

## Hidalgo Co. Oilseed & Confectionary Sunflower Hybrid Trial, 2015

Conducted by Brad Cowan, Hidalgo Co. Extension Agent, (956) 383-1026, b-cowan@tamu.edu

Mike Hudsonpillar/HK Farms II, cooperators; Planted 2/13/2015, harvested 6/25/2015, 30" rows (non-irrigated)

Summarized by Dr. Calvin Trostle, Extension agronomist, Lubbock, (806) 723-8432, ctrostle@ag.tamu.edu



OILSEED		Hybrid Trait†	Plant Height (in.)	Plants per Acre	Test Wt. (Lbs./bu)	Lodging %	Blank Seed %	OILSEED		CONFECTIONARY		Yield (lbs./A) (10% H2O)	Lbs. oil/acre	Flat Rate Crop Value \$/A‡§	Oil Crop Value w/ %Oil \$/A‡§	Conf Crop Value w/ Seed Size \$/A‡
Company	Hybrid							%Oil Con-	%Oleic Fatty Acid	Seed % >22/64"	Seed % >20/64"					
								tent	Acid							
Mycogen	8H449CLDM	HO, CL	71	14,100	31.5	5	15	43.2	87.9			1,270	548	\$267	\$284	
Mycogen	8H570SCL	HO, CL, SS	46	17,000	25.8	1	40	41.2	87.6			328	134	\$69	\$70	
Nuseed	Cobalt II	HO, CL	73	14,000	28.5	2	2	37.9	89.1			1,403	531	\$295	\$282	
Nuseed	Hornet	HO, CL	68	11,000	28.5	4	2	42.2	84.9			1,458	616	\$306	\$320	
SunOpta	4421CL	Conoil*	76	11,300	24.3	2	2					1,044		\$	\$	
Syngenta	3845 HO	HO	65	7,500	26.5	2	7	39.9	89.3			679	270	\$143	\$142	
Syngenta	7111HO/CL/DM	HO, CL	68	13,500	31.0	7	5	35.9	89.0			1,146	411	\$241	\$221	
Terral	REV SF364	Nu, EX§	76	15,400	29.3	15	5	37.3	79.6			975	363	\$	\$	
Terral	REV SF385	HO, EX	76	17,200	33.0	26	1	39.8	89.3			1,178	468	\$247	\$246	
<b>Oilseed Average</b>			<b>69</b>	<b>13,400</b>	<b>28.7</b>	<b>7</b>	<b>9</b>	<b>39.7</b>	<b>87.1</b>			<b>1,053</b>	<b>418</b>	<b>\$221</b>	<b>\$220</b>	

P-value (2 replications)	<0.0001	0.0018	<0.0001	0.0619	<0.0001	<0.0001	<0.0001	0.0001		<0.0001	<0.0001	<0.0001	0.0011	
Fisher's Protected Least Sig. Diff.¶	5	3,200	1.6	NS	3	1.3	2.2			177	86	\$37	\$52	
Coefficient. of Variation, %CV	13.6	25.0	10.0	129	137	6.3	3.8			22.4	37.5	34.1	37.1	

CONFECTIONARY		Hybrid Trait†	Plant Height (in.)	Plants per Acre	Test Wt. (Lbs./bu)	Lodging %	Blank Seed %	OILSEED		CONFECTIONARY		Yield (lbs./A)	Lbs. oil/acre	Flat Rate Crop Value \$/A‡§	Oil Crop Value w/ %Oil \$/A‡§	Conf Crop Value w/ Seed Size \$/A‡
Company	Hybrid							%Oil Con-	%Oleic Fatty Acid	Seed % >22/64"	Seed % >20/64"					
								tent	Acid							
SunOpta	9506CL	CL	72	5,400	18.3	2	5			80.1	87.7	859		\$189		\$229
Dahlgren	9592CL	CL	74	6,400	17.0	1	13			63.4	78.3	622		\$137		\$159
Nuseed	5009		63	8,300	18.5	3	10			33.6	70.9	1,343		\$295		\$334
Nuseed	Puma		76	7,400	17.0	9	8			59.5	82.1	954		\$210		\$248
<b>Confectionary Average</b>			<b>71</b>	<b>6,900</b>	<b>17.7</b>	<b>4</b>	<b>10</b>			<b>59.1</b>	<b>79.7</b>	<b>944</b>		<b>\$208</b>		<b>\$242</b>
P-value (2 replications)	0.0123	0.1121	0.7122	0.1584	0.0004			0.0724	0.3029	0.0031		0.0032			0.0105	
Fisher's Protected Least Sig. Diff.¶	5	NS	NS	NS	3			NS	NS	167		\$37			\$60	
Coefficient. of Variation, %CV	8.0	19.5	8.1	108	55			33.1	11.1	29.6		29.7			28.1	

†Hybrid traits: CL, Clearfield herbicide tolerance; EX, ExpressSun herbicide tolerance; HO, high oleic fatty acid; Nu, NuSun/mid oleic fatty acid; SS, short stature.

‡2015 LRGV oilseed HO @ \$21/cwt. (flat rate) + sample calc. w/ 2-for-1 oil premium vs. 40.0% oil; Conf. @ \$22/cwt. (flat rate) + sample calc. w/seed size (\$28/17 cwt.).

§No TX market for NuSun mid-oleic oilseed or conoil in 2015. Elsewhere Nu is priced \$1-2/cwt. below HO.

\*\*"Conoil" sunflower used mostly in the baking industry.

¶Numbers in the same column that vary by more than the Fisher's LSD are significantly different at the 95% confidence level.

**COMMENTS:** LRGV sunflower experienced frequent heavy rainfall which appears to have contributed to incomplete seed fill in some hybrids. Consult results from an adjacent AgriLife Crop Testing Program sunflower hybrid trial. View more Texas sunflower info. at <http://varietytesting.tamu.edu> & <http://lubbock.tamu.edu>