

Supplementary Material

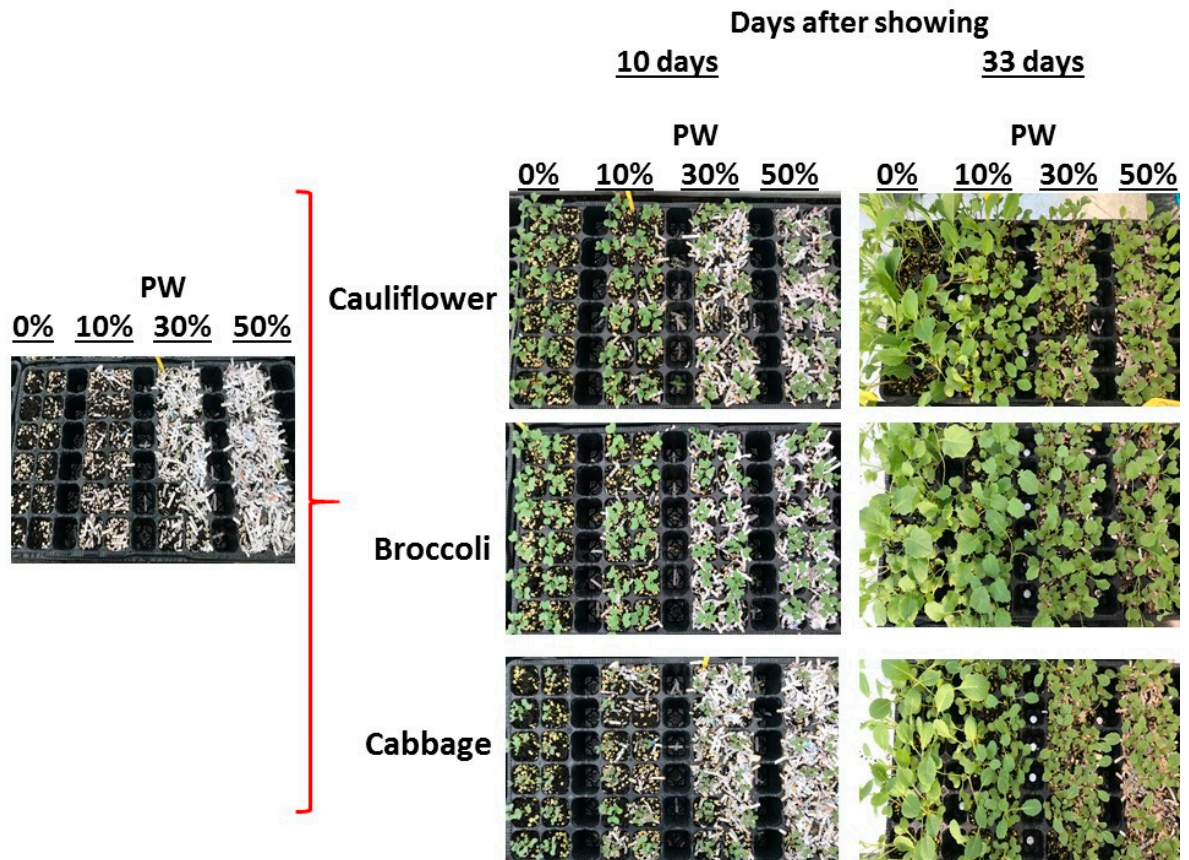


Figure S1. Effect of substrate media (peat-P, paper waste-PW) on plant growth of cauliflower, broccoli and cabbage.

Table S1. Intercorrelations of Media Properties.

Parameter.		PW	Total porosity	Air filled porosity	Bulk density	Container capacity	EC	pH	Organic Matter	Organic C	C/N	N	K	P	Ca	Mg	Na	Fe	Cu	Zn	Mn
PW	r	1.000	-0.972**	-0.972**	0.777**	-0.842**	0.885**	0.950**	-0.928**	-0.928**	0.864**	-0.972**	0.518	-0.151	0.972**	0.389	0.907**	0.907**	0.691*	-0.238	-0.391
	p		0.000	0.000	0.003	0.001	0.000	0.000	0.000	0.000	0.000	0.000	0.084	0.639	0.000	0.212	0.000	0.000	0.013	0.457	0.208
Total porosity	r		1.000	10.000**	-0.699*	0.902**	-0.853**	-0.874**	0.923**	0.923**	-0.804**	0.965**	-0.399	0.119	-0.930**	-0.378	-0.881**	-0.923**	-0.657*	0.259	0.359
	p				0.011	0.000	0.000	0.000	0.000	0.000	0.002	0.000	0.199	0.713	0.000	0.226	0.000	0.000	0.020	0.417	0.252
Air filled porosity	r			1.000	-0.699*	0.902**	-0.853**	-0.874**	0.923**	0.923**	-0.804**	0.965**	-0.399	0.119	-0.930**	-0.378	-0.881**	-0.923**	-0.657*	0.259	0.359
	p				0.011	0.000	0.000	0.000	0.000	0.000	0.002	0.000	0.199	0.713	0.000	0.226	0.000	0.000	0.020	0.417	0.252
Bulk density	r				1.000	-0.545	0.594*	0.825**	-0.650*	-0.650*	0.601*	-0.734**	0.671*	0.224	0.769**	-0.189	0.629*	0.776**	0.392	0.343	-0.401
	p					0.067	0.042	0.001	0.022	0.022	0.039	0.007	0.017	0.484	0.003	0.557	0.028	0.003	0.208	0.276	0.196
Container capacity	r					1.000	-0.678*	-0.720**	0.755**	0.755**	-0.657*	0.853**	-0.196	0.035	-0.804**	-0.238	-0.692*	-0.811**	-0.538	0.392	0.261
	p						0.015	0.008	0.005	0.005	0.020	0.000	0.542	0.914	0.002	0.457	0.013	0.001	0.071	0.208	0.413
Ec	r						1.000	0.853**	-0.797**	-0.797**	0.923**	-0.881**	0.503	-0.119	0.916**	0.517	0.769**	0.734**	0.573	-0.259	-0.317
	p							0.000	0.002	0.002	0.000	0.000	0.095	0.713	0.000	0.085	0.003	0.007	0.051	0.417	0.316
pH	r							1.000	-0.860**	-0.860**	0.853**	-0.916**	0.671*	-0.084	0.965**	0.287	0.811**	0.776**	0.601*	-0.140	-0.423
	p								0.000	0.000	0.000	0.000	0.017	0.795	0.000	0.366	0.001	0.003	0.039	0.665	0.171
Organic matter	r								1.000	10.000**	-0.720**	0.909**	-0.538	0.350	-0.867**	-0.524	-0.972**	-0.825**	-0.860**	0.210	0.246
	p										0.008	0.000	0.071	0.265	0.000	0.080	0.001	0.000	0.513	0.440	
Organic C	r									1.000	-0.720**	0.909**	-0.538	0.350	-0.867**	-0.524	-0.972**	-0.825**	-0.860**	0.210	0.246
	p										0.008	0.000	0.071	0.265	0.000	0.080	0.001	0.000	0.513	0.440	
C/N	r										1.000	-0.881**	0.531	-0.252	0.860**	0.462	0.713**	0.706*	0.483	-0.294	-0.204
	p											0.000	0.075	0.430	0.000	0.131	0.009	0.010	0.112	0.354	0.524
N	r											1.000	-0.545	0.182	-0.930**	-0.364	-0.860**	-0.874**	-0.643*	0.210	0.232
	p												0.067	0.572	0.000	0.245	0.000	0.000	0.024	0.513	0.467
K	r												1.000	-0.140	0.545	0.035	0.483	0.280	0.476	0.406	-0.014
	p													0.665	0.067	0.914	0.112	0.379	0.118	0.191	0.965
P	r													1.000	-0.007	-0.727**	-0.427	-0.042	-0.587*	0.413	-0.486
	p														0.983	0.007	0.167	0.897	0.045	0.183	0.109
Ca	r														1.000	0.350	0.825**	0.825**	0.608*	-0.231	-0.507
	p															0.265	0.001	0.001	0.036	0.471	0.092
Mg	r															1.000	0.587*	0.217	0.650*	-0.692*	-0.014
	p																0.045	0.499	0.022	0.013	0.965
Na	r																1.000	0.839**	0.895**	-0.238	-0.261
	p																	0.001	0.000	0.457	0.413
Fe	r																	1.000	0.573	-0.112	-0.345
	p																		0.051	0.729	0.272
Cu	r																		1.000	-0.238	-0.035
	p																			0.457	0.913
Zn	r																			1.000	0.148
	p																				0.646
Mn	r																				1.000
	p																				

