hybrid or hybrids based solely on performance at one location is not recommended. It is better to select hybrids based upon performance over a number of locations and years, if possible. In order to compare the performance of each hybrid across the five locations, relative yield tables (Tables 26-28) are included. Relative yield is the ratio of the yield of a hybrid at a location to the mean yield of all the hybrids at that location expressed in percentage. A hybrid that has a relative yield consistently greater than 100 across all testing locations is considered to have excellent stability. In 2020, 8 hybrids met this standard: Seed Consultants SCS 1071AM (early), Dekalb DKC59-82RIB, DKC61-41RIB, Hubner H4321RC2P, and Local Seed LCX10-20 VT2P (mid), and Dekalb DKC70-27RIB, Hubner H4744RC2P, and Local Seed LC1488 VT2PRIB (full). Thirteen hybrids (3 early season, 1 midseason, 9 full season) had relative yield greater than 100 at four locations, a mark of good stability.

Acknowledgments

The University of Maryland Corn Testing Program would not be possible without the assistance and oversight of equipment maintenance, seed packaging, planting, data collection, and plot harvest by lead research technician, Louis Thorne. This work could not be accomplished without the assistance of research technician Joseph Crank during the season. Also, we acknowledge the undergraduate students for their assistance with seed packaging. Huge thanks go to Dr. Bob Kratochvil for his many years of work developing the protocols for the corn testing program and the undoubtable number of hours that he dedicated to the preparation of these reports. Thank you to the crews at Wye Research and Education Center and Lower Eastern Shore Research and Education Center for sharing your experience, tools, and space in your shops with Louis Thorne as he continues to keep our equipment running. Table 1 outlines the crews at each test location who assisted with land preparation, flagging, plot management, and harvest. I personally would like to acknowledge each farm manager, David Armentrout, John Draper, David Justice, and Ryan McDonald for their continued support of the corn testing program and their continued patience with me.

Additional Information

The inclusion of hybrids in these tests is not an endorsement by the University of Maryland. Advertising statements about a company's hybrids can be made as long as they are accurate statements about the data as published. Statements similar to "See the Maryland Corn Hybrid Tests Agronomy Facts No. 54" or "Endorsement or recommendation by the University of Maryland is not implied" must accompany any reproduced information.

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Table 1. Production management practices used and other information for the locations of the 2020 Maryland Corn Hybrid Test

Location	Soil Type and Previous Crop	Fertilizer	Herbicides & Insecticides	Tillage	Plant and Harvest Dates	Farm Staff
Wye R&E Center Queenstown, MD	Nassawango silt loam Soybean then rye cover crop	29 April: 165 lb/a as 19-13-0 13 May: 148 lb N/a as 30% UAN 10 June: 160 lb/a as 8-20-5 Total 193-54-8	9 Apr – Pre-Plant: Helosate @ 1 qt/a 14 May – Pre-Emerge: Atrazine 4L @ 1 qt/a Corvus @ 5.6 oz/a	Turbo Till and ripper with aid of trash wheels on planter	Plant 29 April <u>Harvest</u> 22 September	John Draper Joseph Streett Thomas Eason
Lower Eastern Shore R&E Center Poplar Hill Facility Quantico, MD	Nassawango silt loam Soybean then wheat cover crop	17 April: 446 lb/ac as 9-0-36-9S 3 June: 85 lb/a as 19-19-0-1Zn-0.7B 126 lb N/a as 30% UAN 4 June: 50 lb N/a as 30% UAN Total 233-16-160-0.3Zn-0.1B	14 April Pre-Plant Gramoxone @ 1 qt/a 2-4D Ester @ 1 pt/a 80 20 Scanner @ 6 fl oz/a 5 May Pre-Emerge Harness Xtra @ 2.5 qt/a 1 June Post-Emerge RoundUp @ 1 qt/a Aatrex 90 @ 0.5 lb/a	No tillage with use of trash wheels on planter	Plant 5 May Harvest 28 Sept (early, mid) 2 October (full)	David Armentrout Vivian Calder Jordan Miller Fred Senkbeil
Lower Eastern Shore R&E Center Salisbury Facility Salisbury, MD	Fort Mott loamy sand Soybean then wheat cover crop	17 April: 446 lb/a as 9-0-36-9S 5 May: 165 lb/a as 19-13-0 2 June: 80 lb N as 30% UAN 8 June: 80 lb N as 30% UAN Total 269-60-160-42S-0.3Zn-0.1B	14 April Pre-Plant: Gramoxone @ 1qt/a 2,4D Ester @ 1pt/a 80-20 Scanner @ 6 fl oz/a 5 May Pre-Emerge: Harness Xtra @ 2.5 qt/a RoundUp @ 1 pt/a 29 May Post-Emerge: RoundUp @ 1 qt/a Aatrex90 @ 0.5 lb/a	No tillage with use of trash wheels on planter	Plant 5 May Harvest 2 October 3 October	David Armentrout Vivian Calder David Long James Lynch Jordan Miller Fred Senkbeil
Central Maryland R&E Center Clarksville Facility Clarksville, MD	Glenville silt loam Soybean then rye	3 April: 132 lb N as 30% UAN 7 May: 250 lb/a as 4-12-36 12 May: 165 lb/a as 19-13-0 Total 173-51-90	Mid-April Pre Plan: Roundup Pwr Max @ 24 oz/a Sharpen @ 2 oz/a 12 May Pre Emerge Lexar EZ @ 3 qt/a Gramoxone SL 2 pt/a	No tillage with use of trash wheels on planter	Plant 12 May Harvest 28 October	Michael Dwyer David Justice Michael Gray
Western Maryland R&E Center Keedysville, MD	Swanpond – Funkstown silt loam Wheat then double crop soybeans	15 Apr 304 lbs/ac as 16-7-26-5S-0.16B 14 May 165 lb/a as 19-13-0 130 lb N/a of 30% UAN Total 211-43-79-3S-0.5B	14 May Pre-Emerge Acuron @ 2.5 qt/a Atrazine @ 1 qt/a Gramoxone @ 1 qt/a 2,4 D @ 0.5 qt/a Surfactant 1 qt/100 gal	No tillage with use of trash wheels on planter	<u>Plant</u> 14 May <u>Harvest</u> 4 November	Ryan McDonald Douglas Price David Wyand

Table 2. Brands and companies in the 2020 Maryland corn hybrid trials

Brand	Address
Dekalb	800 N. Lindbergh Blvd., St. Louis, MO 63167
	www.dekalbasgrowdeltapine.com
Dyna-Gro	Nutrien Ag Solution, 396 Washington St., Boydton, VA 23917
	www.dynagroseed.com
Hubner	Hubner Seed Company, 306 North Main St., Monticello, IN 47960
	www.hubnerseed.com
Local Seed Company	802 Rozelle St., Memphis, TN 38104
	www.localseed.com
Mid-Atlantic Seeds	Mid-Atlantic Seeds, 316 N Albemarle St., York, PA 17402
	www.midatlanticseeds.com
Pioneer	DuPont-Pioneer, PO Box 1000, Johnston, IA 50131
	www.pioneer.com
Seed Consultants	648 Miami Trace Rd SW, Washington Court House, OH 43160
	www.seedconsultants.com
NK	Syngenta Seeds, 4013 Fairmount Pike, Signal Mountain, TN 37377
	www.syngenta-us.com
SeedKoz	1725 Windward Concourse, Suite 410, Alpharetta, GA 30005
	www.meherrinag.com

Table 3. Precipitation received in 2020 at Maryland locations of corn hybrid trials

Month	Wye	Poplar Hill	Salisbury ¹	Keedysville	Clarksville			
		inches						
April	5.32	2.36	3.18	4.08	5.60			
May	4.11	1.87	1.98	1.95	1.94			
June	4.35	4.14	4.15	2.07	3.30			
July	4.15	5.26	5.48	1.06	3.08			
August	17.46	11.12	9.22	1.77	7.15			
September	7.98	4.58	4.95	1.03	2.69			
2020 Total (6 mos.)	43.37	29.33	28.96	11.96	23.76			
Long Term Average ²	27.73	22.95	25.38	21.01	21.57			

¹The number in parenthesis following precipitation for each month indicates the amount of supplemental irrigation applied.

²Long term average precipitation is for the follow number of years at each location: Wye=21; Poplar Hill = 20; Salisbury = 31; Keedysville = 40; Clarksville = 11

Table 4. Glossary of abbreviations for hybrid genetic traits and description of seed treatments

Abbreviation	Description
Acceleron	Seed treatment for nematode and insect protection and soil/seed-borne fungal
	pathogens with the number referring to the concentration of the insecticide used
AM	Insect protection with YieldGard corn stalk borer gene, protection against
	European corn borer, LL, RR2
Avicta Complete Corn	Nematacide/insecticide/fungicide seed treatment combination
BL	Broad Lepidopteran
BT	Contains a <i>Bacillus thuringiensis</i> (Bt) event for protection against European
	corn borer
BTCB	Resistance to corn borer
Droughtgard (DG)	Contains drought-tolerant biotechnology trait and dual modes of protection
Double Pro	against corn earworm and other above-ground pests
EDC	Enhanced disease control offerings
GENVT2PRIB	Provides protection against aboveground Lepidopteran insects, has tolerance to
	glyphosate, is considered a drought guard hybrid, and has non-Bt seed blended
	in the bag creating refuge in the bag.
LL	Refers to glufosinate (Liberty) herbicide tolderance
P/V 1250	Combination of Poncho and Votivo with the number referring to the
	concentration of the insecticide used
Poncho 500	An insecticide seed treatment with the number referring to the concentration of
	the insecticide used.
Q (Qrome)	Dual modes of action, defend against above- and below-ground pests, Bt
	protein and HX and HX1 genes.
Radius 500	Seed treatment for nematode and insect protection with the number referring to
	the concentration of the insecticide used
RR, RR2	Has glyphosate herbicide tolerance
Trecepta	Resistance to Protection against European corn borer, broad Lepidopteran plus
	glyphosate and glufosinate herbicide tolerance
Vibrance	Seed treatment effective against certain smut diseases and provide protection
	against seed/soil-borne pathogens
	Vibrance is effective against certain smut diseases in cereal grains and seed and
	seedling blight or damping-off caused by seed- and soilborne pathogens
	including Rhizoctonia
VT2P, VT2PRO	Contains RR2 gene and YieldGard corn stalk borer gene
VT2PDGRIB	Contains RR2 gene, YieldGard corn stalk borer gene, Drought Gard gene, and
	non-Bt seed blended in the bag creating refuge in the bag
VT2PRIB	Contains RR2 gene and YieldGard corn stalk borer gene and non-Bt seed
	blended in the bag creating refuge in the bag

Table 5. Relative maturity, genetic traits, and seed treatments for early-season hybrids tested in 2020. Check varieties are bolded.

