

## 2023-2024 Cool-Season Forages Official Variety Trial Report

*Marcelo Wallau, Maria Elena Mailhos, Cheryl Mackowiak and Diwakar Vyas*

The UF/IFAS 2023-24 cool-season forages variety is a partnership between the UF/IFAS Forage Team, forage breeders and the seed industry, to test commercially available and experimental small grains (rye, oat, triticale and wheat) and ryegrass varieties. Data from those trials can help forage breeders and managers to assess performance of improved materials and monitor disease resistance breakdown. These results help us refining the variety recommendations lists which are updated annually (<https://edis.ifas.ufl.edu/publication/AA266>). This year we had a total of 89 entries, representing 15 companies and breeding programs. We conducted two separate trials, a traditional multi-cut, focusing on hay and grazing use, and single-cut targeting silage production for the region. The multi-cut was located at the Plant Sciences Research and Education Unit (PSREU) in Citra, FL; and the single-cut was on farm, at two dairies: White Oak in Lafayette county, and UF Dairy in Alachua County, FL. For the single cut trial, all forages were harvested at the time, defined by farm management prior to planting spring corn (i.e., not based on maturity). The multi-cut trial followed a 4-week cutting interval. Protocols, planting and harvesting dates are included below. A separate disease nursery was planted at the PSREU with all entries in both trials. Moreover, we implemented demonstration sites in four dairies in the region, as part of the Milk Check-Off program. Those data are replicated, but not part of the official variety trial. Results from the 2022-23 and 2023-24 milk-check off demonstration plots are presented at the end of this report.

### Single-cut

- The trial was conducted in two locations, on farm, and followed farm management schedules. Both locations were irrigated using wastewater throughout the season, along with a starter chemical fertilizer.
- Plots were planted on 10/26/23, at 30 lbs/A for ryegrass and 90 lbs/A for small grains.
- All cultivars were harvested at the same time, independent of maturity, following farm schedule. Harvest date was 2/22/2024
- Target fertilization was between 120 – 150 lbs/A of N.

### Multi-cut

- This was conducted at the Plant Science Research and Education Unit in Citra, FL.
- Plots were planted on 10/27/23, at 30 lbs/A for ryegrass and 90 lbs/A for small grains.
- Fertilization followed a 30 + 50 lbs/A N prior to the first cut, then 50 lbs/A of N after each cut.
- No fungicides or insecticides were used.
- Plots were harvested four times throughout the season, on 1/17/24 (Harvest 1); 2/14/24 (Harvest 2); 3/14/24 (Harvest 3); and /10/24 (Harvest 4).

### Disease nursery

- Planted at the PSREU, includes all materials from both multi-cut and single cut trials.
- No cut was applied. Main diseases observed were leaf spots, rusts and virus.



- Diseases were scored twice, on 3/19/2024 and 4/12/2024, using a scale from 0-9. Data was converted to percentage incidence for analysis. A high percentage indicates greater disease incidence.

Disclosure: this variety test is conducted independently by UF/IFAS faculty and is open for all seed companies and breeding programs. There are other varieties available in the market that are not included in the test, which does not mean they do not perform well. Our variety recommendation lists consider results from multi-location trials, in collaboration with Auburn University and the University of Georgia, and include varieties that have shown superior performance over a three year testing period. Varieties not entered in the test are liable to be dropped from the recommendation lists because of limiting data.

For more information, email the Forage Team at [forages@ifas.ufl.edu](mailto:forages@ifas.ufl.edu), or contact your [local extension agent](#).