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S2. The Correlations between the Growing Media Properties and Plant Growth and Physiology—Cauliflower.

Parameter		Leaf number	Height	Fv/Fm	Fresh biomass	Dry weight	Dry matter	SPAD	Stomatal conductance	Chl-a	Chl-b	Tot Chl
PW	r	-0.876**	-0.802**	-0.842**	-0.842**	-0.842**	-0.302	-0.777**	-0.411	0.453	0.453	0.453
	p	0.000	0.002	0.001	0.001	0.001	0.340	0.003	0.184	0.139	0.139	0.139
Total porosity	r	0.873**	0.818**	0.874**	0.902**	0.881**	0.322	0.727**	0.375	-0.455	-0.476	-0.476
	p	0.000	0.001	0.000	0.000	0.000	0.308	0.007	0.230	0.138	0.118	0.118
Air filled porosity	r	0.873**	0.818**	0.874**	0.902**	0.881**	0.322	0.727**	0.375	-0.455	-0.476	-0.476
	p	0.000	0.001	0.000	0.000	0.000	0.308	0.007	0.230	0.138	0.118	0.118
Bulk density	r	-0.633*	-0.804**	-0.490	-0.587*	-0.734**	-0.371	-0.804**	-0.035	0.070	0.049	0.049
	p	0.027	0.002	0.106	0.045	0.007	0.236	0.002	0.914	0.829	0.880	0.880
Container capacity	r	0.764**	0.744**	0.804**	0.839**	0.832**	0.490	0.601*	0.438	-0.671*	-0.692*	-0.692*
	p	0.004	0.006	0.002	0.001	0.001	0.106	0.039	0.155	0.017	0.013	0.013
Ec	r	-0.830**	-0.611*	-0.839**	-0.755**	-0.769**	-0.147	-0.552	-0.336	0.315	0.336	0.336
	p	0.001	0.035	0.001	0.005	0.003	0.649	0.063	0.285	0.319	0.286	0.286
pH	r	-0.830**	-0.726**	-0.762**	-0.699*	-0.769**	-0.336	-0.748**	-0.350	0.357	0.322	0.322
	p	0.001	0.007	0.004	0.011	0.003	0.286	0.005	0.264	0.255	0.308	0.308
Organic matter	r	0.873**	0.811**	0.832**	0.804**	0.776**	0.280	0.615*	0.508	-0.406	-0.427	-0.427
	p	0.000	0.001	0.001	0.002	0.003	0.379	0.033	0.092	0.191	0.167	0.167
Organic C	r	0.873**	0.811**	0.832**	0.804**	0.776**	0.280	0.615*	0.508	-0.406	-0.427	-0.427
	p	0.000	0.001	0.001	0.002	0.003	0.379	0.033	0.092	0.191	0.167	0.167
C/N	r	-0.786**	-0.554	-0.797**	-0.594*	-0.643*	-0.042	-0.622*	-0.256	0.266	0.266	0.266
	p	0.002	0.061	0.002	0.042	0.024	0.897	0.031	0.422	0.404	0.404	0.404
N	r	0.939**	0.796**	0.881**	0.776**	0.818**	0.287	0.692*	0.417	-0.364	-0.385	-0.385
	p	0.000	0.002	0.000	0.003	0.001	0.366	0.013	0.178	0.245	0.217	0.217
K	r	-0.633*	-0.537	-0.455	-0.147	-0.378	-0.063	-0.378	-0.116	-0.203	-0.238	-0.238
	p	0.027	0.072	0.138	0.649	0.226	0.846	0.226	0.721	0.527	0.457	0.457
P	r	0.197	0.060	0.245	-0.063	-0.147	-0.266	-0.098	0.399	-0.154	-0.189	-0.189
	p	0.540	0.854	0.443	0.846	0.649	0.404	0.762	0.198	0.633	0.557	0.557
Ca	r	-0.852**	-0.726**	-0.818**	-0.825**	-0.839**	-0.315	-0.755**	-0.382	0.455	0.434	0.434
	p	0.000	0.007	0.001	0.001	0.001	0.319	0.005	0.221	0.138	0.159	0.159
Mg	r	-0.393	-0.039	-0.490	-0.329	-0.105	0.280	-0.035	-0.581*	0.406	0.427	0.427
	p	0.206	0.905	0.106	0.297	0.746	0.379	0.914	0.047	0.191	0.167	0.167
Na	r	-0.808**	-0.772**	-0.769**	-0.783**	-0.706*	-0.161	-0.657*	-0.511	0.420	0.441	0.441
	p	0.001	0.003	0.003	0.003	0.010	0.618	0.020	0.089	0.175	0.152	0.152
Fe	r	-0.721**	-0.846**	-0.699*	-0.881**	-0.853**	-0.336	-0.790**	-0.245	0.378	0.420	0.420
	p	0.008	0.001	0.011	0.000	0.000	0.286	0.002	0.442	0.226	0.175	0.175
Cu	r	-0.677*	-0.663*	-0.650*	-0.601*	-0.531	-0.168	-0.364	-0.634*	0.476	0.503	0.503
	p	0.016	0.019	0.022	0.039	0.075	0.602	0.245	0.027	0.118	0.095	0.095
Zn	r	0.153	-0.193	0.301	0.245	0.000	-0.021	0.028	0.588*	-0.748**	-0.727**	-0.727**
	p	0.635	0.548	0.342	0.443	1.000	0.948	0.931	0.044	0.005	0.007	0.007
Mn	r	0.154	0.085	0.176	0.479	0.303	-0.014	0.613*	0.028	-0.296	-0.176	-0.176

p 0.633 0.793 0.584 0.115 0.339 0.965 0.034 0.931 0.351 0.584 0.584

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S3. The Correlations between the Growing Media Properties and Plant Growth and Physiology—Broccoli.