Brand/Company	Hybrid Name	Relative Maturity	Genetic Traits	Seed Treatment
Mid-Atlantic	MAS 8034	103	VT2PRIBBG	
Pioneer	P0075AM	100		
Local Seed	LC0297 SSXRIB	102	CB/RW/RR/LL	Radius 500
Dekalb	DKC55-54RIB	105	GENDGVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC55-85RIB	105	GENVT2PRIB	Acceleron 500
Hubner	H05G716	105	Droughtgard/Double pro	Poncho 500
Hubner	H4390RC2P	108	Double Pro	Poncho 500
Seed Consultants	SCS 1071AM	107	AM/LL/RR2	P/V 500
Seed Consultants	SCS 1069AM	106	AM/LL/RR2	P/V 500
Dekalb	DKC54-65	104		
Pioneer	P0843AM	108		
Local Seed	LC0607 TCRIB	106	BL/CB/RR	Radius 500
Local Seed	LC0877 VT2PRIB	108	CB/RR	Radius 500

Table 6. Relative maturity, genetic traits, and seed treatments for mid-season hybrids tested in 2020. Check varieties are bolded.

Brand/Company	Hybrid Name	Relative Maturity	Genetic Traits	Seed Treatment
Local Seed	LC0999 VT2PRIB	109	CB/RR	Radius 500
Dekalb	DKC59-82RIB	109	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC61-41RIB	111	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC62-53RIB	112	GENVT2PRIB	Acceleron 500 + EDC
Syngenta	NK1082-5222	110	BT, RR	Avicta Complete Corn + Vibrance
Syngenta	NK1239-5122	112	BT, RR	Avicta Complete Corn + Vibrance
Hubner	H09G056	109	Droughtgard/double pro	Poncho 500
Hubner	H4321RC2P	109	Double Pro	Poncho 500
Hubner	H4692RC2P	112	Double Pro	Poncho 500
Seed Consultants	SCS 1111Q	111	Q/LL/RR2	P/V 500
Seed Consultants	SCS 1121AM	112	AM/LL/RR2	P/V 500
SeedKoz	MC 3952	109	VT2P	Poncho 500
SeedKoz	MC 4255	112	VT2P	Poncho 500
Mid-Atlantic	MAS 8091	109	VT2PRIB	
Pioneer	P1197AM	111		
Local Seed	LC0908 VT2PRIB	109	CB/RR	Radius 500
Local Seed	LC1009 VT2PRIB	110	CB/RR	Radius 500
Local Seed	LC1108 TCPRIB	111	BL/CB/RR	Radius 500
Local Seed	LC1207 TCRIB	111	BL/CB/RR	Radius 500
Local Seed	LC1289 VT2PRIB	112	CB/RR	Radius 500

Table 7. Relative maturity, genetic traits, and seed treatments for full-season hybrids tested in 2020. Check varieties are bolded.

Brand/Company	Hybrid Name	Relative Maturity	Genetic Traits	Seed Treatment
Dekalb	DKC64-64RIB	113	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC63-91RIB	113	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC65-95RIB	115	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC65-99RIB	115	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC66-18RIB	116	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC67-44RIB	117	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC68-69RIB	118	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC69-99RIB	119	GENVT2PRIB	Acceleron 500 + EDC
Dekalb	DKC70-27RIB	120	GENVT2PRIB	Acceleron 500 + EDC
Syngenta	NK1573-5222	115	BT, RR	Avicta Complete Corn + Vibrance
Syngenta	NK1748-3110	117	BT, RR	Avicta Complete Corn + Vibrance
Hubner	H4663RC2P	113	Double Pro	Poncho 250
Hubner	H4744RC2P	113	Double Pro	Poncho 250
Hubner	H4763RC2P	115	Double Pro	Poncho 500
Hubner	H4828RC2P	116	Double Pro	Poncho 500
Hubner	H4846RC2P	118	Double Pro	Poncho 500
Dyna-Gro	D54VC34	114	Bt, RR	Acceleron 500
Dyna-Gro	D55VC80	115	Bt, RR	Acceleron 500
Seed Consultants	SCS 1141AM	114	AM/LL/RR2	PV 500
Seed Consultants	SCS 1158AM	115	AM/LL/RR2	PV 500
SeedKoz	MC 4319	113	VT2P	Poncho 500
SeedKoz	MC 4670	116	Trecepta	Poncho 500
SeedKoz	MC 4725	117	VT2P	Poncho 500
Mid-Atlantic	MAS 8128	112	VT2PRIB	
Mid-Atlantic	MAS 8163	116	VT2PRIB	
Pioneer	P1415Q	114		
Local Seed	LC1398 VT2PRIB	113	CB/RR	Radius 500
Local Seed	LC1488 VT2PRIB	114	CB/RR	Radius 500
Local Seed	LC1497 DGVT2PRIB	114	CB/RR/DG	Radius 500
Local Seed	LC1577 VT2PRIB	115	CB/RR	Radius 500
Local Seed	LC1307 TCRIB	113	CB/RR	Radius 500

Table 8. Average performance of early maturity hybrids evaluated at five locations in 2020.

		Yield (bu/ac) ²	2 yr Yield Avg	Moisture %	Lodging ³ %	Test
Brand/Company	Hybrid Name ¹	2020	2019				weight (lb/bu) ²
Mid-Atlantic ⁴	MAS 8034	138	-	-	17.2	2.4	56.6
Pioneer	P0075AM	151	-	-	17.3	1.2	54.0
Local Seed	LC0297 SSXRIB	151	-	-	17.9	2.1	55.6
Dekalb	DKC55-54RIB	157	-	-	17.5	1.6	52.9
Dekalb	DKC55-85RIB	156	201	178	17.5	3.4	53.5
Hubner	H05G716	154	-	-	16.9	1.8	52.7
Hubner	H4390RC2P	174	203	188	19.1	2.0	54.2
Seed Consultants	SCS 1071AM	165	-	-	18.4	2.1	54.8
Seed Consultants	SCS 1069AM	158	-	-	18.9	2.8	54.6
Dekalb	DKC54-65	149	-	-	17.2	1.6	55.2
Pioneer	P0843AM	165	-	-	18.5	2.6	53.2
Local Seed	LC0607 TCRIB	160	-	-	17.2	0.9	56.3
Local Seed	LC0877 VT2PRIB	155	-	-	18.2	0.9	55.5
Trial Mean (Trial Mean (5 Locations)				17.9	2.0	54.5
	Probability > F		-	-			
LSI	LSD _{0.1}					_	·

¹See Table 5 for trait designations for early season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 9. Average performance of mid-season maturity hybrids evaluated at five locations in 2020.

	Hybrid Name ¹	Yield	(bu/ac) ²	2 yr	Moisture %	Lodging ³ %	Test
Brand/Company		2020	2019	Yield			Weight
T 10 1	I COOOO LITTADDID	1.00		Avg	10.6	0.6	$(lb/bu)^2$
Local Seed	LC0999 VT2PRIB	166	-	-	18.6	0.6	52.9
Dekalb	DKC59-82RIB	180	207	193	19.2	0.8	52.9
Dekalb	DKC61-41RIB	174	-	-	19.3	0.7	52.7
Dekalb ⁴	DKC62-53RIB	166	197	181	19.1	0.4	52.6
Syngenta	NK1082-5222	166	-	-	19.9	0.9	53.4
Syngenta	NK1239-5122	158	-	-	19.9	1.1	51.4
Hubner	H09G056	171	-	-	19.5	0.5	54.4
Hubner	H4321RC2P	171	-	-	18.9	0.8	52.7
Hubner	H4692RC2P	160	200	180	19.6	0.4	52.5
Seed Consultants	SCS 1111Q	163	-	-	19.2	0.5	54.7
Seed Consultants	SCS 1121AM	159	-	-	19.7	0.4	52.8
SeedKoz	MC 3952	167	-	-	18.6	0.5	55.5
SeedKoz	MC 4255	166	-	-	19.6	0	53.8
Mid-Atlantic	MAS 8091	166	-	-	20.1	0.8	55.0
Pioneer	P1197AM	161	205	183	18.9	0.2	56.1
Local Seed	LC0908 VT2PRIB	173	-	-	18.9	0.8	55.8
Local Seed	LC1009 VT2PRIB	167	-	-	18.2	0.5	55.5
Local Seed	LC1108 TCPRIB	166	-	-	50.4	0.7	50.8
Local Seed	LC1207 TCRIB	175	-	-	19.1	0	53.2
Local Seed	LC1289 VT2PRIB	164	199	181	19.8	1.0	53.9
Trial Mean	Trial Mean (5 Locations)				19.3	0.6	53.6
Proba	bility > F	0.9868					
L	NS ⁵						
	tuait daniamatiama famus	• 1 1	1 . 1				