Results from the 2023-2024 Cool-season forage variety trial (single cut trial)

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Table 1: Oat, single cut biomass production and nutritive value

Variety	Company	Biomass <sup>1</sup> lb DM/ac	ADF	Ash	CP	ESC	----- % DM -----		NSC	TDN	----- % NDF -----	
							IVTDMD48h				aNDF 48h	NDFd 48h
Cadillac	TriCal	3,338	29.8	7.8	18.2	6.4	82.9		9.2	67.4	50.3	71.2
Maximus	Specilty seeds	2,954	28.1	7.6	18.5	6.5	<b>84.6</b>		9.8	<b>69.2</b>	49.6	72.9
FL13084-8	UF	3,245	<b>32.2</b>	6.9	17.5	5.7	79.0		8.2	64.9	<b>55.9</b>	67.1
Horizon 214	Mixon	2,970	28.7	8.3	<b>20.3</b>	5.2	<b>84.4</b>		8.2	<b>68.6</b>	48.9	72.9
Horizon 306	Mixon	2,676	26.3	8.2	19.3	6.0	<b>86.1</b>		9.7	<b>71.1</b>	47.2	<b>74.9</b>
Horizon 578	Mixon	3,551	28.5	8.1	18.9	5.9	<b>84.9</b>		8.9	<b>68.7</b>	49.4	<b>73.9</b>
Horizon 720	Mixon	3,744	<b>34.3</b>	6.2	15.1	5.9	75.5		8.4	62.6	<b>58.3</b>	63.1
Legend 567	Mayo Ag	<b>3,876</b>	<b>33.6</b>	6.7	16.5	5.6	75.6		7.5	63.4	<b>58.0</b>	63.7
	Mean	3,294	30.2	7.5	18.0	5.9	81.6		8.7	67.0	52.2	70.0
	SE	307	0.7	0.5	0.6	0.5	0.9		0.7	0.8	0.7	1.5

<sup>1</sup> Numbers in bold meaning top performing variety within the response observed (statistically differ at P = 0.05 from the overall mean)

Table 2: Rye, single cut biomass production and nutritive value

Variety	Company	Biomass <sup>1</sup> lb DM/ac	ADF	Ash	CP	ESC	----- % DM -----		NSC	TDN	----- % NDF -----	
							IVTDMD48h				aNDF 48h	NDFd 48h
FL405	UF	<b>3,051</b>	<b>37.9</b>	4.2	14.6	6.0	65.2		7.8	58.9	<b>63.9</b>	50.2
KWS H95075	KWS	1,886	24.7	6.8	19.9	<b>8.1</b>	<b>84.1</b>		<b>11.4</b>	<b>72.7</b>	48.0	<b>73.7</b>
KWS SH06	KWS	2,068	25.4	7.8	<b>21.1</b>	<b>7.9</b>	<b>83.9</b>		10.4	<b>72.1</b>	47.5	73.0
KWS SH07	KWS	2,424	28.6	6.9	18.5	6.4	79.9		9.1	68.7	52.2	67.6
Kelly Grazer III	Control	2,331	27.1	<b>8.0</b>	20.4	6.0	<b>83.6</b>		9.0	<b>70.2</b>	48.7	<b>71.4</b>
	Mean	2,352	28.7	6.7	18.9	6.9	79.4		9.5	68.5	52.0	67.2
	SE	321	0.9	0.6	1.1	0.4	1.0		0.5	0.9	1.2	1.4

<sup>1</sup> Numbers in bold meaning top performing variety within the response observed (statistically differ at P = 0.05 from the overall mean)