Parameter		Leaf number	Height	Fv/Fm	Fresh biomass	Dry weight	Dry matter	SPAD	Stomatal conductance	Chl-a	Chl- b	Tot Chl
PW	r	-0.837**	-0.802**	-0.725**	-0.756**	-0.756**	-0.302	-0.907**	-0.767**	-0.281	-0.173	-0.281
	p	0.001	0.002	0.008	0.004	0.004	0.340	0.000	0.006	0.377	0.591	0.377
Total porosity	r	0.857**	0.719**	0.690*	0.762**	0.783**	0.357	0.874**	0.635*	0.301	0.196	0.301
	p	0.000	0.008	0.013	0.004	0.003	0.255	0.000	0.036	0.342	0.542	0.342
Air filled porosity	r	0.857**	0.719**	0.690*	0.762**	0.783**	0.357	0.874**	0.635*	0.301	0.196	0.301
	p	0.000	0.008	0.013	0.004	0.003	0.255	0.000	0.036	0.342	0.542	0.342
Bulk density	r	-0.578*	-0.965**	-0.424	-0.895**	-0.874**	-0.021	-0.783**	-0.580	-0.643*	-0.580*	-0.643*
	p	0.049	0.000	0.170	0.000	0.000	0.948	0.003	0.061	0.024	0.048	0.024
Container capacity	r	0.857**	0.593*	0.648*	0.692*	0.713**	0.287	0.783**	0.612*	0.119	0.014	0.119
	p	0.000	0.042	0.023	0.013	0.009	0.366	0.003	0.045	0.713	0.966	0.713
Ec	r	-0.662*	-0.674*	-0.536	-0.601*	-0.566	-0.280	-0.685*	-0.735**	-0.140	-0.028	-0.140
	p	0.019	0.016	0.073	0.039	0.055	0.379	0.014	0.010	0.665	0.931	0.665
pH	r	-0.833**	-0.835**	-0.599*	-0.720**	-0.699*	-0.168	-0.874**	-0.826**	-0.224	-0.133	-0.224
	p	0.001	0.001	0.040	0.008	0.011	0.602	0.000	0.002	0.484	0.681	0.484
Organic matter	r	0.813**	0.632*	0.655*	0.580*	0.615*	0.322	0.762**	0.543	0.287	0.175	0.287
	p	0.001	0.028	0.021	0.048	0.033	0.308	0.004	0.084	0.366	0.587	0.366
Organic C	r	0.813**	0.632*	0.655*	0.580*	0.615*	0.322	0.762**	0.543	0.287	0.175	0.287
	p	0.001	0.028	0.021	0.048	0.033	0.308	0.004	0.084	0.366	0.587	0.366
C/N	r	-0.618*	-0.663*	-0.581*	-0.608*	-0.552	-0.217	-0.741**	-0.790**	-0.133	-0.049	-0.133
	p	0.032	0.019	0.047	0.036	0.063	0.499	0.006	0.004	0.681	0.880	0.681
N	r	0.813**	0.730**	0.666*	0.755**	0.734**	0.168	0.839**	0.690*	0.308	0.203	0.308
	p	0.001	0.007	0.018	0.005	0.007	0.602	0.001	0.019	0.331	0.527	0.331
K	r	-0.335	-0.618*	0.018	-0.448	-0.357	0.308	-0.357	-0.393	-0.357	-0.315	-0.357
	p	0.287	0.032	0.957	0.145	0.255	0.331	0.255	0.232	0.255	0.319	0.255
P	r	0.076	-0.263	0.326	-0.343	-0.308	0.217	0.000	-0.005	-0.168	-0.196	-0.168
	p	0.815	0.409	0.301	0.276	0.331	0.499	1.000	0.989	0.602	0.542	0.602
Ca	r	-0.833**	-0.825**	-0.627*	-0.741**	-0.720**	-0.259	-0.881**	-0.836**	-0.175	-0.070	-0.175
	p	0.001	0.001	0.029	0.006	0.008	0.417	0.000	0.001	0.587	0.829	0.587
Mg	r	-0.267	0.116	-0.480	0.245	0.224	-0.427	-0.189	-0.306	0.392	0.469	0.392
	p	0.401	0.720	0.114	0.443	0.484	0.167	0.557	0.360	0.208	0.124	0.208
Na	r	-0.706*	-0.628*	-0.732**	-0.538	-0.573	-0.392	-0.762**	-0.557	-0.301	-0.189	-0.301
	p	0.010	0.029	0.007	0.071	0.051	0.208	0.004	0.075	0.342	0.557	0.342
Fe	r	-0.710**	-0.779**	-0.767**	-0.832**	-0.874**	-0.406	-0.867**	-0.553	-0.524	-0.427	-0.524
	p	0.010	0.003	0.004	0.001	0.000	0.191	0.000	0.078	0.080	0.167	0.080
Cu	r	-0.554	-0.400	-0.543	-0.238	-0.280	-0.315	-0.469	-0.393	-0.133	-0.014	-0.133

Zn	p	0.062	0.198	0.068	0.457	0.379	0.319	0.124	0.232	0.681	0.966	0.681
	r	0.351	-0.235	0.567	-0.259	-0.238	0.364	0.245	0.379	-0.727**	-0.776**	-0.727**
Mn	p	0.264	0.462	0.054	0.417	0.457	0.245	0.443	0.250	0.007	0.003	0.007
	r	0.353	0.502	0.286	0.366	0.373	0.303	0.592*	0.429	-0.077	-0.092	-0.077
	p	0.260	0.096	0.368	0.242	0.232	0.339	0.043	0.188	0.811	0.777	0.811

** . Correlation is significant at the 0.01 level (2-tailed). * . Correlation is significant at the 0.05 level (2-tailed).

Table S4. The Correlations between the Growing Media Properties and Plant Growth and Physiology—Cabbage.