¹See Table 6 for trait designations for mid-season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 10. Average performance of full-season maturity hybrids evaluated at five locations in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	%	Weight (lb/bu) ²
Dekalb	DKC64-64RIB	169	-	-	19.6	1.0	56.4
Dekalb	DKC63-91RIB	169	-	-	20.0	0.5	58.5
Dekalb	DKC65-95RIB	165	212	188	19.9	0.2	58.7
Dekalb	DKC65-99RIB	169	-	-	19.6	1.4	58.7
Dekalb	DKC66-18RIB	170	217	193	21.6	1.2	59.6
Dekalb	DKC67-44RIB	172	219	195	20.6	0.2	62.6
Dekalb	DKC68-69RIB	167	-	-	21.8	3.0	60.6
Dekalb	DKC69-99RIB	175	-	-	19.8	2.4	59.2
Dekalb	DKC70-27RIB	172	199	185	21.1	0.5	57.6
Syngenta	NK1573-5222	158	-	-	21.3	1.1	55.5
Syngenta	NK1748-3110	161	-	-	20.8	2.1	53.9
Hubner	H4663RC2P	161	223	192	18.7	0.4	56.4
Hubner	H4744RC2P	174	202	188	20.1	0.6	57.4
Hubner	H4763RC2P	169	-	-	20.0	0.9	55.9
Hubner	H4828RC2P	165	-	-	20.5	0.8	54.9
Hubner	H4846RC2P	170	207	188	19.8	0.4	59.1
Dyna-Gro	D54VC34	173	-	-	19.9	0.9	56.2
Dyna-Gro	D55VC80	173	220	196	20.4	0.4	54.3
Seed Consultants	SCS 1141AM	158	-	-	20.6	1.7	55.2
Seed Consultants	SCS 1158AM	168	-	-	19.6	1.0	58.6
SeedKoz	MC 4319	164	-	-	20.3	0.4	55.8
SeedKoz	MC 4670	167	-	-	19.5	2.3	58.2
SeedKoz	MC 4725	159	-	-	21.6	2.7	55.9
Mid-Atlantic	MAS 8128	162	-	-	18.3	1.3	57.4
Mid-Atlantic	MAS 8163	173	•	-	20.0	1.0	59.4
Pioneer	P1415Q	151	•	-	19.5	3.4	57.4
Local Seed	LC1398 VT2PRIB	158	-	-	19.3	3.4	56.3
Local Seed	LC1488 VT2PRIB	170	207	188	18.2	1.3	58.1
Local Seed	LC1497 DGVT2PRIB	152	-	-	18.0	0.4	55.4
Local Seed	LC1577 VT2PRIB	173	222	197	19.8	0.9	56.8
Local Seed	LC1307 TCRIB	167	-	-	19.1	0.2	56.3
Trial Mear	(5 locations)	166			20.0	1.2	57.4
	bility > F	0.9977					
L	$\overline{\mathrm{SD}_{0.1}}$	NS ⁵					
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¹See Table 7 for trait designations for full season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 11. Performance of early season maturity hybrids evaluated at Wye Research and Education Center, Queenstown, MD in 2020.

		Yield (l	ou/ac) ²	2 yr	Moisture	Lodging ³	Test	Dopulation
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	Lodging*	weight (lb/bu) ²	Population (plants/ac)
Mid-Atlantic ⁴	MAS 8034	145	-	-	16.9	0.8	59.2	23591
Pioneer	P0075AM	166	-	-	16.5	2.0	57.0	29358
Local Seed	LC0297 SSXRIB	167	-	-	17.9	2.2	58.6	29399
Dekalb	DKC55-54RIB	192*	-	-	16.5	0.7	50.4	30371
Dekalb	DKC55-85RIB	198*	195	196	16.6	1.3	54.9	33023
Hubner	H05G716	179	-	-	15.2	0	45.6	31349
Hubner	H4390RC2P	215*	195	205	19.1	0	54.9	31045
Seed Consultants	SCS 1071AM	205*	-	-	18.2	1.4	54.7	28736
Seed Consultants	SCS 1069AM	190	-	-	19.2	4.8	54.5	27104
Dekalb	DKC54-65	169	-	•	15.9	0	57.9	27339
Pioneer	P0843AM	202*	-	-	18.7	1.9	53.2	30865
Local Seed	LC0607 TCRIB	188	-	ı	17.9	0	55.4	31174
Local Seed	LC0877 VT2PRIB	172	-	ı	18.4	0	56.3	27367
Trial Mean		184	-	-	17.5	1.1	54.8	29286
Probability > F		0.0013			< 0.0001	0.5018	0.0279	< 0.0001
LS	$D_{0.1}$	23		-	0.7	NS ⁵	5.5	2209
CV	7%	13			7.6	210	8.8	9.4

¹See Table 5 for trait designations for early season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 12. Performance of mid-season maturity hybrids evaluated at Wye Research and Education Center, Queenstown, MD in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	%	Weight (lb/bu) ²	(plants/ac)
Local Seed	LC0999 VT2PRIB	208	-	-	18.6	0.6	50.8	31197
Dekalb	DKC59-82RIB	218	197	207	19.0	2.0	54.0	31017
Dekalb	DKC61-41RIB	219	1	-	19.3	0.6	50.4	31377
Dekalb ⁴	DKC62-53RIB	200	213	206	18.5	1.3	45.8	30810
Syngenta	NK1082-5222	197	1	-	20.9	0	52.4	29773
Syngenta	NK1239-5122	190	1	-	19.8	0.6	37.9	32774
Hubner	H09G056	212	1	-	20.0	0	54.0	31405
Hubner	H4321RC2P	214	1	-	19.5	0	43.3	33313
Hubner	H4692RC2P	199	199	199	19.5	0	52.0	30948
Seed Consultants	SCS 1111Q	198	-	-	19.8	0	38.8	29275
Seed Consultants	SCS 1121AM	123	-	-	20.0	1.4	36.8	20480
SeedKoz	MC 3952	131	-	-	18.5	0.6	39.0	29759
SeedKoz	MC 4255	209	-	-	20.8	0	48.5	29925
Mid-Atlantic	MAS 8091	202	•	-	20.7	2.1	52.5	29607
Pioneer	P1197AM	196	190	193	18.8	0	45.3	30271
Local Seed	LC0908 VT2PRIB	197	-	-	19.6	2.8	54.4	29261
Local Seed	LC1009 VT2PRIB	208	-	-	18.9	1.3	55.9	31778
Local Seed	LC1108 TCPRIB	210	-	-	21.3	0	48.5	30229
Local Seed	LC1207 TCRIB	215	-	-	19.5	0	48.9	27477
Local Seed	LC1289 VT2PRIB	199	189	194	20.8	3.1	48.0	26772
Trial Mean		204			19.7	0.8	48.3	29822
Probability > F		0.3741			<0.0001	0.3461	0.6552	0.0318
$\mathrm{LSD}_{0.1}$		NS ⁵			1.0	NS ⁵	NS	5255
CV%		7.8			5.2	215	15.4	15.0

¹See Table 7 for trait designations for mid-season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 13. Performance of full season maturity hybrids evaluated at Wye Research and Education Center, Queenstown, MD in 2020.

Brand/Company	Hybrid Name ¹	Yield (b 2020	ou/ac) ² 2019	2 yr Yield Avg	Moisture %	Lodging ³ %	Test Weight (lb/bu) ²	Population (plants/ac)
Dekalb	DKC64-64RIB	217*	-	-	21.4	0	58.0	31377
Dekalb	DKC63-91RIB	188	-	-	21.3	0.7	57.1	31170
Dekalb	DKC65-95RIB	190	197	193	21.9	0	70.7	29123
Dekalb	DKC65-99RIB	212*	-	-	21.4	0	60.8	32068
Dekalb	DKC66-18RIB	205	208	206	23.3	4.1	64.4	29883
Dekalb	DKC67-44RIB	215*	208	211	22.6	0	64.4	27643
Dekalb	DKC68-69RIB	220*	-	-	23.2	6.9	62.3	29358
Dekalb	DKC69-99RIB	219*	-	-	22.0	0.8	61.0	29579
Dekalb	DKC70-27RIB	208	204	206	22.9	0	64.6	31031
Syngenta	NK1573-5222	180	-	-	21.9	0	62.7	32207
Syngenta	NK1748-3110	192	-	-	22.9	2.6	57.6	30423
Hubner	H4663RC2P	206	185	195	20.2	0	60.7	32787
Hubner	H4744RC2P	206	210	208	21.8	0	62.9	30457
Hubner	H4763RC2P	200	-	-	21.3	2.0	59.3	30616
Hubner	H4828RC2P	196	-	-	21.7	0	62.7	30686
Hubner	H4846RC2P	208	214	211	21.0	0.7	61.0	29963
Dyna-Gro	D54VC34	222*	-	-	21.3	1.4	56.8	27616
Dyna-Gro	D55VC80	209	215	212	22.5	0	-	30450
Seed Consultants	SCS 1141AM	184	-	-	21.6	2.6	-	28556
Seed Consultants	SCS 1158AM	235*	-	-	21.2	0	63.3	29676
SeedKoz	MC 4319	207	-	-	21.4	0.6	61.0	34074
SeedKoz	MC 4670	193	-	-	20.9	1.0	-	26067
SeedKoz	MC 4725	201	-	-	23.1	0	61.2	32359
Mid-Atlantic	MAS 8128	188	-	-	18.4	0.6	-	30298
Mid-Atlantic	MAS 8163	218*	-	-	22.2	0	60.5	33465
Pioneer	P1415Q	180	-	-	21.3	0.7	60.2	29303
Local Seed	LC1398 VT2PRIB	192	1	1	21.3	5.0	60.9	29124
Local Seed	LC1488 VT2PRIB	207	181	194	18.7	1.3	59.9	30950
Local Seed	LC1497 DGVT2PRIB	184	-	-	20.0	0	57.8	31418
Local Seed	LC1577 VT2PRIB	217*	208	212	20.5	0.6	69.7	31308
Local Seed LC1307 TCRIB		206	-	-	20.4	0	58.5	29510
Trial I	Mean	203			21.5	1.0	61.7	30405
Probability > F		0.0199			<0.0001	0.5018	0.1151	0.1296
$\mathrm{LSD}_{0.1}$		24 9.9			0.7	NS ⁵	NS	NS
	CV%		11		5.8	224	6.2	8.8