**Table 4: Triticale, single cut biomass production and nutritive value**

Variety	Company	Biomass <sup>1</sup>	ADF	Ash	CP	ESC	IVTDMD48h	NSC	TDN	aNDF 48h	NDFd 48h
		lb DM/ac	----- % DM -----								
FL1143	TriCal	3,493	<b>35.2</b>	4.2	15.2	6.3	67.6	7.6	61.8	<b>62.1</b>	55.4
Surge	TriCal	2,900	30.3	7.1	<b>18.5</b>	6.5	<b>80.6</b>	8.6	<b>66.9</b>	53.8	<b>70.5</b>
Trical 342	TriCal	3,554	<b>34.8</b>	5.5	16.3	6.1	71.7	7.3	62.1	<b>60.6</b>	61.4
Trical HTF	TriCal	2,881	32.7	<b>7.9</b>	<b>20.2</b>	4.4	<b>79.0</b>	5.9	64.3	55.8	66.7
Trical HTG	TriCal	3,047	32.4	5.9	16.7	7.0	77.6	<b>9.3</b>	64.7	56.4	67.0
	<i>Mean</i>	3,175	33.1	6.1	17.4	6.1	75.3	7.8	63.9	57.7	64.2
	<i>SE</i>	307	0.7	0.6	0.3	0.6	1.2	0.7	0.7	1.0	1.5

<sup>1</sup> Numbers in bold meaning top performing variety within the response observed (statistically differ at P = 0.05 from the overall mean)

**Table 3: Ryegrass, single cut biomass production and nutritive value**

Variety	Company	Biomass <sup>1</sup>	ADF	Ash	CP	ESC	IVTDMD48h	NSC	TDN	aNDF 48h	NDFd 48h
		lb DM/ac	--- % DM -----								
Gulf	Control	3,543	<b>27.6</b>	9.2	18.6	7.7	89.9	12.0	69.7	45.7	80.9
Ranahan	Mountain View	3,047	25.1	8.3	<b>19.0</b>	8.0	90.4	12.5	<b>72.3</b>	43.9	82.1
	<i>Mean</i>	3,295	26.4	8.7	18.8	7.9	90.2	12.2	71.0	44.8	81.5
	<i>SE</i>	575	0.9	0.4	0.2	0.7	0.9	0.7	0.9	0.8	2.1

<sup>1</sup> Numbers in bold meaning top performing variety within the response observed (statistically differ at P = 0.05 from the overall mean)

### Disclosure

This variety test is conducted independently by UF/IFAS faculty and is open for all seed companies to enter varieties for the test.

### Management information

Trial was conducted at the UF Dairy Unit, Alachua, FL

Planting date: 10/26/2023

Planting rate: Oat, rye, triticale: 90 lb/ac; Annual Ryegrass: 30 lb/ac

Fertilizer Application: Wastewater irrigation throughout the season plus 50 lb N/ac (early Dec). Estimated total N ~ 120 lbs/A.

Pesticide application: Aim (2 oz/ac) + 2,4D (2 pts/ac).

Harvest date: 2/22/24

### Contact

For more information, contact [forages@ifas.ufl.edu](mailto:forages@ifas.ufl.edu)