Parameter		Leaf number	Height	Fv/Fm	Fresh biomass	Dry weight	Dry matter	SPAD	Stomatal conductance	Chl-a	Chl-b	Tot Chl
PW	r	-0.949**	-0.606*	-0.713**	-0.907**	-0.907**	-0.561	-0.488	0.281	-0.648*	-0.648*	-0.648*
	p	0.000	0.037	0.009	0.000	0.000	0.058	0.108	0.377	0.023	0.023	0.023
Total porosity	r	0.911**	0.494	0.671*	0.874**	0.902**	0.650*	0.540	-0.189	0.594*	0.594*	0.594*
	p	0.000	0.103	0.017	0.000	0.000	0.022	0.070	0.557	0.042	0.042	0.042
Air filled porosity	r	0.911**	0.494	0.671*	0.874**	0.902**	0.650*	0.540	-0.189	0.594*	0.594*	0.594*
	p	0.000	0.103	0.017	0.000	0.000	0.022	0.070	0.557	0.042	0.042	0.042
Bulk density	r	-0.867**	-0.546	-0.441	-0.699*	-0.671*	-0.399	-0.460	0.734**	-0.350	-0.350	-0.350
	p	0.000	0.066	0.152	0.011	0.017	0.199	0.133	0.007	0.265	0.265	0.265
Container capacity	r	0.791**	0.424	0.455	0.832**	0.874**	0.629*	0.604*	0.084	0.287	0.287	0.287
	p	0.002	0.170	0.138	0.001	0.000	0.028	0.038	0.795	0.366	0.366	0.366
Ec	r	-0.805**	-0.574	-0.804**	-0.734**	-0.755**	-0.587*	-0.344	0.126	-0.664*	-0.664*	-0.664*
	p	0.002	0.051	0.002	0.007	0.005	0.045	0.274	0.697	0.018	0.018	0.018
pH	r	-0.911**	-0.687*	-0.797**	-0.853**	-0.860**	-0.531	-0.456	0.357	-0.643*	-0.643*	-0.643*
	p	0.000	0.014	0.002	0.000	0.000	0.075	0.136	0.255	0.024	0.024	0.024
Organic matter	r	0.842**	0.581*	0.741**	0.881**	0.888**	0.476	0.470	-0.210	0.713**	0.713**	0.713**
	p	0.001	0.047	0.006	0.000	0.000	0.118	0.123	0.513	0.009	0.009	0.009
Organic C	r	0.842**	0.581*	0.741**	0.881**	0.888**	0.476	0.470	-0.210	0.713**	0.713**	0.713**
	p	0.001	0.047	0.006	0.000	0.000	0.118	0.123	0.513	0.009	0.009	0.009
C/N	r	-0.809**	-0.557	-0.748**	-0.685*	-0.671*	-0.385	-0.312	0.175	-0.615*	-0.615*	-0.615*
	p	0.001	0.060	0.005	0.014	0.017	0.217	0.323	0.587	0.033	0.033	0.033
N	r	0.900**	0.630*	0.748**	0.832**	0.853**	0.524	0.540	-0.224	0.580*	0.580*	0.580*
	p	0.000	0.028	0.005	0.001	0.000	0.080	0.070	0.484	0.048	0.048	0.048
K	r	-0.556	-0.753**	-0.601*	-0.503	-0.490	-0.112	-0.411	0.469	-0.448	-0.448	-0.448
	p	0.060	0.005	0.039	0.095	0.106	0.729	0.185	0.124	0.145	0.145	0.145
P	r	0.033	0.105	0.259	0.175	0.091	-0.476	-0.123	0.245	0.385	0.385	0.385
	p	0.919	0.745	0.417	0.587	0.779	0.118	0.704	0.443	0.217	0.217	0.217
Ca	r	-0.922**	-0.648*	-0.748**	-0.888**	-0.909**	-0.671*	-0.491	0.245	-0.650*	-0.650*	-0.650*
	p	0.000	0.023	0.005	0.000	0.000	0.017	0.105	0.443	0.022	0.022	0.022
Mg	r	-0.198	-0.238	-0.503	-0.364	-0.343	-0.056	0.102	-0.385	-0.699*	-0.699*	-0.699*
	p	0.538	0.456	0.095	0.245	0.276	0.863	0.753	0.217	0.011	0.011	0.011
Na	r	-0.835**	-0.543	-0.636*	-0.874**	-0.839**	-0.357	-0.375	0.259	-0.748**	-0.748**	-0.748**

Fe	p	0.001	0.068	0.026	0.000	0.001	0.255	0.229	0.417	0.005	0.005	0.005
	r	-0.900**	-0.336	-0.455	-0.790**	-0.769**	-0.497	-0.425	0.406	-0.455	-0.455	-0.455
Cu	p	0.000	0.285	0.138	0.002	0.003	0.101	0.169	0.191	0.138	0.138	0.138
	r	-0.615*	-0.550	-0.497	-0.804**	-0.755**	-0.154	-0.319	0.028	-0.622*	-0.622*	-0.622*
Zn	p	0.033	0.064	0.101	0.002	0.005	0.633	0.312	0.931	0.031	0.031	0.031
	r	0.048	0.049	0.217	0.238	0.252	0.133	-0.091	0.664*	0.280	0.280	0.280
Mn	p	0.883	0.880	0.499	0.457	0.430	0.681	0.778	0.018	0.379	0.379	0.379
	r	0.428	0.194	0.155	0.401	0.430	0.648*	0.085	-0.303	0.486	0.486	0.486
	p	0.166	0.546	0.631	0.196	0.163	0.023	0.793	0.339	0.109	0.109	0.109

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S5. The Correlations between the Growing Media properties and Plant Minerals—Cauliflower.

Parameter		Leaf N	Leaf K	Leaf P	Leaf Mg	Leaf Ca	Leaf Na	Leaf Fe	Leaf Cu	Leaf Zn
PW	r	0.389	0.475	0.777**	0.238	0.972**	-0.907**	-0.799**	0.842**	0.130
	p	0.212	0.119	0.003	0.457	0.000	0.000	0.002	0.001	0.688
Total porosity	r	-0.392	-0.434	-0.769**	-0.196	-0.944**	0.902**	0.741**	-0.818**	-0.147
	p	0.208	0.159	0.003	0.542	0.000	0.000	0.006	0.001	0.649
Air filled porosity	r	-0.392	-0.434	-0.769**	-0.196	-0.944**	0.902**	0.741**	-0.818**	-0.147
	p	0.208	0.159	0.003	0.542	0.000	0.000	0.006	0.001	0.649
Bulk density	r	-0.014	0.154	0.552	0.497	0.755**	-0.608*	-0.455	0.881**	-0.336
	p	0.966	0.633	0.063	0.101	0.005	0.036	0.138	0.000	0.286
Container capacity	r	-0.657*	-0.629*	-0.909**	0.168	-0.818**	0.734**	0.483	-0.692*	0.063
	p	0.020	0.028	0.000	0.602	0.001	0.007	0.112	0.013	0.846
Ec	r	0.350	0.322	0.643*	0.259	0.776**	-0.741**	-0.860**	0.741**	0.455
	p	0.265	0.308	0.024	0.417	0.003	0.006	0.000	0.006	0.138
pH	r	0.322	0.413	0.720**	0.322	0.923**	-0.783**	-0.811**	0.825**	0.042
	p	0.308	0.183	0.008	0.308	0.000	0.003	0.001	0.001	0.897
Organic matter	r	-0.287	-0.476	-0.622*	-0.259	-0.923**	0.916**	0.839**	-0.748**	-0.238
	p	0.366	0.118	0.031	0.417	0.000	0.000	0.001	0.005	0.457
Organic C	r	-0.287	-0.476	-0.622*	-0.259	-0.923**	0.916**	0.839**	-0.748**	-0.238
	p	0.366	0.118	0.031	0.417	0.000	0.000	0.001	0.005	0.457
C/N	r	0.413	0.301	0.685*	0.294	0.804**	-0.741**	-0.825**	0.769**	0.350
	p	0.183	0.342	0.014	0.354	0.002	0.006	0.001	0.003	0.265
N	r	-0.406	-0.413	-0.783**	-0.266	-0.944**	0.881**	0.783**	-0.881**	-0.147
	p	0.191	0.183	0.003	0.404	0.000	0.000	0.003	0.000	0.649
K	r	-0.140	0.028	0.217	0.615*	0.503	-0.357	-0.615*	0.650*	-0.056
	p	0.665	0.931	0.499	0.033	0.095	0.255	0.033	0.022	0.863
P	r	-0.252	-0.322	-0.042	0.028	-0.231	0.378	0.441	-0.007	-0.497
	p	0.430	0.308	0.897	0.931	0.471	0.226	0.152	0.983	0.101
Ca	r	0.378	0.448	0.755**	0.224	0.916**	-0.811**	-0.804**	0.790**	0.133
	p	0.226	0.145	0.005	0.484	0.000	0.001	0.002	0.002	0.681
Mg	r	0.350	0.406	0.161	-0.105	0.378	-0.545	-0.713**	0.000	0.839**
	p	0.265	0.191	0.618	0.746	0.226	0.067	0.009	1.000	0.001
Na	r	0.259	0.490	0.573	0.252	0.909**	-0.951**	-0.825**	0.699*	0.287
	p	0.417	0.106	0.051	0.430	0.000	0.000	0.001	0.011	0.366
Fe	r	0.280	0.364	0.720**	0.224	0.881**	-0.881**	-0.552	0.839**	0.021
	p	0.379	0.245	0.008	0.484	0.000	0.000	0.063	0.001	0.948
Cu	r	0.294	0.622*	0.441	0.049	0.692*	-0.755**	-0.713**	0.476	0.301
	p	0.354	0.031	0.152	0.880	0.013	0.005	0.009	0.118	0.342
Zn	r	-0.748**	-0.615*	-0.413	0.615*	-0.259	0.322	0.301	0.210	-0.434
	p	0.005	0.033	0.183	0.033	0.417	0.308	0.342	0.513	0.159
Mn	r	0.092	-0.056	-0.141	-0.134	-0.394	0.310	0.275	-0.077	0.092
	p	0.777	0.862	0.662	0.678	0.205	0.327	0.388	0.811	0.777