¹See Table 7 for trait designations for full season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 14. Performance of early season maturity hybrids evaluated at Lower Eastern Shore Research and Education Center – Poplar Hill Facility in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	Loughig %	weight (lb/bu) ²	(plants/ac)
Mid-Atlantic ⁴	MAS 8034	140	ı	ı	20.4	2.3	52.0	23776
Pioneer	P0075AM	148	-	-	20.2	1.2	50.5	27225
Local Seed	LC0297 SSXRIB	143	-	ı	20.4	0.8	50.9	23958
Dekalb	DKC55-54RIB	138	ı	ı	20.9	0.7	47.2	27588
Dekalb	DKC55-85RIB	139	142	140	21.1	7.0	43.3	32125
Hubner	H05G716	149	-	-	20.8	1.3	49.0	28132
Hubner	H4390RC2P	175	153	164	22.0	1.7	49.9	32048
Seed Consultants	SCS 1071AM	154	-	-	22.5	3.4	48.5	28132
Seed Consultants	SCS 1069AM	154	-	-	22.1	4.0	52.1	30855
Dekalb	DKC54-65	133	-	1	20.9	0	47.9	29040
Pioneer	P0843AM	169	ı	ı	22.0	4.0	50.1	29766
Local Seed	LC0607 TCRIB	149	ı	ı	20.5	0	52.9	30673
Local Seed	LC0877 VT2PRIB	153	ı	ı	21.2	0.7	51.4	28132
Trial Mean		150			21.1	2.1	49.7	28573
Probabi	Probability > F				<0.0001	0.2883	0.0606	0.0002
LSI	$\mathrm{LSD}_{0.1}$				0.4	NS	4.3	2753
CV	CV%				3.6	155	7.2	10.8

¹See Table 5 for trait designations for early season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 15. Performance of mid-season maturity hybrids evaluated at Lower Eastern Shore Research and Education Center – Poplar Hill Facility in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	%	Weight (lb/bu) ²	(plants/ac)
Local Seed	LC0999 VT2PRIB	149	ı	-	21.8	0.5	49.2	30129
Dekalb	DKC59-82RIB	179	137	-	23.1	0.6	48.7	30673
Dekalb	DKC61-41RIB	179	1	-	22.8	1.2	48.8	29221
Dekalb ⁴	DKC62-53RIB	148	143	145	22.7	0	45.0	29221
Syngenta	NK1082-5222	154	1	-	23.5	2.4	52.8	28677
Syngenta	NK1239-5122	152	ı	-	23.3	0	48.6	29766
Hubner	H09G056	155	1	-	22.9	0	54.7	27588
Hubner	H4321RC2P	162	-	-	22.7	0	51.6	26862
Hubner	H4692RC2P	147	135	141	23.3	0	44.0	30310
Seed Consultants	SCS 1111Q	170	-	-	22.8	1.3	47.8	30450
Seed Consultants	SCS 1121AM	151	-	-	23.2	0	51.5	26136
SeedKoz	MC 3952	189	-	-	21.9	0.6	58.5	33663
SeedKoz	MC 4255	165	1	-	23.4	0	55.8	27769
Mid-Atlantic	MAS 8091	153	•	-	23.5	0	51.7	29766
Pioneer	P1197AM	156	155	155	22.4	0.7	52.7	26862
Local Seed	LC0908 VT2PRIB	172	-	-	22.4	0	51.0	31762
Local Seed	LC1009 VT2PRIB	153	-	-	22.0	1.2	50.6	29221
Local Seed	LC1108 TCPRIB	160	-	-	23.6	1.8	45.6	27221
Local Seed	LC1207 TCRIB	184	-	-	23.3	0	51.1	27043
Local Seed	LC1289 VT2PRIB	170	144	157	23.1	0	54.3	27091
Trial I	Trial Mean				22.9	0.5	50.7	29045
Probabi	Probability > F				0.0011	0.4914	0.0458	0.0193
$LSD_{0.1}$		NS ⁵			0.7	NS	6.3	NS
CV	CV%				3.0	242	10.6	9.7

¹See Table 7 for trait designations for mid-season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 16. Performance of full season maturity hybrids evaluated at Lower Eastern Shore Research and Education Center – Poplar Hill Facility in 2020.

		Yield (b	ou/ac) ²	2 yr	Moisture	Lodging3	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield	%	Lodging ³ %	Weight	(plants/ac)
			2019	Avg			(lb/bu) ²	
Dekalb	DKC64-64RIB	161	-	-	21.0	1.8	49.6	30855
Dekalb	DKC63-91RIB	174	-	-	23.5	1.3	55.8	30969
Dekalb	DKC65-95RIB	171	183	177	21.0	0	57.0	27225
Dekalb	DKC65-99RIB	184*	-	-	21.3	1.1	58.6	30310
Dekalb	DKC66-18RIB	194*	175	184	23.0	0.7	56.4	29766
Dekalb	DKC67-44RIB	192*	181	186	22.3	0	67.5	23776
Dekalb	DKC68-69RIB	182*	-	-	23.2	3.3	58.3	26862
Dekalb	DKC69-99RIB	184*	-	-	21.5	1.9	58.4	29040
Dekalb	DKC70-27RIB	180*	143	161	23.1	0	52.3	28314
Syngenta	NK1573-5222	177	-	-	23.2	1.4	53.4	29126
Syngenta	NK1748-3110	184*	-	-	23.0	0.6	51.7	29710
Hubner	H4663RC2P	161	166	163	19.9	0	52.4	26408
Hubner	H4744RC2P	183*	165	174	21.3	0.5	55.9	32488
Hubner	H4763RC2P	203*	-	1	22.2	1.2	55.3	31200
Hubner	H4828RC2P	176	-	-	22.7	0.7	50.5	26732
Hubner	H4846RC2P	190*	168	179	21.6	0	59.6	26556
Dyna-Gro	D54VC34	187*	1	1	21.3	0.7	56.1	25954
Dyna-Gro	D55VC80	191*	176	183	22.3	0.8	51.3	27653
Seed Consultants	SCS 1141AM	162	-	-	22.3	0.7	53.6	26862
Seed Consultants	SCS 1158AM	170	1	1	21.3	0.6	56.6	26680
SeedKoz	MC 4319	186*	ı	ı	21.7	0	53.3	31581
SeedKoz	MC 4670	185*	-	-	21.1	1.5	53.5	30097
SeedKoz	MC 4725	171	-	-	52.0	1.5	53.0	26954
Mid-Atlantic	MAS 8128	182*	-	-	19.5	0.7	60.1	30654
Mid-Atlantic	MAS 8163	193*	-	-	21.1	0.6	63.2	30855
Pioneer	P1415Q	163	-	-	21.0	3.6	55.9	25700
Local Seed	LC1398 VT2PRIB	166	-	-	20.6	0	55.7	25954
Local Seed	LC1488 VT2PRIB	185*	179	182	19.0	1.3	59.0	30788
Local Seed	LC1497 DGVT2PRIB	133	-	-	17.8	0	57.0	26850
Local Seed	LC1577 VT2PRIB	191	182	186	21.3	0	53.9	28745
Local Seed	LC1307 TCRIB	175	-	-	20.7	0.7	57.6	28314
Trial Mean		179			21.6	0.9	55.9	28523
Probability > F		0.0120			0.0006	0.6812	0.0185	0.0489
$\mathrm{LSD}_{0.1}$		23			2	NS	6.5	3972
CV ⁰	CV%				8.7	187	9.7	11.2

¹See Table 7 for trait designations for full season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 17. Performance of early season maturity hybrids evaluated at Lower Eastern Shore Research and Education Center – Salisbury Facility in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	Loughig %	weight (lb/bu) ²	(plants/ac)
Mid-Atlantic ⁴	MAS 8034	157	ı	ı	16.5	2.0	59.0	32720
Pioneer	P0075AM	201*	-	-	16.6	0.6	57.0	35103
Local Seed	LC0297 SSXRIB	196	ı	ı	16.7	0.6	58.3	33506
Dekalb	DKC55-54RIB	188	ı	ı	16.4	1.1	59.6	34303
Dekalb	DKC55-85RIB	195	228	211	16.1	2.5	60.1	36481
Hubner	H05G716	176	-	-	15.4	0.7	58.1	33759
Hubner	H4390RC2P	216*	217	216	17.8	2.0	57.4	35937
Seed Consultants	SCS 1071AM	193	-	-	17.6	2.4	60.5	37462
Seed Consultants	SCS 1069AM	177	-	-	17.9	0	59.7	36144
Dekalb	DKC54-65	178	ı	1	15.4	1.0	60.3	35574
Pioneer	P0843AM	183	ı	ı	17.5	4.2	58.8	34485
Local Seed	LC0607 TCRIB	187	ı	ı	15.7	0	64.1	35211
Local Seed	LC0877 VT2PRIB	183	ı	ı	17.2	0.5	58.6	33759
Trial	Trial Mean				16.7	1.4	59.3	34957
Probabi	Probability > F				<0.0001	0.3431	0.8516	0.4687
LSI	$\mathbf{LSD}_{0.1}$			-	0.5	NS ⁵	NS	NS
CV	CV%				5.3	145	6.4	6.7

¹See Table 5 for trait designations for early season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 18. Performance of mid-season maturity hybrids evaluated at Lower Eastern Shore Research and Education Center – Salisbury Facility in 2020.

