

Table S1_1: Results for seedlings ≤ 30 cm, ordered by the mean value of their ranking in each of the six metrics (e.g., the mean ranking for the 0.75 cm leaf-off DTM_{ALS} is $(1+5+1+6+11+3)/6 = 4.5$); NB. Best value for each metric appears in bold. N is the number of seedlings included in each result, \bar{h} is the mean observed height of those seedlings in metres . MEDAE is the median absolute error. %SD is the mean stochastic dominance of the result, that is, the mean value of the pairwise (this result against each of the others) proportion of seedlings where the result outperforms the other results in terms of absolute error.

Rank	GSD (cm)	Phenology	Ground method	N	\bar{h} (m)	RMSE (m)	BIAS (m)	MAE (m)	MEDAE (m)	R ²	$\overline{\%SD}$	%om	%com
4.5	0.75	leaf-off	DTM _{ALS}	54	0.23	0.15	0.06	0.11	0.1	0	62.8	11	0
5.17	0.35	leaf-off	DIPC _{TIN}	21	0.21	0.28	0	0.16	0.09	0	51.3	57	0
5.67	3	leaf-on	DIPC _{MIN}	54	0.23	0.31	0.04	0.17	0.09	0	61.5	30	0
6	0.75	leaf-off	DIPC _{MIN}	54	0.23	0.23	0.02	0.16	0.11	0	55.7	43	0
6.33	3	leaf-on	DTM _{ALS}	54	0.23	0.32	0.07	0.15	0.07	0	69.4	17	0
7.83	0.35	leaf-on	DTM _{ALS}	21	0.22	0.41	0.05	0.2	0.12	0.07	43.9	48	0
8	0.75	leaf-on	DIPC _{MIN}	53	0.23	0.54	0.11	0.21	0.06	0	68.3	21	0
8.17	0.35	leaf-on	DIPC _{TIN}	21	0.22	0.44	0.14	0.19	0.1	0	52.5	10	0
8.17	0.35	leaf-off	DIPC _{MIN}	21	0.21	0.53	0.2	0.23	0.06	0.03	61.2	14	0
8.67	0.35	leaf-off	DTM _{ALS}	21	0.21	0.28	-0.09	0.19	0.16	0	33.6	71	0
8.67	0.75	leaf-off	DIPC _{TIN}	54	0.23	0.2	-0.17	0.19	0.19	0.01	31.6	93	0
9	0.75	leaf-on	DIPC _{TIN}	53	0.23	0.31	-0.07	0.19	0.13	0	47.2	79	0
10	3	leaf-on	DIPC _{TIN}	54	0.23	0.29	-0.09	0.2	0.17	0	38.7	83	0
11.33	0.75	leaf-on	DTM _{ALS}	53	0.23	0.33	-0.03	0.28	0.25	0	19.1	66	0
12.5	0.35	leaf-on	DIPC _{MIN}	21	0.22	0.53	0.31	0.31	0.2	0.01	25.1	0	0