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S6. The Correlations between the Growing Media properties and Plant Minerals—Broccoli.

Parameter		Leaf N	Leaf K	Leaf P	Leaf Mg	Leaf Ca	Leaf Na	Leaf Fe	Leaf Cu	Leaf Zn
PW	r	0.389	0.799**	0.928**	-0.777**	0.281	-0.777**	-0.972**	0.669**	0.000
	p	0.212	0.002	0.000	0.003	0.377	0.003	0.000	0.017	1.000
Total porosity	r	-0.378	-0.769**	-0.937**	0.755**	-0.238	0.755**	0.944**	-0.580*	0.014
	p	0.226	0.003	0.000	0.005	0.457	0.005	0.000	0.048	0.966
Air filled porosity	r	-0.378	-0.769**	-0.937**	0.755**	-0.238	0.755**	0.944**	-0.580*	0.014
	p	0.226	0.003	0.000	0.005	0.457	0.005	0.000	0.048	0.966
Bulk density	r	0.755**	0.594*	0.678*	-0.566	0.455	-0.944**	-0.755**	0.552	-0.364
	p	0.005	0.042	0.015	0.055	0.138	0.000	0.005	0.063	0.245
Container capacity	r	-0.126	-0.846**	-0.902**	0.867**	0.112	0.615**	0.832**	-0.315	0.280
	p	0.697	0.001	0.000	0.000	0.729	0.033	0.001	0.319	0.379
Ec	r	0.308	0.587*	0.853**	-0.559	0.378	-0.559	-0.888**	0.734**	0.196
	p	0.331	0.045	0.000	0.059	0.226	0.059	0.000	0.007	0.542
pH	r	0.420	0.734**	0.846**	-0.706*	0.385	-0.748**	-0.951**	0.790**	-0.028
	p	0.175	0.007	0.001	0.010	0.217	0.005	0.000	0.002	0.931
Organic matter	r	-0.343	-0.783**	-0.776**	0.734**	-0.280	0.734**	0.839**	-0.636*	-0.175
	p	0.276	0.003	0.003	0.007	0.379	0.007	0.001	0.026	0.587
Organic C	r	-0.343	-0.783**	-0.776**	0.734**	-0.280	0.734**	0.839**	-0.636*	-0.175
	p	0.276	0.003	0.003	0.007	0.379	0.007	0.001	0.026	0.587
C/N	r	0.315	0.552	0.888**	-0.545	0.406	-0.503	-0.902**	0.727**	0.133
	p	0.319	0.063	0.000	0.067	0.191	0.095	0.000	0.007	0.681
N	r	-0.420	-0.762**	-0.944**	0.741**	-0.329	0.741**	0.958**	-0.643*	0.028
	p	0.175	0.004	0.000	0.006	0.297	0.006	0.000	0.024	0.931
K	r	0.573	0.357	0.336	-0.287	0.657*	-0.580*	-0.490	0.741**	0.014
	p	0.051	0.255	0.286	0.366	0.020	0.048	0.106	0.006	0.966
P	r	0.266	-0.210	-0.070	0.182	0.028	-0.154	0.049	-0.126	-0.545
	p	0.404	0.513	0.829	0.572	0.931	0.633	0.880	0.697	0.067
Ca	r	0.350	0.748**	0.895**	-0.727**	0.301	-0.727**	-0.972**	0.741**	0.000

Mg	p	0.265	0.005	0.000	0.007	0.342	0.007	0.000	0.006	1.000
	r	-0.378	0.280	0.287	-0.245	-0.014	0.133	-0.322	0.378	0.783**
Na	p	0.226	0.379	0.366	0.443	0.966	0.681	0.308	0.226	0.003
	r	0.315	,762**	,741**	-0.713**	0.245	-0.713**	-0.797**	,587*	0.245
Fe	p	0.319	0.004	0.006	0.009	0.443	0.009	0.002	0.045	0.443
	r	0.503	0.727**	0.888**	-0.720**	0.189	-0.846**	-0.853**	0.385	-0.154
Cu	p	0.095	0.007	0.000	0.008	0.557	0.001	0.000	0.217	0.633
	r	0.070	0.755**	0.476	-0.692*	0.042	-0.524	-0.524	0.434	0.294
Zn	p	0.829	0.005	0.118	0.013	0.897	0.080	0.080	0.159	0.354
	r	0.734**	-0.315	-0.315	0.357	0.503	-0.357	0.273	-0.035	-0.343
Mn	p	0.007	0.319	0.319	0.255	0.095	0.255	0.391	0.914	0.276
	r	-0.120	-0.141	-0.275	0.141	-0.148	0.310	0.451	-0.444	-0.092
	p	0.711	0.662	0.388	0.662	0.646	0.327	0.141	0.149	0.777

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S7. The Correlations between the Growing Media properties and Plant Minerals—Cabbage.