Brand/Company	Hybrid Name ¹	Yield (2 yr Yield	Moisture	Lodging ³	Test Weight	Population
Brand/Company	•	2020	2019	Avg	%	%	(lb/bu) ²	(plants/ac)
Local Seed	LC0999 VT2PRIB	201*	-	-	16.3	0	58.6	34122
Dekalb	DKC59-82RIB	212*	217	214	17.6	0.5	56.6	36118
Dekalb	DKC61-41RIB	205*	-	-	17.7	0	58.2	33940
Dekalb ⁴	DKC62-53RIB	211*	197	204	17.7	0.5	60.9	35029
Syngenta	NK1082-5222	201*	-	-	17.2	1.0	56.4	34303
Syngenta	NK1239-5122	181	-	-	18.4	2.1	56.6	35029
Hubner	H09G056	210*	-	-	17.9	0	54.8	34485
Hubner	H4321RC2P	195*	1	-	17.0	0.6	57.4	32307
Hubner	H4692RC2P	189	213	201	18.0	1.0	59.3	35755
Seed Consultants	SCS 1111Q	176	-	-	17.9	1.1	66.7	33759
Seed Consultants	SCS 1121AM	189	-	-	18.1	0.6	60.2	30855
SeedKoz	MC 3952	191	-	-	16.7	0.5	60.0	35937
SeedKoz	MC 4255	190	-	-	17.4	0	60.2	32488
Mid-Atlantic	MAS 8091	191	-	-	18.1	0.6	61.2	32851
Pioneer	P1197AM	173	198	185	17.5	0.5	61.2	33033
Local Seed	LC0908 VT2PRIB	194	-	-	16.6	0.8	62.5	33759
Local Seed	LC1009 VT2PRIB	196*	-	-	17.3	0	60.2	35755
Local Seed	LC1108 TCPRIB	182	-	-	18.2	1.1	52.8	32851
Local Seed	LC1207 TCRIB	200*	ı	-	17.5	0	62.6	33577
Local Seed	LC1289 VT2PRIB	197*	212	204	17.7	0	58.4	34061
Trial N	Mean	194			17.5	0.5	59.3	33997
Probabil	Probability > F				0.0001	0.7543	0.5381	0.0721
LSD	$\mathrm{LSD}_{0.1}$				0.7	NS ⁵	NS	2468
CV	CV%				4.1	196	9.3	5.9

¹See Table 7 for trait designations for mid-season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 19. Performance of full season maturity hybrids evaluated at Lower Eastern Shore Research and Education Center – Salisbury Facility in 2020.

D 1/G	***********	Yield (b	ou/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	%	Weight (lb/bu) ²	(plants/ac)
Dekalb	DKC64-64RIB	189	-	-	16.8	2.2	67.7	34666
Dekalb	DKC63-91RIB	212	-	-	17.5	0	68.7	36844
Dekalb	DKC65-95RIB	204	214	211	17.8	0	63.7	38115
Dekalb	DKC65-99RIB	193	-	-	17.6	4.2	61.9	35665
Dekalb	DKC66-18RIB	200	219	209	20.3	1.0	68.8	33033
Dekalb	DKC67-44RIB	194	205	199	18.0	1.6	71.9	33215
Dekalb	DKC68-69RIB	199	-	-	20.3	2.5	75.1	34303
Dekalb	DKC69-99RIB	200	-	-	17.7	7.5	62.5	32670
Dekalb	DKC70-27RIB	203	190	196	18.2	2.1	66.2	36481
Syngenta	NK1573-5222	184	-	-	18.5	0.5	59.4	35574
Syngenta	NK1748-3110	176	-	-	17.5	3.6	54.4	35029
Hubner	H4663RC2P	189	189	189	15.7	0	62.3	34303
Hubner	H4744RC2P	212	206	209	17.8	0	61.4	33940
Hubner	H4763RC2P	194	-	-	16.6	0.8	58.5	34576
Hubner	H4828RC2P	194	-	-	19.1	2.2	56.6	34848
Hubner	H4846RC2P	196	198	197	18.0	0.5	62.0	36118
Dyna-Gro	D54VC34	195	-	-	17.5	2.5	57.6	31218
Dyna-Gro	D55VC80	206	218	212	17.5	0	57.8	36663
Seed Consultants	SCS 1141AM	187	ı	1	18.0	1.6	56.3	34848
Seed Consultants	SCS 1158AM	194	-	-	17.3	1.1	64.5	32670
SeedKoz	MC 4319	194	ı	ı	18.4	0.5	55.4	36300
SeedKoz	MC 4670	198	1	1	17.7	3.8	67.2	33759
SeedKoz	MC 4725	185	-	-	19.8	5.0	60.2	33740
Mid-Atlantic	MAS 8128	195	•	•	17.2	5.3	61.2	34303
Mid-Atlantic	MAS 8163	196	•	•	17.7	4.3	62.0	34848
Pioneer	P1415Q	176	-	-	17.0	3.8	60.5	31944
Local Seed	LC1398 VT2PRIB	184	ı	ı	18.3	9.8	57.6	34848
Local Seed	LC1488 VT2PRIB	199	202	200	16.1	3.9	63.5	33214
Local Seed	LC1497 DGVT2PRIB	190	1	1	16.1	0	55.8	34666
Local Seed	LC1577 VT2PRIB	206	204	205	18.6	2.6	54.4	36300
Local Seed	<u> </u>		-	-	17.4	0	55.3	37026
Trial	Trial Mean				17.8	2.5	61.4	34718
Probability > F		0.1587			<0.0001	0.2142	0.5158	0.0114
$\mathrm{LSD}_{0.1}$		NS ⁵			1.3	NS ⁵	NS	2699
CV	CV%		1 1 1 .		7.4	160	14.1	6.5

¹See Table 7 for trait designations for full season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 20. Performance of early season maturity hybrids evaluated at Western Maryland Research and Education Center in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	" " " " " " " " " " " " " " " " " " "	weight (lb/bu) ²	(plants/ac)
Mid-Atlantic ⁴	MAS 8034	110	•	•	15.9	4.4	56.2	24115
Pioneer	P0075AM	117	-	-	15.3	0	54.6	25591
Local Seed	LC0297 SSXRIB	117	ı	ı	18.3	0	57.4	27693
Dekalb	DKC55-54RIB	134	-	-	15.5	2.3	55.2	28415
Dekalb	DKC55-85RIB	119	200	159	16.1	0	57.1	28132
Hubner	H05G716	125*	-	-	15.4	1.3	57.3	30106
Hubner	H4390RC2P	122	219	170	17.6	0	56.9	27225
Seed Consultants	SCS 1071AM	127*	-	-	15.8	0.7	57.1	27769
Seed Consultants	SCS 1069AM	129*	-	-	17.0	0	54.3	32098
Dekalb	DKC54-65	116	-	-	15.9	4.7	56.6	29584
Pioneer	P0843AM	132*	-	-	16.1	0	54.2	29721
Local Seed	LC0607 TCRIB	120	ı	ı	14.8	3.4	55.5	26680
Local Seed	LC0877 VT2PRIB	126*	ı	ı	16.5	0.6	57.5	27588
Trial Mean		123			15.9	1.3	56.1	28055
Probability > F		0.0091			<0.0001	0.6427	0.7726	0.0050
LSI	$\mathbf{LSD}_{0.1}$				0.6	NS ⁵	NS ⁵	2683
CV	CV%		-	-	5.4	248	4.4	9.1

¹See Table 5 for trait designations for early season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 21. Performance of mid-season maturity hybrids evaluated at Western Maryland Research and Education Center in 2020.

