

Table 2 Range, Heterosis and most heterotic crosses for 14 characters in chilli

Characters	<i>Per se</i> performance		Range			Better parent (Based on <i>Per se</i> performance)
	Parents	Crosses	Heterosis			
			MP	BP	SC	
Days to 50 % flowering	40.5 to 46.5	38.5 to 46.5	-12.99 to 5.45	-11.24 to 11.11	-13.48 to 4.49	KDC-1 (40.5) & Kunkur -3
Plant height (cm)	39.8 to 66.0	47.0 to 66.2	-20.29 to 18.11	-24.70 to 15.94	-10.98 to 25.38	Kunkur-3 (66.0), G-3 (63.8) AR-75 (61.3)
No. of primary branches	2.10 to 3.30	2.5 to 4.4	-16.13 to 95.56	-21.87 to 91.3	-24.24 to 33.33	Byadagi dabbi (3.3) & KDC-1 (3.2)
No. of secondary branches	8.7 to 12.6	8.0 to 12.45	-25.58 to 29.67	-36.51 to 21.72	-25.74 to 23.27	KDC-1 (12.6) & Puri red (12.1)
No. of fruits per/plant	48.28 to 95.19	44.75 to 100.1	-29.81 to 55.77	-43.62 to 49.5	-18.12 to 83.29	AR-75 (95.1) & Puri red (79.25)
Fruit length (cm)	4.94 to 11.81	7.03 to 12.66	-25.15 to 56.60	-34.04 to 42.16	-25.29 to 34.54	Byadagi kaddi (11.81) & Kunkur-3 (11.43)
Fruit diameter (cm)	1.07 to 2.67	1.42 to 2.2	-17.57 to 67.47	-32.34 to 66.80	-31.22 to 8.29	S-32 (2.67) & Byadagi dabbi (2.05)
Stalk length (cm)	2.90 to 4.68	2.74 to 4.62	-23.87 to 46.45	-22.81 to 65.53	-21.49 to 37.54	Lokur local (2.9) & GPC-82 (8.99)
Stalk weight (g)	0.05 to 0.27	0.04 to 0.16	-77.5 to 76.2	-66.67 to 100	-55.56 to 77.78	Pant C-1 (0.05), Lokur local (0.06) & 124 (0.07)
Fruit weight (g)	0.5 to 1.87	1.35 to 1.98	-33.46 to 193.9	-35.46 to 86.79	-44.72 to 21.70	S-32 (1.87), Byadagi dabbi (1.63) & Kunkur-3 (1.41)
Pericarp weight (g)	0.21 to 0.98	0.62 to 1.05	-9.04 to 156.58	-26.28 to 104.7	-31.33 to 26.51	S-32 (0.98), Byadagi dabbi (0.83) & Kunkur-3 (0.78)
No. of seeds/fruit	48.33 to 87.33	43.38 to 88.83	-44.32 to 48.95	-38.40 to 80.43	-39.79 to 23.29	VN-2 (48.33) & AR-75 (50.7)
Seed weight (g)	0.21 to 2.63	0.22 to 0.63	-51.89 to 135.1	-44.44 to 266.6	-51.11 to 71.1	VN-2 (0.21) & Punjab lal (0.22)
Dry Fruit yield per plant (g)	31.45 to 63.85	38.55 to 78.05	-8.44 to 71.04	-24.67 to 70.24	-26.36 to 49.09	Ar-75 (63.8), G-3 (61.35) & Byadagi dabbi (52.35)

Continuing Table 2

Characters	No. of hybrids having significant heterotic effect (based on SH)		Best hybrids based on		
	+ ve	- ve	MP	BP	SC
Days to 50% flowering	1	39	Puri red × Lokur local (-12.99)	124 × Byadagi kaddi (-11.24)	Puri red × Lokur local & Puri red × KDC-1 (-13.48)
Plant height (cm)	42	13	124 × KDC-1 (18.19)	124 × KDC-1 (15.94)	GPC-82 × Singanahalli local (25.38)
No. of primary branches	3	6	GPC-82 × Singanahalli local (95.56)	GPC-82 × Singanahalli local (91.30)	GPC-82 × Singanahalli local (33.33)
No. of secondary branches	34	2	Plunjab lal × Byadagi dabbi (29.47)	Plunjab lal × Byadagi dabbi (21.78)	124 × KDC-1 (23.27)
No. of fruits per/plant	56	4	Plunjab lal × Byadagi (55.77)	Plunjab lal × KDC-1 (49.50)	Plunjab lal × KDC-1 (83.29)
Fruit length (cm)	13	9	Plunjab lal × VN-2 (56.60)	G-3 × Lokur local (42.16)	Co-1 × KDC-1 (35.54)
Fruit diameter (cm)	0	29	Pant C-1 × VN-2 (67.47)	Pant C-1 × VN-2 (66.80)	G-3 × VN-2 (8.29)
Stalk length (cm)	26	5	Punjab lal × VN-2 (-23.87)	Kunkur-3 × VN-2 (-22.81)	Punjab lal × VN-2 (-21.49)
Stalk weight (cm)	3	0	Punjab lal × Byadagi kaddi (-77.55)	Punjab lal × Byadagi kaddi (-66.67)	Pant C-1 × Byadagi kaddi (-55.56)
Fruit weight (g)	9	19	Punjab lal × VN-2 (193.90)	Punjab lal × Lokur local (186.79)	Co-1 × Byadagi dabbi (21.70)
Pericarp weight (g)	29	38	G-3 × Lokur local (156.58)	Punjab lal × Lokur local (104.76)	G-3 × VN-2 (26.51)
No. of seeds/fruit	5	34	S-32 × Byadagi dabbi (-44.32)	S-32 × Byadagi dabbi (-38.40)	S-32 × Lokur local (-39.79)
Seed weight (g)	15	50	S-32 × Byadagi dabbi (-51.89)	S-32 × Byadagi dabbi (-44.44)	Co-1 × Singanahalli local (-51.11)
Dry fruit yield per plant (g)	30	24	G-4 × Vn-2 (71.04)	G-4 × VN-2 (70.24)	Co-1 × Byadagi dabbi (49.09)