Parameter		Leaf N	Leaf K	Leaf P	Leaf Mg	Leaf Ca	Leaf Na	Leaf Fe	Leaf Cu	Leaf Zn
PW	r	0.734**	0.777**	0.130	0.777**	0.756**	0.367	-0.734* *	0.972**	0.777**
	p	0.007	0.003	0.688	0.003	0.004	0.241	0.007	0.000	0.003
Total porosity	r	-0.741* *	-0.741* *	-0.098	-0.769**	-0.713* *	-0.350	0.706* *	-0.944* *	-0.783* *
	p	0.006	0.006	0.762	0.003	0.009	0.265	0.010	0.000	0.003
Air filled porosity	r	-0.741* *	-0.741* *	-0.098	-0.769**	-0.713* *	-0.350	0.706* *	-0.944* *	-0.783* *
	p	0.006	0.006	0.762	0.003	0.009	0.265	0.010	0.000	0.003
Bulk density	r	0.580* *	0.580* *	0.070	0.930**	0.608* *	0.741**	-0.783* *	0.755**	0.350
	p	0.048	0.048	0.829	0.000	0.036	0.006	0.003	0.005	0.265
Container capacity	r	-0.881* *	-0.853* *	-0.336	-0.643* *	-0.839* *	-0.126	0.713**	-0.818* *	-0.545
	p	0.000	0.000	0.286	0.024	0.001	0.697	0.009	0.001	0.067
Ec	r	0.510	0.629*	0.098	0.531	0.552	0.252	-0.524	0.874**	0.825**
	p	0.090	0.028	0.762	0.075	0.063	0.430	0.080	0.000	0.001
pH	r	0.615* *	0.748**	0.098	0.734**	0.783**	0.420	-0.755* *	0.923**	0.657* *
	p	0.033	0.005	0.762	0.007	0.003	0.175	0.005	0.000	0.020
Organic matter	r	-0.601* *	-0.706* *	-0.133	-0.706* *	-0.629* *	-0.287	0.622* *	-0.909* *	-0.776* *
	p	0.039	0.010	0.681	0.010	0.028	0.366	0.031	0.000	0.003
Organic C	r	-0.601* *	-0.706* *	-0.133	-0.706* *	-0.629* *	-0.287	0.622* *	-0.909* *	-0.776* *
	p	0.039	0.010	0.681	0.010	0.028	0.366	0.031	0.000	0.003
C/N	r	0.538	0.629*	0.035	0.545	0.643* *	0.154	-0.413	0.902**	0.790**
	p	0.071	0.028	0.914	0.067	0.024	0.633	0.183	0.000	0.002
N	r	-0.706* *	-0.769* *	-0.126	-0.769**	-0.762* *	-0.294	0.650* *	-0.986* *	-0.755* *
	p	0.010	0.003	0.697	0.003	0.004	0.354	0.022	0.000	0.005
K	r	0.077	0.399	0.014	0.524	0.427	0.413	-0.385	0.573	0.210
	p	0.812	0.199	0.966	0.080	0.167	0.183	0.217	0.051	0.513
P	r	-0.021	-0.154	-0.098	0.112	-0.077	0.566	-0.392	-0.259	-0.406
	p	0.948	0.633	0.762	0.729	0.812	0.055	0.208	0.417	0.191
Ca	r	0.664* *	0.755**	0.112	0.699* *	0.748**	0.413	-0.790* *	0.916**	0.727**
	p	0.018	0.005	0.729	0.011	0.005	0.183	0.002	0.000	0.007
Mg	r	0.084	0.217	0.014	-0.161	0.084	-0.413	0.112	0.378	0.755**
	p	0.795	0.499	0.966	0.618	0.795	0.183	0.729	0.226	0.005
Na	r	0.601* *	0.657* *	0.119	0.685* *	0.552	0.266	-0.559	0.881**	0.818**
	p	0.039	0.020	0.713	0.014	0.063	0.404	0.059	0.000	0.001
Fe	r	0.804**	0.664* *	0.126	0.874**	0.601* *	0.455	-0.678* *	0.881**	0.713**
	p	0.002	0.018	0.697	0.000	0.039	0.138	0.015	0.000	0.009
Cu	r	0.469	0.636* *	0.336	0.441	0.455	0.014	-0.399	0.678* *	0.601* *
	p	0.124	0.026	0.286	0.152	0.138	0.966	0.199	0.015	0.039
Zn	r	-0.329	-0.315	-0.161	0.315	-0.322	0.615* *	0.007	-0.189	-0.455
	p	0.297	0.319	0.618	0.319	0.308	0.033	0.983	0.557	0.138
Mn	r	-0.169	-0.070	0.359	-0.254	-0.176	-0.613* *	0.648* *	-0.183	-0.317

	p	0.599	0.828	0.252	0.427	0.584	0.034	0.023	0.569	0.316
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** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S8. The Correlations between the Growing Media properties and Plant Antioxidants—Cauliflower.

Parameter		Phenols	DPPH	FRAP	MDA	H ₂ O ₂	SOD	CAT	POD
PW	r	-0.475	0.842**	-0.626*	-0.777**	-0.389	-0.885**	-0.194	-0.777**
	p	0.119	0.001	0.029	0.003	0.212	0.000	0.545	0.003
Total porosity	r	0.462	-0.790**	0.608*	0.762**	0.392	0.839**	0.224	0.783**
	p	0.131	0.002	0.036	0.004	0.208	0.001	0.484	0.003
Air filled porosity	r	0.462	-0.790**	0.608*	0.762**	0.392	0.839**	0.224	0.783**
	p	0.131	0.002	0.036	0.004	0.208	0.001	0.484	0.003
Bulk density	r	-0.378	0.699*	-0.336	-0.371	0.014	-0.650*	0.161	-0.538
	p	0.226	0.011	0.286	0.236	0.966	0.022	0.618	0.071
Container capacity	r	0.287	-0.776**	0.650*	0.510	0.657*	0.734**	0.552	0.923**
	p	0.366	0.003	0.022	0.090	0.020	0.007	0.063	0.000
Ec	r	-0.161	0.755**	-0.301	-0.846**	-0.252	-0.951**	-0.140	-0.573
	p	0.618	0.005	0.342	0.001	0.430	0.000	0.665	0.051
pH	r	-0.385	0.832**	-0.510	-0.720**	-0.322	-0.860**	-0.119	-0.678*
	p	0.217	0.001	0.090	0.008	0.308	0.000	0.713	0.015
Organic matter	r	0.587*	-0.818**	0.629*	0.811**	0.301	0.741**	0.077	0.650*
	p	0.045	0.001	0.028	0.001	0.342	0.006	0.812	0.022
Organic C	r	0.587*	-0.818**	0.629*	0.811**	0.301	0.741**	0.077	0.650*
	p	0.045	0.001	0.028	0.001	0.342	0.006	0.812	0.022
C/N	r	-0.224	0.685*	-0.406	-0.846**	-0.315	-0.874**	-0.266	-0.601*
	p	0.484	0.014	0.191	0.001	0.319	0.000	0.404	0.039
N	r	0.413	-0.825**	0.573	0.804**	0.364	0.846**	0.238	0.755**
	p	0.183	0.001	0.051	0.002	0.245	0.001	0.457	0.005
K	r	-0.231	0.594*	-0.070	-0.455	0.210	-0.413	0.280	-0.105
	p	0.471	0.042	0.829	0.138	0.513	0.183	0.379	0.746
P	r	0.420	-0.147	0.441	0.510	0.224	-0.014	0.224	0.070
	p	0.175	0.649	0.152	0.090	0.484	0.966	0.484	0.829
Ca	r	-0.343	0.832**	-0.510	-0.734**	-0.378	-0.930**	-0.168	-0.727**
	p	0.276	0.001	0.090	0.007	0.226	0.000	0.602	0.007
Mg	r	-0.329	0.266	-0.420	-0.748**	-0.350	-0.392	-0.203	-0.189
	p	0.297	0.404	0.175	0.005	0.265	0.208	0.527	0.557
Na	r	-0.671*	0.769**	-0.692*	-0.811**	-0.287	-0.720**	-0.049	-0.629*
	p	0.017	0.003	0.013	0.001	0.366	0.008	0.880	0.028
Fe	r	-0.503	0.713**	-0.601*	-0.615*	-0.280	-0.769**	-0.133	-0.776**
	p	0.095	0.009	0.039	0.033	0.379	0.003	0.681	0.003
Cu	r	-0.580*	0.748**	-0.622*	-0.643*	-0.308	-0.517	-0.091	-0.497
	p	0.048	0.005	0.031	0.024	0.331	0.085	0.779	0.101
Zn	r	0.098	-0.119	0.545	0.364	0.818**	0.287	0.706*	0.455
	p	0.762	0.713	0.067	0.245	0.001	0.366	0.010	0.138
Mn	r	0.310	-0.106	0.261	0.141	0.120	0.394	-0.211	0.211
	p	0.327	0.744	0.413	0.662	0.711	0.205	0.510	0.510

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S9. The Correlations between the Growing Media properties and Plant Antioxidants—Broccoli.