Brand/Company			Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Population
Dekalb	Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg			Weight (lb/bu) ²	
Dekalb DKC61-41RIB 125 - - 18.4 1.6 55.8 27925 Dekalb⁴ DKC62-53RIB 123 229 176 18.8 0 55.7 27400 Syngenta NK1082-5222 122 - - 17.2 0.6 56.7 30903 Syngenta NK1239-5122 116 - - 18.1 1.2 53.7 28495 Hubner H09G056 125 - - 18.1 1.2 53.7 28495 Hubner H4692RC2P 128 - - 16.7 2.8 56.0 30322 Hubner H4692RC2P 119 223 171 18.0 0.7 56.3 27043 Seed Consultants SCS 1111Q 129 - - 17.0 0 59.0 30992 Seed Koz MC 3952 124 - - 16.7 0 56.5 31052 SeedKoz MC 3952	Local Seed		116	ı	-	17.2	0	54.3	28495
Dekalb⁴ DKC62-53RIB 123 229 176 18.8 0 55.7 27400 Syngenta NK1082-5222 122 - - 17.2 0.6 56.7 30903 Syngenta NK1239-5122 116 - - 18.1 1.2 53.7 28495 Hubner H09G056 125 - - 18.5 0 56.4 28930 Hubner H4321RC2P 128 - - 16.7 2.8 56.0 30322 Hubner H4692RC2P 119 223 171 18.0 0.7 56.3 27043 Seed Consultants SCS 1111Q 129 - - 17.0 0 59.0 30992 Seed Consultants SCS 1121AM 125 - - 17.6 0 56.5 31052 Seed Koz MC 3952 124 - - 16.7 0 56.5 55.0 28955 Mid-Atlantic	Dekalb	DKC59-82RIB	128	242	185	17.4	0.8	55.5	30540
Syngenta NK1082-5222 122 - - 17.2 0.6 56.7 30903 Syngenta NK1239-5122 116 - - 18.1 1.2 53.7 28495 Hubner H09G056 125 - - 18.5 0 56.4 28930 Hubner H462RC2P 128 - - 16.7 2.8 56.0 30322 Hubner H4692RC2P 119 223 171 18.0 0.7 56.3 27043 Seed Consultants SCS 1111Q 129 - - 17.0 0 59.0 30992 Seed Consultants SCS 1121AM 125 - - 17.6 0 57.8 26199 Seed Koz MC 3952 124 - - 16.7 0 56.5 31052 Seed Koz MC 4255 122 - - 17.5 0 55.0 28955 Mid-Atlantic MAS 8091	Dekalb	DKC61-41RIB	125	ı	-	18.4	1.6	55.8	27925
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Dekalb ⁴	DKC62-53RIB	123	229	176	18.8	0	55.7	27400
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Syngenta	NK1082-5222	122	ı	-	17.2	0.6	56.7	30903
Hubner	Syngenta	NK1239-5122	116	ı	-	18.1	1.2	53.7	28495
Hubner	Hubner	H09G056	125	-	-	18.5	0	56.4	28930
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Hubner	H4321RC2P	128	-	-	16.7	2.8	56.0	30322
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Hubner	H4692RC2P	119	223	171	18.0	0.7	56.3	27043
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Seed Consultants	SCS 1111Q	129	-	-	17.0	0	59.0	30992
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Seed Consultants	SCS 1121AM	125	-	-	17.6	0	57.8	26199
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	SeedKoz	MC 3952	124	-	-	16.7	0	56.5	31052
$\begin{array}{ c c c c c c c c c c } \hline \textbf{Pioneer} & \textbf{P1197AM} & \textbf{132} & \textbf{224} & - & \textbf{16.9} & \textbf{0} & \textbf{56.5} & \textbf{26987} \\ \hline Local Seed & LC0908 & VT2PRIB & \textbf{131} & - & - & \textbf{17.1} & \textbf{0} & \textbf{55.8} & \textbf{30803} \\ \hline Local Seed & LC1009 & VT2PRIB & \textbf{116} & - & - & \textbf{14.4} & \textbf{0} & \textbf{60.1} & \textbf{30782} \\ \hline Local Seed & LC1108 & \textbf{120} & - & - & \textbf{18.4} & \textbf{0.6} & \textbf{55.5} & \textbf{28411} \\ \hline Local Seed & LC1207 & \textbf{128} & - & - & \textbf{16.8} & \textbf{0} & \textbf{55.1} & \textbf{28599} \\ \hline Local Seed & LC1289 & \textbf{119} & \textbf{219} & \textbf{169} & \textbf{17.6} & \textbf{1.4} & \textbf{55.3} & \textbf{26525} \\ \hline Trial Mean & \textbf{123} & \textbf{17.4} & \textbf{0.5} & \textbf{56.2} & \textbf{28759} \\ \hline \textbf{Probability} > \textbf{F} & \textbf{0.5625} & \textbf{0.0050} & \textbf{0.4979} & \textbf{0.3767} & \textbf{0.4736} \\ \hline \textbf{LSD}_{0.1} & \textbf{NS}^5 & \textbf{1.3} & \textbf{NS}^5 & \textbf{NS}^5 & \textbf{NS}^5 \\ \hline \end{array}$	SeedKoz	MC 4255	122	-	-	17.5	0	55.0	28955
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$	Mid-Atlantic	MAS 8091	108	-	-	18.2	1.3	57.5	24775
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Pioneer	P1197AM	132	224	-	16.9	0	56.5	26987
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Local Seed		131	-	-	17.1	0	55.8	30803
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Local Seed		116	-	-	14.4	0	60.1	30782
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Local Seed		120	-	-	18.4	0.6	55.5	28411
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Local Seed		128	-	-	16.8	0	55.1	28599
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Local Seed		119	219	169	17.6	1.4	55.3	26525
LSD _{0.1} NS ⁵ 1.3 NS ⁵ NS ⁵	Trial N	Trial Mean				17.4	0.5	56.2	28759
LSD _{0.1} NS ⁵ 1.3 NS ⁵ NS ⁵ NS ⁵	Probabil					0.0050	0.4979	0.3767	0.4736
		·	NS ⁵			1.3	NS ⁵	NS ⁵	NS ⁵
	CV	0/0	8.9			7.0			

¹See Table 7 for trait designations for mid-season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 22. Performance of full season maturity hybrids evaluated at Western Maryland Research and Education Center in 2020.

Brand/Company			Yield (l	ou/ac) ²	2 yr	Moisture	Ladaina	Test	Population
Dekalb DKC64-64RIB 125 - 18.5 0 54.5 31040	Brand/Company	Hybrid Name ¹	2020	2010			3 %		
Dekalb DKC63-91RIB 131				2019	Avg	, ,	70		,
Dekalb DKC65-9SRIB 122 227 174 18.3 1.2 55.3 29665				-	-		_		
Dekalb DKC65-99RIB 115 - - 18.5 0 56.7 29947				-	-				
Dekalb DKC66-18RIB 115 230 172 20.5 0 55.8 29947 Dekalb DKC67-44RIB 114 230 172 18.6 0 55.9 29403 Dekalb DKC68-69RIB 119 - - 21.0 2.1 56.8 24865 Dekalb DKC69-99RIB 112 - - 18.4 0 58.4 27769 Dekalb DKC70-27RIB 131 201 166 20.2 0 55.2 32763 Syngenta NK173-3522 113 - - 20.4 3.0 54.0 26395 Syngenta NK173-3522 113 - - 20.4 3.0 54.0 26395 Syngenta NK173-3522 113 - - 18.7 3.6 55.1 27583 Hubner H4663RC2P 129 217 173 17.3 0.8 55.2 28169 Hubner H44846RC2P	Dekalb	DKC65-95RIB		227	174		1.2		
Dekalb DKC67-44RIB 114 230 172 18.6 0 55.9 29403	Dekalb	DKC65-99RIB	115	-	-	18.5	_	56.7	
Dekalb DKC68-69RIB 119 - 21.0 2.1 56.8 24865				230					
Dekalb DKC69-99RIB 112 - - 18.4 0 58.4 27769	Dekalb	DKC67-44RIB	114	230	172	18.6	0	55.9	
Dekalb DKC70-27RIB 131 201 166 20.2 0 55.2 32763	Dekalb	DKC68-69RIB	119	-	-		2.1	56.8	24865
Syngenta NK1573-5222 113 - - 20.4 3.0 54.0 26395 Syngenta NK1748-3110 115 - - 18.7 3.6 55.1 27588 Hubner H4663RC2P 129 217 173 17.3 0.8 55.2 27922 Hubner H4744RC2P 128 234 181 19.1 2.2 55.5 29451 Hubner H4828RC2P 118 - - 18.7 0.6 55.2 28169 Hubner H4828RC2P 114 - - 18.5 1.3 56.8 28592 Hubner H4846RC2P 111 235 173 18.2 0.7 57.5 28521 Dyna-Gro D54VC34 111 - - 18.9 0 55.2 26968 Dyna-Gro D55VC80 117 226 171 19.0 0 54.6 30585 Seed Cosultatats <td< td=""><td>Dekalb</td><td>DKC69-99RIB</td><td>112</td><td>ı</td><td>-</td><td>18.4</td><td></td><td>58.4</td><td>27769</td></td<>	Dekalb	DKC69-99RIB	112	ı	-	18.4		58.4	27769
Syngenta NK1748-3110 115 - - 18.7 3.6 55.1 27588 Hubner H4663RC2P 129 217 173 17.3 0.8 55.2 27922 Hubner H4744RC2P 128 234 181 19.1 2.2 55.5 29451 Hubner H4763RC2P 118 - - 18.7 0.6 55.2 28169 Hubner H4828RC2P 114 - - 18.5 1.3 56.8 28592 Hubner H4846RC2P 111 235 173 18.2 0.7 57.5 28521 Dyna-Gro D54VC34 111 - - 18.9 0 55.2 26968 Dyna-Gro D55VC80 117 226 171 19.0 0 54.6 30585 Seed Consultants SCS 1141AM 117 - - 19.6 3.2 55.3 28132 SeedKoz M	Dekalb	DKC70-27RIB	131	201	166	20.2	0	55.2	
Hubner	Syngenta	NK1573-5222		1	-		3.0		
Hubner	Syngenta	NK1748-3110	115	-	-	18.7	3.6	55.1	27588
Hubner	Hubner	H4663RC2P		217					
Hubner	Hubner	H4744RC2P	128	234	181	19.1	2.2	55.5	29451
Hubner	Hubner	H4763RC2P	118	-	-	18.7	0.6	55.2	28169
Dyna-Gro D54VC34 111 - - 18.9 0 55.2 26968 Dyna-Gro D55VC80 117 226 171 19.0 0 54.6 30585 Seed Consultants SCS 1141AM 117 - - 19.6 3.2 55.3 28132 Seed Consultants SCS 1158AM 113 - - 18.5 3.1 56.6 27431 SeedKoz MC 4319 110 - - 19.8 0 54.6 30310 SeedKoz MC 4670 120 - - 17.8 0 58.7 29558 SeedKoz MC 4725 112 - - 19.2 6.8 55.5 26499 Mid-Atlantic MAS 8128 114 - - 17.6 0 55.4 28387 Mid-Atlantic MAS 8163 115 - - 18.2 0 56.8 29536 Pioneer P1415Q <td< td=""><td>Hubner</td><td>H4828RC2P</td><td>114</td><td>-</td><td>-</td><td>18.5</td><td>1.3</td><td>56.8</td><td>28592</td></td<>	Hubner	H4828RC2P	114	-	-	18.5	1.3	56.8	28592
Dyna-Gro D55VC80 117 226 171 19.0 0 54.6 30585 Seed Consultants SCS 1141AM 117 - - 19.6 3.2 55.3 28132 Seed Consultants SCS 1158AM 113 - - 18.5 3.1 56.6 27431 SeedKoz MC 4319 110 - - 19.8 0 54.6 30310 SeedKoz MC 4670 120 - - 17.8 0 58.7 29558 SeedKoz MC 4725 112 - - 19.2 6.8 55.5 26499 Mid-Atlantic MAS 8163 115 - - 18.2 0 56.8 29536 Pioneer P1415Q 112 - - 18.4 8.7 56.3 27951 Local Seed LC1497 DGVT2PRIB 123 232 177 17.6 0 54.9 29068 Local Seed LC1577 VT2P	Hubner	H4846RC2P	111	235	173	18.2	0.7	57.5	28521
Seed Consultants SCS 1141AM 117 - - 19.6 3.2 55.3 28132 Seed Consultants SCS 1158AM 113 - - 18.5 3.1 56.6 27431 SeedKoz MC 4319 110 - - 19.8 0 54.6 30310 SeedKoz MC 4670 120 - - 17.8 0 58.7 29558 SeedKoz MC 4725 112 - - 19.2 6.8 55.5 26499 Mid-Atlantic MAS 8128 114 - - 17.6 0 55.4 28387 Mid-Atlantic MAS 8163 115 - - 18.2 0 56.8 29536 Pioneer P1415Q 112 - - 18.4 8.7 56.3 27951 Local Seed LC1497 DGVT2PRIB 123 232 177 17.6 0 54.9 29068 Local Seed LC1577 VT	Dyna-Gro	D54VC34	111	-	-	18.9	0	55.2	26968
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Dyna-Gro	D55VC80	117	226	171	19.0	0	54.6	30585
Seed Consultants SCS 1158AM 113 - - 18.5 3.1 56.6 27431 SeedKoz MC 4319 110 - - 19.8 0 54.6 30310 SeedKoz MC 4670 120 - - 17.8 0 58.7 29558 SeedKoz MC 4725 112 - - 19.2 6.8 55.5 26499 Mid-Atlantic MAS 8128 114 - - 17.6 0 55.4 28387 Mid-Atlantic MAS 8163 115 - - 18.2 0 56.8 29536 Pioneer P1415Q 112 - - 18.4 8.7 56.3 27951 Local Seed LC1398 VT2PRIB 120 - - 18.0 2.1 55.8 27467 Local Seed LC1488 VT2PRIB 123 232 177 17.6 0 54.9 29068 Local Seed LC1577 VT2PRIB	Seed	CCC 11/11 AM	117			10.6	2.2	55.2	20122
Consultants SCS 1158AM 113 - - 18.5 3.1 56.6 27431 SeedKoz MC 4319 110 - - 19.8 0 54.6 30310 SeedKoz MC 4700 120 - - 17.8 0 58.7 29558 SeedKoz MC 4725 112 - - 19.2 6.8 55.5 26499 Mid-Atlantic MAS 8128 114 - - 17.6 0 55.4 28387 Mid-Atlantic MAS 8163 115 - - 18.2 0 56.8 29536 Pioneer P1415Q 112 - - 18.4 8.7 56.3 27951 Local Seed LC1398 VT2PRIB 120 - - 18.0 2.1 55.8 27467 Local Seed LC1497 116 - - 16.6 0.7 54.9 26499 Local Seed LC1577 VT2PRIB <		3C3 1141AM	11/	1	-	19.0	3.2	33.3	20132
SeedKoz MC 4319 110 - - 19.8 0 54.6 30310	I .	SCS 1158AM	113			19.5	3 1	56.6	27/31
SeedKoz MC 4670 120 - - 17.8 0 58.7 29558 SeedKoz MC 4725 112 - - 19.2 6.8 55.5 26499 Mid-Atlantic MAS 8128 114 - - 17.6 0 55.4 28387 Mid-Atlantic MAS 8163 115 - - 18.2 0 56.8 29536 Pioneer P1415Q 112 - - 18.4 8.7 56.3 27951 Local Seed LC1398 VT2PRIB 120 - - 18.0 2.1 55.8 27467 Local Seed LC1488 VT2PRIB 123 232 177 17.6 0 54.9 29068 Local Seed LC1497 116 - - 16.6 0.7 54.9 26499 Local Seed LC1307 TCRIB 120 - - 17.4 0 56.7 27953 Trial Mean 118			113	-	_		3.1	30.0	
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$				-	-				
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$			120	-	-		_		
$\begin{array}{c ccccccccccccccccccccccccccccccccccc$			112	-	-		6.8		
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Mid-Atlantic	MAS 8128	114	-	-	17.6	0	55.4	28387
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$				-	-				
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$				•	-				
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$					_			55.8	27467
$ \begin{array}{c ccccccccccccccccccccccccccccccccccc$	Local Seed		123	232	177	17.6	0	54.9	29068
	Local Seed		116	-	-	16.6	0.7	54.9	26499
	Local Seed	LC1577 VT2PRIB	119	253	186	18.4	0.7	56.8	27014
$\begin{tabular}{c ccccccccccccccccccccccccccccccccccc$	Local Seed	LC1307 TCRIB	120	-	-	17.4	0	56.7	27953
$\begin{tabular}{ c c c c c c c c c c c c c c c c c c c$			118				1.3	55.9	
LSD _{0.1} NS ⁵ 0.6 3.2 NS ⁵ NS ⁵									
	ů								
						5.7	213	3.6	9.2

