

Table 12. Least square means for lint yield, yield components, and fiber quality traits in the 2016 RBTN trial conducted at Prattville, AL. (Cooperator: Jenny Koebernick)

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 2011113	1293	44.20	7.24	4.72	28.82	9.04	5.26	1.09	83.45	31.85	5.95	7.55	40.75	50.75	50.75
MS 0152-3-11	1292	43.91	7.45	5.23	30.81	9.43	5.13	1.14	83.50	29.03	5.90	7.85	56.00	54.50	62.25
UA 222 CK	1272	43.84	7.71	5.03	28.66	9.79	5.23	1.12	84.15	29.28	7.17	7.48	53.00	59.50	58.75
DP 393 CK	1268	42.48	7.30	4.84	28.21	9.78	5.21	1.09	84.15	30.50	7.18	7.20	43.00	55.25	50.00
Ark 0812-87ne	1262	43.78	8.50	6.23	32.05	10.62	5.39	1.14	84.80	29.53	6.58	7.38	56.50	63.75	58.75
AU82074	1246	40.86	6.83	5.27	31.62	9.82	4.76	1.13	83.58	29.13	5.78	7.53	61.00	58.75	68.50
TAM13Q-18	1235	40.97	6.94	5.03	29.68	9.91	4.91	1.11	83.03	30.60	5.88	7.90	50.25	50.50	60.25
GA 2012050	1201	42.50	7.69	5.56	30.88	10.33	5.03	1.14	84.88	32.55	6.40	7.05	62.00	68.00	65.25
PD09046	1189	36.41	5.64	5.32	34.37	9.78	4.58	1.21	84.55	33.95	5.00	7.28	87.50	76.50	90.25
MD 16-1	1175	44.87	8.05	5.74	31.98	9.82	5.19	1.05	83.53	29.08	6.00	7.55	33.50	47.50	43.50
AU77082	1162	43.22	7.45	5.21	30.20	9.69	5.37	1.11	83.83	30.43	5.58	7.58	46.00	54.75	53.25
Ark 0818-23	1159	43.23	7.91	5.60	30.58	10.31	5.20	1.14	84.23	30.95	6.23	7.30	58.00	61.75	63.50
SG 105 CK	1147	41.54	7.05	4.94	29.13	9.86	5.22	1.11	84.03	29.55	6.23	7.35	48.00	56.25	54.75
Ark 0822-48	1146	42.92	8.08	5.66	30.03	10.67	5.56	1.17	84.66	31.47	6.91	7.55	63.13	66.90	66.06
PD07040	1144	39.78	6.74	5.08	29.98	10.11	4.94	1.16	83.98	31.63	5.48	7.50	68.50	64.25	74.00
MS 0043-28-1	1140	43.36	7.71	5.09	28.69	9.95	5.28	1.08	83.48	29.98	6.00	7.50	38.25	49.00	47.75
Ark 0824-89	1139	42.62	8.42	5.84	29.58	11.24	5.48	1.18	85.53	33.55	6.13	7.03	69.75	76.00	71.50
FM 958 CK	1087	41.83	7.40	5.29	29.98	10.17	4.84	1.11	83.45	30.10	5.38	7.83	54.25	55.00	62.75
PD08028	1086	39.06	6.26	5.93	37.04	9.71	4.91	1.12	83.90	32.45	6.38	7.10	55.50	58.50	62.75
GA 2012082	1085	43.55	7.64	5.14	29.30	9.81	5.10	1.13	84.38	30.35	6.30	7.05	58.50	63.00	63.75
DP 493 CK	1029	44.49	6.69	4.68	31.20	8.26	5.39	1.04	81.88	28.35	5.38	8.73	19.50	25.75	30.75
TAM11L-24	981	38.22	7.15	5.74	30.70	11.46	4.72	1.27	86.18	34.53	5.18	6.73	95.00	91.25	94.00
NM 13G2019	975	41.11	6.73	4.98	30.45	9.60	4.91	1.15	84.13	31.83	6.48	7.28	64.75	64.00	70.00
NM 13G1029	960	41.40	6.72	4.72	29.17	9.44	4.62	1.13	83.03	30.88	5.98	7.60	60.50	54.75	69.75
Ark 0819-89	952	41.12	7.11	4.69	27.06	10.30	5.33	1.14	84.58	32.30	6.83	7.20	55.75	63.75	60.50
GA 2012141	941	43.84	7.56	5.01	29.18	9.61	5.25	1.15	84.68	31.13	6.18	7.60	61.25	66.50	65.00
PD09084	923	38.09	6.52	4.85	28.43	10.57	5.07	1.13	84.83	32.25	6.08	7.03	59.50	65.75	63.50
MD 16-2	806	40.92	7.43	5.27	29.05	10.65	4.48	1.17	84.25	34.20	6.08	7.18	75.25	70.50	80.75
Mean	1118	41.93	7.28	5.24	30.24	9.99	5.08	1.13	84.09	31.12	6.09	7.42	56.96	60.45	62.95
Cultivar LSD (.05)	224	1.49	0.51	0.62	3.86	0.65	0.23	0.03	1.29	1.63	0.46	0.57	11.93	12.53	10.40
Cultivar (P>F)	0.0006	<0.0001	<0.0001	<0.0001	0.0077	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001	<0.0001
CV(%)	14.00	2.50	4.93	8.31	8.95	4.60	3.28	2.08	1.06	3.70	5.33	5.46	14.81	14.66	11.68
R-Square	0.55	0.85	0.81	0.54	0.42	0.72	0.79	0.84	0.55	0.74	0.79	0.54	0.82	0.70	0.81
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).