# University of Florida/Institute of Food and Agricultural Sciences



FORAGE TEAM

## Results from the 2023-2024 Cool-season forage variety trial (multi cut)

Marcelo Wallau, Maria Elena Mailhos, Cheryl Mackowiak and Diwakar Vyas

**Table 1. Annual ryegrass varieties yield by harvest and Total yield**

Variety	Company	lb DM/ac						Total Yield
		Harvest 1 <sup>1,2</sup>	Harvest 2	Harvest 3	Harvest 4			
Gulf	Control	<b>623</b> c	<b>1,353</b> b	1,793 a	2,162 a		6,453	
Lonestar	GO Seeds	522 d	1,219 c	2,117 b	<b>2,681</b> a		6,539	
More	GO Seeds	507 c	1,167 b	1,531 ab	1,890 a		5,095	
Tetrastar	GO Seeds	<b>784</b> c	1,184 bc	1,724 b	2,521 a		6,212	
RANAHAN	Mountain View	359 c	1,275 b	1,918 a	2,367 a		5,919	
Earlyploid	Ragan and Massey	496 d	1,418 c	<b>3,132</b> a	2,248 b		<b>7,293</b>	
Prine	Ragan and Massey	534 c	1,052 bc	1,508 b	2,382 a		5,477	
Ed	Smith Seeds	628 c	1,262 b	1,888 a	2,312 a		6,090	
FrostProof	Smith Seeds	402 c	1,180 b	2,453 a	2,075 a		6,110	
SELWD19-12	Smith Seeds	163 c	1,205 b	1,678 b	2,660 a		5,705	
SELWDMACK	Smith Seeds	21 b	409 b	1,481 a	1,769 a		3,679	
Verdure	Smith Seeds	622 b	1,149 b	2,055 a	2,395 a		6,221	
FL4XLATE	UF	<b>826</b> c	1,428 b	<b>2,846</b> a	<b>2,823</b> a		<b>7,923</b>	
FLPR2XGRB	UF	233 c	<b>1,667</b> b	<b>3,397</b> a	2,092 b		<b>7,388</b>	
FLSME	UF	368 c	<b>1,512</b> b	<b>3,133</b> a	1,878 b		<b>6,890</b>	
Jackson	Wax	147 c	1,066 b	1,976 a	2,122 a		5,311	
ME-4	Wax	365 c	1,135 b	1,862 a	1,993 a		5,355	
ME-94	Wax	216 c	1,027 b	1,543 b	2,472 a		5,258	
Nelson	Wax	590 c	1,432 b	2,327 a	2,444 a		<b>6,794</b>	
WAX Marshal	Wax	282 c	1,116 b	1,423 b	2,076 a		4,897	
WMWL	Wax	221 c	1,009 b	1,592 a	2,061 a		4,882	
WMWL-2	Wax	480 c	1,030 bc	1,538 b	2,128 a		5,176	
	<i>Mean</i>	427	1,195	2,042	2,252		5,939	
	<i>SE</i>	141	130	278	221		368	

<sup>1</sup> Numbers in bold meaning top performing variety within harvest date (statistically differ at P = 0.05 from the overall mean)

<sup>2</sup> Different letters meaning statistical differences for each variety between harvest dates

**Table 2. Oat varieties yield by harvest and Total yield**

Variety	Company	Harvest 1 <sup>1,2</sup> Harvest 2 Harvest 3 Harvest 4 Total Yield								
		----- lb DM/ac -----								
Graham	Clemson	1,209	ab	1,298	ab	1,618	a	801	b	4,926
Scop 85-8	Clemson	1,140	c	1,246	bc	2,181	a	<b>1,822</b>	ab	6,389
O23-1007/LA150155B-550	LSU	578	b	963	b	2,016	a	<b>2,112</b>	a	5,669
WN23OAT-07/LA170895BS45-1-1	LSU	801	c	1,086	bc	2,055	a	1,467	ab	5,409
WN23OAT-18/LA1706955BSS-2-1	LSU	1,198	b	1,317	ab	1,868	a	1,472	ab	5,855
WN23OAT-25	LSU	<b>1,734</b>	b	1,326	b	2,402	a	1,716	b	<b>7,178</b>
Horizon 214	Mixon	1,451	a	1,475	a	1,566	a	811	b	5,302
Horizon 306	Mixon	880	c	1,153	bc	2,126	a	1,563	ab	5,722
Horizon 578	Mixon	1,018	b	1,384	b	2,036	a	1,207	b	5,645
Horizon 720	Mixon	<b>1,968</b>	a	1,272	b	1,865	a	902	b	6,007
11019	Ragan and Massey	<b>1,651</b>	a	1,457	a	1,804	a	1,703	a	6,616
Maximus	Specilty seeds	1,313	b	1,267	b	1,916	a	1,517	ab	6,013
Cadillac	TriCal	1,213	b	<b>1,542</b>	b	<b>2,796</b>	a	1,114	b	<b>6,665</b>
FL13123-50	UF	599	c	1,399	b	<b>3,302</b>	a	1,071	bc	6,371
FL13123-54	UF	947	b	1,301	b	2,397	a	947	b	5,592
FL13126-69	UF	794	c	1,250	bc	1,987	a	<b>1,794</b>	ab	5,826
	<i>Mean</i>	1,156		1,296		2,121		1,376		5,949
	<i>SE</i>	269		117		223		216		350

<sup>1</sup> Numbers in bold meaning top performing variety within harvest date (statistically differ at P = 0.05 from the overall mean)

<sup>2</sup> Different letters meaning statistical differences for each variety between harvest dates

### Disclosure

This variety test is conducted independently by UF/IFAS faculty and is open for all seed companies to enter varieties for the test.