Parameter		Phenols	DPPH	FRAP	MDA	H ₂ O ₂	SOD	CAT	POD
PW	r	-0.194	0.518	-0.281	-0.432	-0.669*	-0.648*	-0.669*	-0.389
	p	0.545	0.084	0.377	0.161	0.017	0.023	0.017	0.212
Total porosity	r	0.189	-0.434	0.245	0.413	0.643*	0.601*	0.608*	0.378
	p	0.557	0.159	0.443	0.183	0.024	0.039	0.036	0.226
Air filled porosity	r	0.189	-0.434	0.245	0.413	0.643*	0.601*	0.608*	0.378
	p	0.557	0.159	0.443	0.183	0.024	0.039	0.036	0.226
Bulk density	r	-0.273	0.573	-0.217	-0.406	-0.678*	-0.846**	-0.462	-0.755**
	p	0.391	0.051	0.499	0.191	0.015	0.001	0.131	0.005
Container capacity	r	0.231	-0.287	0.266	0.357	0.755**	0.615*	0.301	0.126
	p	0.471	0.366	0.404	0.255	0.005	0.033	0.342	0.697
Ec	r	-0.077	0.524	-0.161	-0.629*	-0.322	-0.343	-0.699*	-0.210
	p	0.812	0.080	0.618	0.028	0.308	0.276	0.011	0.513
pH	r	-0.063	0.664*	-0.168	-0.413	-0.643*	-0.678*	-0.657*	-0.420
	p	0.846	0.018	0.602	0.183	0.024	0.015	0.020	0.175
Organic matter	r	0.294	-0.315	0.413	0.231	0.608*	0.608*	0.797**	0.357
	p	0.354	0.319	0.183	0.471	0.036	0.036	0.002	0.255
Organic C	r	0.294	-0.315	0.413	0.231	0.608*	0.608*	0.797**	0.357
	p	0.354	0.319	0.183	0.471	0.036	0.036	0.002	0.255
C/N	r	0.077	0.643*	0.000	-0.727**	-0.315	-0.308	-0.685*	-0.217
	p	0.812	0.024	1.000	0.007	0.319	0.331	0.014	0.499
N	r	0.133	-0.517	0.182	0.538	0.601*	0.594*	0.678*	0.378
	p	0.681	0.085	0.572	0.071	0.039	0.042	0.015	0.226
K	r	-0.035	0.566	-0.077	-0.378	-0.294	-0.559	-0.699*	-0.503
	p	0.914	0.055	0.812	0.226	0.354	0.059	0.011	0.095
P	r	0.084	0.210	0.259	-0.028	-0.091	-0.196	0.601*	-0.294
	p	0.795	0.513	0.417	0.931	0.779	0.542	0.039	0.354
Ca	r	-0.105	0.608*	-0.210	-0.434	-0.636*	-0.629*	-0.601*	-0.350
	p	0.746	0.036	0.513	0.159	0.026	0.028	0.039	0.265
Mg	r	-0.007	-0.035	-0.266	-0.021	0.084	0.259	-0.622*	0.378
	p	0.983	0.914	0.404	0.948	0.795	0.417	0.031	0.226
Na	r	-0.364	0.259	-0.497	-0.210	-0.580*	-0.559	-0.818**	-0.343
	p	0.245	0.417	0.101	0.513	0.048	0.059	0.001	0.276
Fe	r	-0.378	0.308	-0.357	-0.413	-0.657*	-0.636*	-0.517	-0.503
	p	0.226	0.331	0.255	0.183	0.020	0.026	0.085	0.095
Cu	r	-0.524	-0.021	-0.699*	-0.014	-0.517	-0.497	-0.783**	-0.084
	p	0.080	0.948	0.011	0.966	0.085	0.101	0.003	0.795
Zn	r	-0.189	0.028	0.049	-0.098	0.119	-0.266	0.000	-0.664*
	p	0.557	0.931	0.880	0.762	0.713	0.404	1.000	0.018
Mn	r	-0.190	-0.528	-0.070	-0.197	0.366	0.303	-0.049	0.331
	p	0.554	0.078	0.828	0.539	0.242	0.339	0.879	0.293

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S10. The Correlations between the Growing Media properties and Plant Antioxidants—Cabbage.

Parameter		Phenols	DPPH	FRAP	MDA	H ₂ O ₂	SOD	CAT	POD
PW	r	0.345	0.713**	0.345	0.151	-0.518	0.216	-0.972**	0.022
	p	0.271	0.009	0.271	0.639	0.084	0.500	0.000	0.947
Total porosity	r	-0.350	-0.720**	-0.350	-0.196	0.524	-0.238	0.958**	-0.007
	p	0.265	0.008	0.265	0.542	0.080	0.457	0.000	0.983
Air filled porosity	r	-0.350	-0.720**	-0.350	-0.196	0.524	-0.238	0.958**	-0.007
	p	0.265	0.008	0.265	0.542	0.080	0.457	0.000	0.983
Bulk density	r	-0.245	0.643*	-0.224	-0.007	-0.168	0.497	-0.741**	0.413
	p	0.443	0.024	0.484	0.983	0.602	0.101	0.006	0.183
Container capacity	r	-0.294	-0.818**	-0.210	0.049	0.762**	-0.098	0.846**	-0.210
	p	0.354	0.001	0.513	0.880	0.004	0.762	0.001	0.513
Ec	r	0.455	0.378	0.455	0.154	-0.462	0.259	-0.818**	-0.168
	p	0.138	0.226	0.138	0.633	0.131	0.417	0.001	0.602
pH	r	0.259	0.608*	0.224	-0.049	-0.462	0.189	-0.909**	0.063
	p	0.417	0.036	0.484	0.880	0.131	0.557	0.000	0.846
Organic matter	r	-0.336	-0.664*	-0.476	-0.315	0.392	-0.091	0.867**	0.035
	p	0.286	0.018	0.118	0.319	0.208	0.779	0.000	0.914
Organic C	r	-0.336	-0.664*	-0.476	-0.315	0.392	-0.091	0.867**	0.035
	p	0.286	0.018	0.118	0.319	0.208	0.779	0.000	0.914
C/N	r	0.476	0.434	0.469	0.119	-0.552	0.056	-0.818**	-0.175
	p	0.118	0.159	0.124	0.713	0.063	0.863	0.001	0.587
N	r	-0.315	-0.699*	-0.357	-0.147	0.573	-0.119	0.930**	-0.042
	p	0.319	0.011	0.255	0.649	0.051	0.713	0.000	0.897
K	r	-0.231	0.203	-0.007	-0.098	-0.035	0.028	-0.378	0.217
	p	0.471	0.527	0.983	0.762	0.914	0.931	0.226	0.499
P	r	-0.490	-0.133	-0.804**	-0.517	0.210	0.713**	0.077	0.378
	p	0.106	0.681	0.002	0.085	0.513	0.009	0.812	0.226
Ca	r	0.343	0.594*	0.266	-0.014	-0.497	0.294	-0.944**	0.007
	p	0.276	0.042	0.404	0.966	0.101	0.354	0.000	0.983
Mg	r	0.853**	0.014	0.965**	0.469	-0.266	-0.357	-0.350	-0.678*
	p	0.000	0.966	0.000	0.124	0.404	0.255	0.265	0.015
Na	r	0.385	0.657*	0.545	0.448	-0.336	0.098	-0.853**	-0.098
	p	0.217	0.020	0.067	0.145	0.286	0.762	0.000	0.762
Fe	r	0.196	0.797**	0.217	0.357	-0.406	0.399	-0.909**	0.133
	p	0.542	0.002	0.499	0.255	0.191	0.199	0.000	0.681
Cu	r	0.301	0.552	0.573	0.406	-0.308	-0.119	-0.580*	-0.014
	p	0.342	0.063	0.051	0.191	0.331	0.713	0.048	0.966
Zn	r	-0.895**	-0.161	-0.671*	0.021	0.622*	0.462	0.315	0.497
	p	0.000	0.618	0.017	0.948	0.031	0.131	0.319	0.101
Mn	r	-0.239	-0.077	0.113	0.204	-0.113	-0.570	0.521	0.232
	p	0.454	0.811	0.727	0.524	0.727	0.053	0.082	0.467