¹See Table 7 for trait designations for full season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 23. Performance of early season maturity hybrids evaluated at Central Maryland Research and Education Center – Clarksville Facility in 2020.

		Yield (bu/ac) ²	2 yr	Moisture	Lodging ³	Test	Dopulation
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	Loughig %	weight (lb/bu) ²	Population (plants/ac)
Mid-Atlantic ⁴	MAS 8034	-	•	•	-	-	•	-
Pioneer	P0075AM	120	-	-	17.9	2.3	50.6	25312
Local Seed	LC0297 SSXRIB	120	ı	ı	18.8	9.5	51.6	24706
Dekalb	DKC55-54RIB	127	-	-	18.3	3.5	52.3	29820
Dekalb	DKC55-85RIB	130	238	184	17.7	6.6	51.9	29993
Hubner	H05G716	139*	-	-	17.6	6.1	53.4	27740
Hubner	H4390RC2P	144*	233	188	19.2	6.5	51.9	27220
Seed Consultants	SCS 1071AM	146*	-	-	18.1	2.5	53.0	30167
Seed Consultants	SCS 1069AM	142*	-	-	18.2	5.0	52.5	31034
Dekalb	DKC54-65	148*	•	•	17.9	2.5	52.3	30167
Pioneer	P0843AM	141*		-	18.4	2.7	49.9	30860
Local Seed	LC0607 TCRIB	145*	ı	ı	17.7	1.7	48.7	31207
Local Seed	LC0877 VT2PRIB	139*	ı	ı	18.0	2.5	54.0	27046
Trial Mean		136			18.2	4.3	52.0	28704
Probability > F		0.0404			0.0829	0.5723	0.6302	0.0097
LSI	$\mathrm{LSD}_{0.1}$		·		0.9	NS ⁵	NS	3001
CV	CV%		·		3.9	93	4.5	9.2

¹See Table 5 for trait designations for early season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

^{*}Hybrids with an asterisk next to yield are not statistically different (Probability $> F \le 0.1$) compared to the top yielding hybrid (highlighted in blue) at this location.

Table 24. Performance of mid-season maturity hybrids evaluated at Central Maryland Research and Education Center – Clarksville Facility in 2020.

- 415	Hybrid Name ¹	Yield (bu/ac) ²		2 yr	Moisture	Lodging ³	Test	Population
Brand/Company		2020	2019	Yield Avg	%	%	Weight (lb/bu) ²	(plants/ac)
Local Seed	LC0999 VT2PRIB	159	-	-	19.1	1.8	51.3	28777
Dekalb	DKC59-82RIB	165	-	-	18.7	0	51.8	30167
Dekalb	DKC61-41RIB	158	-	-	19.0	0	48.5	29407
Dekalb ⁴	DKC62-53RIB	149	223	186	18.7	0	50.9	30340
Syngenta	NK1082-5222	159	-	-	20.6	0.6	57.8	29721
Syngenta	NK1239-5122	159	-	-	20.1	1.7	51.0	29647
Hubner	H09G056	152	-	-	18.4	2.4	51.7	28953
Hubner	H4321RC2P	158	-	-	18.8	0.6	49.0	26925
Hubner	H4692RC2P	149	220	184	19.1	0.5	50.8	30340
Seed Consultants	SCS 1111Q	144	-	-	18.8	0	50.4	28607
Seed Consultants	SCS 1121AM	155	-	-	19.9	0	52.6	29127
SeedKoz	MC 3952	147	-	-	19.1	0.7	52.3	29647
SeedKoz	MC 4255	144	-	-	18.8	0	47.6	28433
Mid-Atlantic	MAS 8091	159	-	-	19.3	0	52.8	31034
Pioneer	P1197AM	147	260	217	18.9	0	54.7	29300
Local Seed	LC0908 VT2PRIB	163	-	-	19.3	0.5	52.5	29127
Local Seed	LC1009 VT2PRIB	163	-	-	18.5	0	51.0	29647
Local Seed	LC1108 TCPRIB	158	-	-	20.8	0	50.6	28953
Local Seed	LC1207 TCRIB	151	-	-	19.0	0	48.5	27393
Local Seed	LC1289 VT2PRIB	136	231	183	19.9	0.8	51.6	29300
Trial Mean		154			19.2	0.5	51.4	29242
Probability > F		0.2649			<0.0001	0.5871	0.4406	0.9714
LSD _{0.1}		NS ⁵			0.5	NS	NS	NS
CV	%	8.0			4.0	273	11.7	7.9

¹See Table 7 for trait designations for mid-season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 25. Performance of full season maturity hybrids evaluated at Central Maryland Research and Education Center – Clarksville Facility in 2020.