### Management information

Trial was conducted at the Plant Science Research and Education Unit, in Citra, FL

Planting date: 10/27/2023

Planting rate: Annual Ryegrass: 30 lb/ac; Oat: 90 lb/ac

Fertilizer Application: N-P-K rates of 30-10-30 (1 week after planting), 50-0-25 (3 weeks after planting). After every harvest 50 lb N/ac were applied.

Pesticide application: Weedar 64 @ 32 oz/ac for brassicas (11/21/23).

Harvests: (1) 1/17/24; (2) 2/14/24; (3) 3/14/24; (4) 4/10/24

### Contact

For more information, contact [forages@ifas.ufl.edu](mailto:forages@ifas.ufl.edu)

Results from the 2023-2024 Cool-season forage variety trial (disease nursery)

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Table 1. Oat varieties disease score by disease (%) and date

Variety	Company	BYDV <sup>1,2</sup>		Leaf Spot <sup>1</sup>		Crown rust ( <i>Puccinia sp.</i> )				Stem rust ( <i>Puccinia sp.</i> )			
			SE <sup>3</sup>		SE	Mar. 19	SE	Apr. 12	SE	Mar. 19	SE	Apr. 12	SE
Graham	Clemson	60	17 ab <sup>4,5</sup>	11	6 bc	72	22 abcd	94	7 a	0	0 b	0	0 c
Scop 85-8	Clemson	26	15 ab	20	10 abc	59	27 bcd	69	24 abcd	0	0 b	0	0 c
O23-1007/LA150155B-550	LSU	43	17 ab	10	6 bc	64	24 bcd	46	26 abcd	0	0 b	0	0 c
WN23OAT-07/LA170895BS45-1-1	LSU	26	15 ab	11	6 bc	46	26 bcd	37	25 cd	0	0 b	0	0 c
WN23OAT-18/LA1706955BSS-2-1	LSU	46	17 ab	37	16 ab	16	15 d	42	26 bcd	0	0 b	0	0 c
WN23OAT-25	LSU	67	16 a	22	12 abc	17	16 cd	58	28 abcd	0	0 b	0	0 c
Legend 567	Mayo	23	14 ab	12	7 abc	99	2 a	77	20 abc	7	2 a	0	0 c
Horizon 214	Mixon	36	16 ab	7	4 c	91	10 ab	81	17 abc	0	0 b	30	10 a
Horizon 306	Mixon	36	16 ab	20	11 abc	87	13 ab	78	19 abc	0	0 b	0	0 c
Horizon 578	Mixon	40	17 ab	11	6 bc	46	27 bcd	41	26 bcd	0	0 b	10	3 b
Horizon 720	Mixon	50	17 ab	11	6 bc	80	19 abc	93	8 ab	0	0 b	0	0 c
11019	Ragan and Massey	16	12 b	46	17 a	62	26 bcd	62	26 abcd	0	0 b	0	0 c
Maximus	Specilty seeds	50	17 ab	18	10 abc	43	26 bcd	43	26 bcd	0	0 b	0	0 c
Cadillac	TriCal	19	13 b	7	4 c	86	14 ab	79	18 abc	0	0 b	0	0 c
FL13084-8	UF	33	16 ab	16	9 abc	15	14 d	15	14 d	0	0 b	0	0 c
FL13123-50	UF	19	13 b	10	6 bc	88	12 ab	78	19 abc	0	0 b	0	0 c
FL13123-54	UF	29	15 ab	11	6 bc	73	21 abcd	73	21 abcd	0	0 b	17	6 ab
FL13126-69	UF	57	17 ab	18	10 abc	22	19 cd	54	26 abcd	0	0 b	0	0 c
<i>Mean</i>		38		17		59		62		0		3	

<sup>1</sup> BYDV (Barley Yellow Dwarf Virus) and Leaf spot (non specified) were measured just on 3/12/2024

<sup>2</sup> Disease scores evaluated on scale from 0 - 9, and reported as percentage.

