

Table 3. Least square means for lint yield, yield components, and fiber quality traits in the 2016 RBTN trial conducted at Alexandria, LA. (Cooperator: Gerald Myers)

Cultivar	Lint Yield	Lint Percent	Lint Index	Boll Size	Seed per Boll	Seed Index	MIC	UHM	UI	STRN	ELO	SFC	QS1 ¹	QS2 ¹	QS3 ¹
	lbs/a	%	grams	grams	#	grams	mic	inch	%	g/tex	%	%	%	%	%
GA 2012050	1342	37.87	6.94	6.00	32.83	11.25	4.25	1.28	86.93	34.48	6.95	6.20	73.75	72.50	78.50
GA 2012082	1323	39.78	7.22	5.57	30.73	10.81	4.38	1.25	86.98	31.20	6.55	6.58	66.50	68.75	70.75
FM 958 CK	1289	38.80	7.29	5.94	31.13	11.20	4.60	1.21	84.20	37.21	6.99	7.68	47.37	47.98	63.15
Ark 0824-89	1275	39.00	8.19	6.21	29.51	12.70	5.13	1.25	87.35	35.55	6.63	6.25	52.75	68.25	57.50
Ark 0812-87ne	1245	39.71	7.37	5.78	31.19	11.10	4.30	1.28	87.00	30.88	7.10	6.68	73.50	72.00	77.25
MS 0152-3-11	1227	40.68	6.98	4.84	28.06	10.10	4.60	1.26	86.28	30.35	6.13	6.85	63.75	62.75	70.00
MD 16-1	1216	42.31	7.71	6.00	32.88	10.38	4.60	1.18	85.55	34.80	5.33	6.90	43.25	51.00	54.50
MS 0043-28-1	1203	38.45	6.83	5.42	30.52	10.80	4.48	1.20	85.05	31.73	6.10	7.20	49.25	50.50	59.75
MD 16-2	1175	38.59	7.62	6.59	33.36	11.96	4.08	1.28	86.58	36.73	6.00	6.68	75.25	73.25	82.25
AU82074	1156	36.80	6.77	5.68	30.87	11.47	4.23	1.26	86.10	32.53	5.80	7.03	65.25	62.50	72.25
GA 2012141	1155	40.40	7.19	5.52	31.05	10.51	4.53	1.24	86.15	30.85	6.25	7.00	59.50	60.25	67.00
AU77082	1154	38.18	6.93	5.88	32.43	11.14	4.38	1.27	86.90	31.10	6.10	6.65	70.00	69.50	73.75
GA 2011113	1116	40.46	6.66	5.26	31.94	9.68	4.73	1.23	86.00	33.65	6.13	6.48	50.50	56.25	59.00
Ark 0822-48	1105	37.96	7.42	6.00	30.86	11.98	4.63	1.29	87.15	32.53	7.50	6.60	75.75	73.50	77.75
DP 393 CK	1098	38.37	6.55	5.30	30.63	10.15	4.29	1.19	83.17	33.67	8.89	7.55	46.37	45.98	60.15
UA 222 CK	1075	39.36	7.59	5.60	29.03	11.61	4.58	1.24	85.40	31.90	6.93	7.23	57.25	54.25	67.00
DP 493 CK	1068	41.83	6.28	4.81	32.07	8.63	4.75	1.17	85.45	30.95	4.98	7.53	32.75	44.75	44.00
NM 13G2019	1020	38.70	6.64	5.20	30.29	10.43	4.30	1.28	85.88	34.45	6.23	6.93	70.50	63.50	78.00
SG 105 CK	1014	38.22	7.17	5.18	28.93	10.83	4.72	1.21	85.61	35.84	8.21	6.76	47.87	54.48	60.15
NM 13G1029	1003	37.58	6.31	5.08	30.29	10.37	3.80	1.24	85.38	32.38	6.03	7.40	52.25	52.00	61.75
TAM11L-24	1000	33.80	6.27	5.31	28.62	12.17	3.75	1.38	89.03	35.45	5.20	6.10	93.25	92.25	92.00
TAM13Q-18	998	36.24	6.88	5.32	27.97	12.01	4.38	1.23	86.45	33.93	6.23	6.98	59.00	63.00	66.00
PD07040	943	35.86	6.59	5.86	31.85	11.67	4.28	1.27	86.53	31.20	6.08	6.45	71.00	67.50	76.00
PD08028	923	35.80	6.62	6.18	33.42	11.73	4.38	1.28	87.25	33.73	6.10	6.28	75.50	74.75	78.75
Ark 0819-89	856	36.40	6.69	5.28	28.71	11.56	4.88	1.26	87.05	35.58	6.73	6.45	60.00	69.00	65.50
PD09084	821	34.54	6.20	5.48	30.60	11.61	4.43	1.29	87.20	35.73	6.43	6.25	77.25	77.25	81.75
Ark 0818-23	818	37.85	6.62	5.54	31.73	10.78	3.88	1.28	86.98	33.30	6.28	6.73	71.00	69.75	74.75
PD09046	482	33.81	5.75	5.35	31.48	11.07	4.53	1.29	85.25	33.03	5.13	7.10	68.50	58.00	76.50
Mean	1075	38.12	6.90	5.58	30.82	11.06	4.42	1.25	86.24	33.38	6.39	6.80	62.46	63.41	69.49
Cultivar LSD (.05)	157	1.32	0.49	0.48	2.43	0.65	0.29	0.04	1.57	2.17	0.78	0.82	13.45	13.79	10.45
Cultivar (P>F)	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	0.0056	<0.0001	<0.0001	<0.0001
CV(%)	10.41	2.47	4.74	6.07	5.32	3.94	4.34	1.95	1.24	4.10	8.34	7.96	14.33	14.49	10.08
R-Square	0.74	0.88	0.79	0.68	0.57	0.85	0.79	0.81	0.58	0.71	0.75	0.47	0.75	0.66	0.76
Reps	4	4	4	4	4	4	4	4	4	4	4	4	4	4	4

Values in bold are not significantly different from highest value according to LSD(0.05).

¹ QS1, QS2, and QS3 - Qscore, very similar to a selection index, adds the weighted values of selected fiber traits (length, mic, UI, strength) to provide a single measure (0-100) of desirable fiber qualities, and was calculated by weighting selected fiber traits as follows: QS1 - fiber length (0.5), mic (0.25), UI (0.15), and strength (0.10) ; QS2 - fiber length (0.2), mic (0.1), UI (0.4), and strength (0.3); QS3 - fiber length (0.45), mic (0.25), UI (0.0), and strength (0.3).