D 1/C	TI I 'INT 1	Yield (bu/ac) ²		2 yr	Moisture	Lodging ³	Test	Population
Brand/Company	Hybrid Name ¹	2020	2019	Yield Avg	%	%	Weight (lb/bu) ²	(plants/ac)
Dekalb	DKC64-64RIB	154	-	-	20.1	1.1	52.7	29647
Dekalb	DKC63-91RIB	140	-	-	19.2	0.7	53.6	28342
Dekalb	DKC65-95RIB	136	240	188	20.4	0	54.3	29763
Dekalb	DKC65-99RIB	133	-	-	19.9	0.5	54.7	32941
Dekalb	DKC66-18RIB	137	255	196	20.8	0	54.1	29993
Dekalb	DKC67-44RIB	152	270	211	20.4	0	56.8	28841
Dekalb	DKC68-69RIB	128	-	-	20.9	0	55.3	30514
Dekalb	DKC69-99RIB	151	-	-	20.2	0	55.3	32074
Dekalb	DKC70-27RIB	138	254	196	21.0	0.6	49.9	29300
Syngenta	NK1573-5222	137	-	-	22.4	0.6	50.4	27913
Syngenta	NK1748-3110	137	-	-	20.6	0	52.1	27134
Hubner	H4663RC2P	122	252	187	20.8	1.3	51.6	26699
Hubner	H4744RC2P	139	185	162	20.6	0	53.3	24877
Hubner	H4763RC2P	139	-	-	20.0	0	54.3	28009
Hubner	H4828RC2P	146	-	-	20.6	0	53.3	30602
Hubner	H4846RC2P	144	223	183	20.0	0	56.0	29797
Dyna-Gro	D54VC34	148	-	-	20.6	0	55.6	28607
Dyna-Gro	D55VC80	142	256	199	20.4	1.1	53.5	31554
Seed Consultants	SCS 1141AM	140	-	-	21.6	0.5	55.8	29820
Seed Consultants	SCS 1158AM	128	-	-	19.9	0	52.2	27740
SeedKoz	MC 4319	125	-	-	20.4	1.1	54.6	31207
SeedKoz	MC 4670	131	-	-	19.6	5.7	55.0	29701
SeedKoz	MC 4725	126	-	-	21.0	0	54.6	29820
Mid-Atlantic	MAS 8128	129	-	-	19.1	0	53.1	29300
Mid-Atlantic	MAS 8163	141	•	•	20.9	0	54.5	26526
Pioneer	P1415Q	126		-	19.9	0	55.1	27220
Local Seed	LC1398 VT2PRIB	130	ı	1	19.4	0	52.9	28780
Local Seed	LC1488 VT2PRIB	138	240	189	19.4	0	54.4	29473
Local Seed	LC1497 DGVT2PRIB	134	-	-	19.5	1.2	53.0	29482
Local Seed	LC1577 VT2PRIB	133	261	197	20.4	0.6	53.4	28521
Local Seed	LC1307 TCRIB	135	-	-	19.7	0.6	53.9	28433
Trial Mean		137			20.3	0.5	53.9	29104
Probability > F		0.8795			<0.0001	0.6262	0.1022	0.1889
LSD _{0.1}		NS ⁵			0.7	NS	NS	NS
CV%		11.9	1. 1. 21.		4.0	382	4.5	9.3

¹See Table 7 for trait designations for full season hybrids.

²Yields and test weights are reported at 15% moisture content.

³Lodging is recorded as percentage of plants that are broken below the ear and/or leaning 45° or greater.

⁴Hybrids in **bold** are checks.

⁵NS indicates that no statistically significant difference was observed for this characteristic.

Table 26. Relative yield scores for early season hybrids evaluated in 2020. Hybrids with scores 100 or greater at four or more locations are considered to have good stability.

	Hybrid Name ¹	Relative Yield								
Brand/Company		Avg. 5 sites	Wye	Poplar Hill	Salisbury	Clarksville	Keedysville			
Mid-Atlantic ⁴	MAS 8034	88	79	93	84	-	89			
Pioneer	P0075AM	96	90	98	108	88	95			
Local Seed	LC0297 SSXRIB	96	91	95	105	89	95			
Dekalb	DKC55-54RIB	100	105	92	101	93	109			
Dekalb	DKC55-85RIB	99	108	92	104	96	96			
Hubner	H05G716	98	98	99	94	102	101			
Hubner	H4390RC2P	111	117	117	116	106	99			
Seed Consultants	SCS 1071AM	105	111	103	103	107	103			
Seed Consultants	SCS 1069AM	101	103	102	95	104	105			
Dekalb	DKC54-65	95	92	89	95	109	95			
Pioneer	P0843AM	105	110	112	98	103	107			
Local Seed	LC0607 TCRIB	102	102	99	100	107	98			
Local Seed	LC0877 VT2PRIB	98	93	102	98	102	103			
Trial Mean (bu/acre)		157	184	150	187	136	123			

¹Hybrids in **bold** are checks included with funding from Maryland Grain Producers Utilization Board Hybrids highlighted in green have relative yield ratings of 100 or greater at all sites Hybrid highlighted in yellow have relative yield ratings of 100 or greater at four testing sites

Table 27. Relative yield scores for mid-season hybrids evaluated in 2020. Hybrids with scores 100 or greater at four or more locations are considered to have good stability.

		Relative Yield						
Brand/Company	Hybrid Name ¹	Avg. 5 sites	Wye	Poplar Hill	Salisbury	Clarksville	Keedysville	
Local Seed	LC0999 VT2PRIB	100	102	92	103	103	94	
Dekalb	DKC59-82RIB	108	107	110	109	107	104	
Dekalb	DKC61-41RIB	104	108	111	106	102	101	
Dekalb ⁴	DKC62-53RIB	100	98	91	109	97	100	
Syngenta	NK1082-5222	100	96	95	103	103	99	
Syngenta	NK1239-5122	94	93	94	93	103	95	
Hubner	H09G056	102	104	96	108	99	102	
Hubner	H4321RC2P	103	105	100	101	102	104	
Hubner	H4692RC2P	96	98	90	97	96	96	
Seed Consultants	SCS 1111Q	98	97	105	90	94	105	
Seed Consultants	SCS 1121AM	95	91	93	97	101	102	
SeedKoz	MC 3952	100	96	117	99	95	100	
SeedKoz	MC 4255	99	102	102	98	94	99	
Mid-Atlantic	MAS 8091	100	99	94	98	103	88	
Pioneer	P1197AM	96	96	96	89	95	107	
Local Seed	LC0908 VT2PRIB	104	102	106	100	106	107	
Local Seed	LC1009 VT2PRIB	100	103	94	101	106	95	
Local Seed	LC1108 TCPRIB	99	105	98	94	102	98	
Local Seed	LC1207 TCRIB	105	105	113	103	98	104	
Local Seed	LC1289 VT2PRIB	98	98	105	101	88	97	
Trial Mean		167	204	162	194	154	123	

¹Hybrids in **bold** are checks included with funding from Maryland Grain Producers Utilization Board Hybrids highlighted in green have relative yield ratings of 100 or greater at all sites Hybrid highlighted in yellow have relative yield ratings of 100 or greater at four testing sites

Table 28. Relative yield scores for full season hybrids evaluated in 2020. Hybrids with scores 100 or greater at four or more locations are considered to have good stability.

		Relative Yield						
Brand/Company	Hybrid Name ¹	Avg. 5 sites	Wye	Poplar Hill	Salisbury	Clarksville	Keedysville	
Dekalb	DKC64-64RIB	102	107	90	97	113	106	
Dekalb	DKC63-91RIB	102	93	97	108	102	111	
Dekalb	DKC65-95RIB	99	93	96	105	100	103	
Dekalb	DKC65-99RIB	102	104	103	99	97	97	
Dekalb	DKC66-18RIB	103	101	108	103	100	98	
Dekalb	DKC67-44RIB	104	106	107	100	111	97	
Dekalb	DKC68-69RIB	101	108	102	102	93	101	
Dekalb	DKC69-99RIB	105	108	103	102	110	95	
Dekalb	DKC70-27RIB	104	102	101	104	100	111	
Syngenta	NK1573-5222	95	89	99	94	100	95	
Syngenta	NK1748-3110	97	95	103	90	100	98	
Hubner	H4663RC2P	97	102	90	97	89	109	
Hubner	H4744RC2P	105	101	102	109	102	109	
Hubner	H4763RC2P	102	98	113	99	101	100	
Hubner	H4828RC2P	100	97	98	99	107	97	
Hubner	H4846RC2P	102	102	106	101	105	94	
Dyna-Gro	D54VC34	104	109	104	100	108	94	
Dyna-Gro	D55VC80	104	103	107	106	103	99	
Seed Consultants	SCS 1141AM	95	91	91	96	102	99	
Seed Consultants	SCS 1158AM	101	116	95	100	93	96	
SeedKoz	MC 4319	99	102	103	99	91	93	
SeedKoz	MC 4670	100	95	103	102	95	102	
SeedKoz	MC 4725	96	99	95	95	92	95	
Mid-Atlantic	MAS 8128	97	93	102	100	94	97	
Mid-Atlantic	MAS 8163	104	108	108	101	103	97	
Pioneer	P1415Q	91	89	91	90	92	95	
Local Seed	LC1398 VT2PRIB	95	94	92	95	95	102	
Local Seed	LC1488 VT2PRIB	103	102	103	102	101	105	
Local Seed	LC1497 DGVT2PRIB	91	91	74	97	98	99	
Local Seed	LC1577 VT2PRIB	104	107	107	105	97	101	
Local Seed	LC1307 TCRIB	101	102	98	103	98	102	
Trial Mean	(bu/acre)	166	203	179	195	137	118	

¹Hybrids in **bold** are checks included with funding from Maryland Grain Producers Utilization Board Hybrids highlighted in green have relative yield ratings of 100 or greater at all sites Hybrid highlighted in yellow have relative yield ratings of 100 or greater at four testing sites