<sup>3</sup> Analysis was performed using a beta distribution, resulting in different standard errors for each variety mean

<sup>4</sup> Letters in bold meaning top performing (least disease) within the variable (statistically differ at P = 0.05 from the overall mean)

<sup>5</sup> Different letters represent statistical differences within each disease variable (statistically differ at P = 0.05 from the overall mean)

**Table 2. Rye varieties disease score by disease (%) and date**

Variety	Company	BYDV <sup>1,2</sup>		Leaf Spot <sup>1</sup>		Leaf rust ( <i>Puccinia sp.</i> )	
			SE <sup>3</sup>		SE	Apr. 12	SE
FL405	UF	20	5 <b>b</b> <sup>4,5</sup>	9	5 ab	0	0 <b>b</b>
Kelly Grazer III	Control	26	5 ab	11	6 ab	4	6 a
KWS SH06	KWS	37	6 a	31	11 ab	0	0 <b>b</b>
KWS SH07	KWS	26	5 ab	36	12 a	0	0 <b>b</b>
KWS H95075	KWS	16	4 <b>b</b>	8	5 <b>b</b>	0	0 <b>b</b>
	<i>Mean</i>	25		19		1	

<sup>1</sup> BYDV (Barley Yellow Dwarf Virus) and Leaf spot (non specified) were measured just on 3/12/2024

<sup>2</sup> Disease scores evaluated on scale from 0 - 9, and reported as percentage.

<sup>3</sup> Analysis was performed using a betta distribution, resulting in different standard errors for each variety mean

<sup>4</sup> Letters in bold meaning top performing (least disease) within the variable (statistically differ at P = 0.05 from the overall mean)

<sup>5</sup> Different letters represent statistical differences within each disease variable (statistically differ at P = 0.05 from the overall mean)

**Table 3. Triticale varieties disease score by disease (%) and date**

Variety	Company	BYDV <sup>1,2</sup>		Leaf Spot	
			SE <sup>3</sup>		SE
FL1143	TriCal	47	10 a <sup>4,5</sup>	36	9 ab
Surge	TriCal	47	10 a	50	9 a
Trical 342	TriCal	23	8 ab	40	9 bc
Trical HTF	TriCal	37	9 ab	29	8 bc
Trical HTG	TriCal	17	7 <b>b</b>	16	6 <b>c</b>
	<i>Mean</i>	34		34	

<sup>1</sup> BYDV (Barley Yellow Dwarf Virus) and Leaf spot (non specified) were measured just on 3/12/2024

<sup>2</sup> Disease scores evaluated on scale from 0 - 9, and reported as percentage.

<sup>3</sup> Analysis was performed using a betta distribution, resulting in different standard errors for each variety mean

<sup>4</sup> Letters in bold meaning top performing (least disease) within the variable (statistically differ at P = 0.05 from the overall mean)

<sup>5</sup> Different letters represent statistical differences within each disease variable (statistically differ at P = 0.05 from the overall mean)



