

Supplementary Table 10. Details of QTLs identified for grain weight and grain size traits utilizing Sonasal × Pusa Basmati 1121 RILs

Trait	QTL	Chr	Start-End position (cM)	Genetic Interval (cM)	Start-End position (bp)	Physical Interval (bp)	LOD	PVE	Add	Number of genes	Candidate genes
Thousand Grain Weight	<i>qTGW3</i>	3	68.24-70.14	1.9	16056008-16760451	704443	13.2	35.7	2.79	94	<i>Grain Size 3</i>
Grain Length	<i>qGL3</i>	3	68.24-70.14	1.9	16056008-16760451	704443	18.9	42.0	1.04	94	<i>Grain Size 3</i>
Grain Length	<i>qGL7</i>	7	61.68-67.38	5.7	24381212-25779322	1398110	3.3	9.7	0.49	218	Slender LG7
Grain Width	<i>qGW7</i>	7	49.61-61.68	6.8	19854664-24381212	4526548	4.9	13.3	-0.08	708	<i>OsBZR1</i> ; <i>OsGRS9</i>
Grain Length to Width Ratio	<i>qLWR3</i>	3	67.87-67.11	0.76	17120362-17948581	828219	15.5	33.4	0.47	129	NA
Grain Length to Width Ratio	<i>qLWR7</i>	7	62.04-62.39	0.35	24405861-24591612	185751	5.4	9.8	0.26	31	NA