**Table 4. Annual ryegrass varieties disease score by disease (%) and date**

Variety	Company	BYDV <sup>1,2</sup>		Leaf Spot		Leaf rust ( <i>Puccinia</i> sp. )	
			SE <sup>3</sup>		SE	Apr. 12	SE
Gulf	CHECK	2	0.04 b <sup>4,5</sup>	0	0.0 <b>b</b>	1	0.02 b
Lonestar	GO Seeds	2	0.04 b	10	0.1 a	2	0.04 b
More	GO Seeds	6	0.11 ab	0	0.0 <b>b</b>	10	0.16 ab
Tetrastar	GO Seeds	2	0.04 b	0	0.0 <b>b</b>	1	0.02 b
RANAHAN	Mountain View	2	0.04 b	0	0.0 <b>b</b>	1	0.02 b
Earlyploid	Ragan and Massey	0	0.00 <b>c</b>	0	0.0 <b>b</b>	7	0.11 ab
Prine	Ragan and Massey	2	0.04 b	0	0.0 <b>b</b>	5	0.09 ab
Ed	Smith Seeds	2	0.04 b	0	0.0 <b>b</b>	5	0.09 ab
FrostProof	Smith Seeds	5	0.08 ab	0	0.0 <b>b</b>	1	0.02 b
SELWD19-12	Smith Seeds	8	0.13 ab	0	0.0 <b>b</b>	7	0.11 ab
SELWDMACK	Smith Seeds	2	0.04 b	0	0.0 <b>b</b>	5	0.09 ab
Verdure	Smith Seeds	0	0.00 <b>c</b>	0	0.0 <b>b</b>	2	0.04 b
FL4XLATE	UF	0	0.00 <b>c</b>	3	0.0 a	1	0.02 b
FLPR2XGRB	UF	0	0.00 <b>c</b>	10	0.1 a	0	0.00 <b>c</b>
FLSME	UF	0	0.00 <b>c</b>	0	0.0 <b>b</b>	7	0.11 ab
Jackson	Wax	2	0.04 b	0	0.0 <b>b</b>	4	0.06 b
ME-4	Wax	3	0.06 ab	0	0.0 <b>b</b>	25	0.32 a
ME-94	Wax	3	0.06 ab	0	0.0 <b>b</b>	9	0.14 ab
Nelson	Wax	3	0.06 ab	0	0.0 <b>b</b>	5	0.09 ab
WAX Marshal	Wax	0	0.00 <b>c</b>	0	0.0 <b>b</b>	10	0.16 ab
WMWL	Wax	12	0.18 a	0	0.0 <b>b</b>	7	0.11 ab
WMWL-2	Wax	10	0.16 a	0	0.0 <b>b</b>	7	0.11 ab
	Mean		3.10		1.07		5.55

<sup>1</sup> BYDV (Barley Yellow Dwarf Virus) and Leaf spot (non specified) were measured just on 3/12/2024

<sup>2</sup> Disease scores evaluated on scale from 0 - 9, and reported as percentage.

<sup>3</sup> Analysis was performed using a beta distribution, resulting in different standard errors for each variety mean

<sup>4</sup> Letters in bold meaning top performing (least disease) within the variable (statistically differ at P = 0.05 from the overall mean)

<sup>5</sup> Different letters represent statistical differences within each disease variable (statistically differ at P = 0.05 from the overall mean)

#### Disclosure

This variety test is conducted independently by UF/IFAS faculty and is open for all seed companies to enter varieties for the test.

#### Management information

Trial was conducted at the Plant Science Research and Education Unit, in Citra, FL

Planting date: 12/1/2023

Planting rate: oat, rye, triticae 90 lb/ac; ryegrass 30 lb/ac

Fertilizer Application: N-P-K rates of 30-10-30 (1 week after planting), 50-0-25 (3 weeks after planting).

Harvest: No harvests were made

#### Contact

For more information, contact [forages@ifas.ufl.edu](mailto:forages@ifas.ufl.edu)



Results from the 2023-2024 Milk Check off project

Marcelo Wallau, Cheryl Mackowiak, Diwakar Vyas and Maria Elena Mailhos

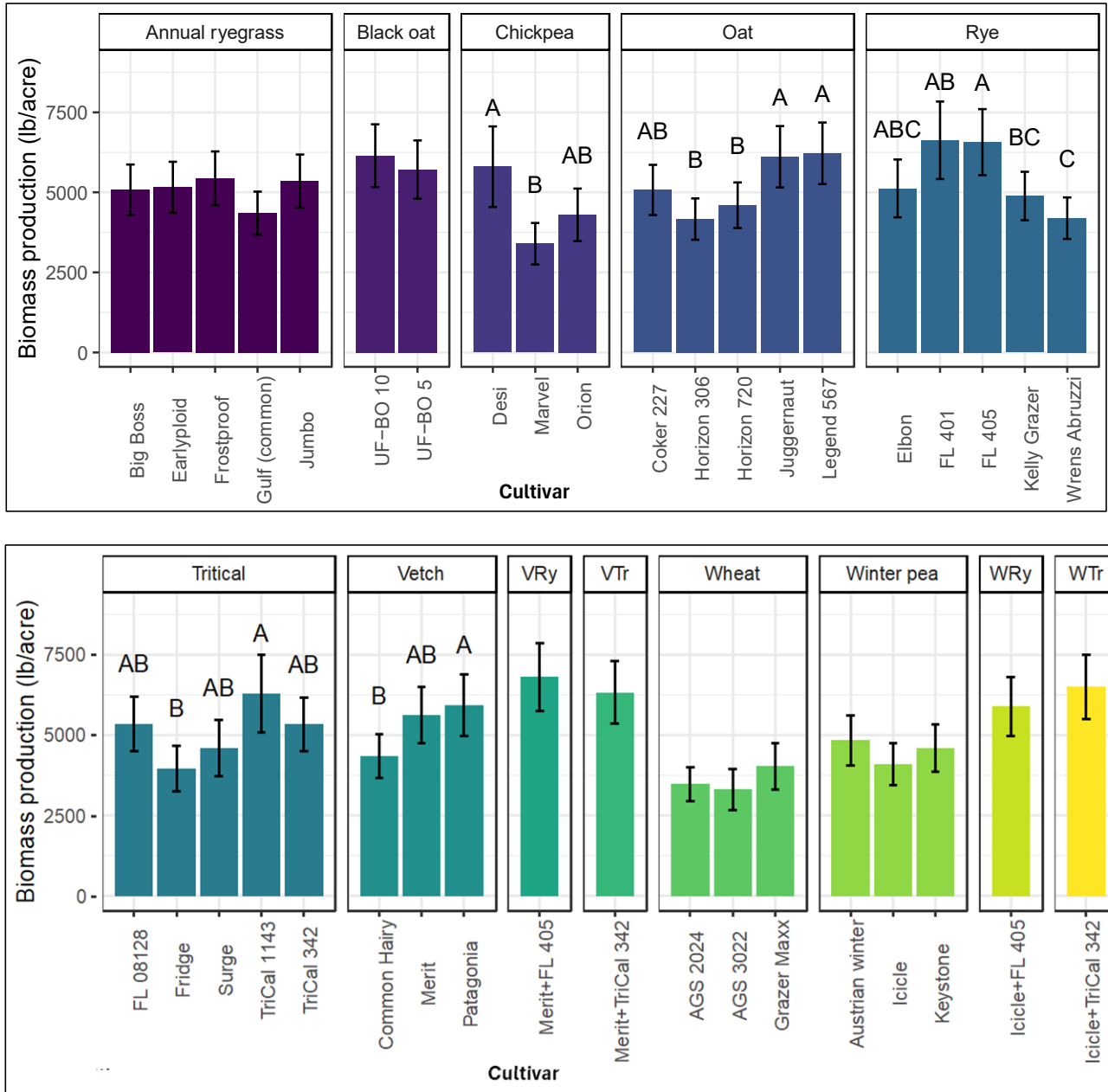


Figure 1. Two year Biomass production (lb DM/ac) for cultivars and mixes.

Different letters within species meaning statistical differences ( $P = 0.05$ )