** . Correlation is significant at the 0.01 level (2-tailed).* . Correlation is significant at the 0.05 level (2-tailed).

Table S11. Principal Component Analysis of Data Obtained for Cauliflower—Total Variance Explained for Plant Growth and Physiology.

Component	Total Variance Explained	
	Initial Eigenvalues	Rotation Sums of Squared Loadings

	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	3.759	62.649	62.649	3.173	52.889	52.889
PC2	1.270	21.159	83.808	1.855	30.919	83.808

Extraction Method: Principal Component Analysis.

Table S12. Principal Component Analysis of Data Obtained for Cauliflower—Component matrix for plant growth and physiology.

	Component ^a	
	PC1	PC2
PW	-0.947	
Org. Matter	0.911	
SPAD	0.860	
F.Biomass	0.793	
Sto.cond.		0.916
T. Chl.		-0.898

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 3 iterations.

Table S13. Principal Component Analysis of Data Obtained for Cauliflower—Total Variance Explained for Antioxidants and Stress Factors.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	4.482	64.030	64.030	3.640	51.995	51.995
PC2	1.212	17.314	81.344	2.054	29.349	81.344

Extraction Method: Principal Component Analysis.

Table S14. Principal Component Analysis of Data Obtained for Cauliflower—Component matrix for plant stress factors and antioxidants.

	Component ^a	
	PC1	PC2
SOD0.	0.988	
DPPH	-0.806	
PW	-0.774	-0.572
H2O2	0.729	
MDA	0.680	0.550
Phenols		0.881
Org. Matter	0.638	0.727

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 3 iterations.

Table S15. Principal Component Analysis of Data Obtained for Cauliflower—Total Variance Explained for Plant Minerals.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	6.103	55.485	55.485	5.385	48.953	48.953
PC2	3.002	27.289	82.774	3.617	32.881	81.835

PC3	1.604	14.585	97.358	1.708	15.524	97.358
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Extraction Method: Principal Component Analysis.

Table S16. Principal Component Analysis of Data Obtained for Cauliflower—Component matrix for leaf mineral levels.

	Component ^a		
	PC1	PC2	PC3
PW	0.972		
l-Ca	0.958		
l-Cu	0.949		
Org. Matter	−0.935		
l-Fe	−0.776		0.575
l-Na	−0.695		
l-N		0.989	
l-K		0.960	
l-P		0.872	
l-Mg	0.612	−0.758	

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 4 iterations.

Table S17. Principal Component Analysis of Data Obtained for Broccoli—Total Variance Explained for Plant Growth and Physiology.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	3.845	64.081	64.081	3.538	58.969	58.969
PC2	1.449	24.143	88.224	1.755	29.255	88.224

Extraction Method: Principal Component Analysis.

Table S18. Principal Component Analysis of Data Obtained for Broccoli—Component matrix for plant growth and physiology.

	Component ^a	
	PC1	PC2
PW	−0.932	
SPAD	0.918	
Stom. cond.	0.884	
Org. Matter	0.822	
T. Chl.		0.993
F.Biomass	0.608	0.679

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 3 iterations.

Table S19. Principal Component Analysis of Data Obtained for Broccoli—Total Variance Explained for Antioxidants and Stress Factors.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	3.664	52.347	52.347	3.511	50.155	50.155
PC2	1.753	25.040	77.387	1.906	27.232	77.387

Extraction Method: Principal Component Analysis.

Table 20. Principal Component Analysis of Data Obtained for Broccoli—Component matrix for plant stress factors and antioxidants.

	Component ^a	
	PC1	PC2
H ₂ O ₂	0.911	
PW	−0.908	
SOD	0.889	
Org. Matter	0.834	
DPPH		0.885
Phenols		0.838
MDA		−0.532

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 3 iterations.

Table S21. Principal Component Analysis of Data Obtained for Broccoli—Total Variance Explained for Plant Minerals.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	6.751	61.373	61.373	6.282	57.111	57.111
PC2	2.450	22.269	83.642	2.446	22.235	79.346
PC3	1.265	11.497	95.139	1.737	15.793	95.139

Extraction Method: Principal Component Analysis.

Table S22. Principal Component Analysis of Data Obtained for Broccoli—Component matrix for leaf mineral levels.

	Component ^a		
	PC1	PC2	PC3
l-Fe	−0.971		
PW	0.954		
l-P	0.928		
l-K	0.916		
Org. Matter	−0.864		
l-Na	−0.831		
l-Mg	−0.748		0.542
l-Cu	0.724	0.564	
l-Ca		0.943	
l-N		0.818	

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 6 iterations.

Table S23. Principal Component Analysis of Data Obtained for Cabbage—Total Variance Explained for Plant Growth and Physiology.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	3.772	62.861	62.861	3.745	62.414	62.414

PC2	1.131	18.852	81.714	1.158	19.299	81.714
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Extraction Method: Principal Component Analysis.

Table S24. Principal Component Analysis of Data Obtained for Cabbage—Component matrix for plant growth and physiology.

	Component ^a	
	PC1	PC2
PW	-0.958	
Org. Matter	0.950	
F.Biomass	0.872	
T. Chl.	0.819	
SPAD	0.658	0.536
Sto. cond.		0.899

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 3 iterations.

Table S25. Principal Component Analysis of Data Obtained for Cabbage—Total Variance Explained for Antioxidants and Stress Factors.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	3.156	45.079	45.079	3.087	44.104	44.104
PC2	1.731	24.726	69.805	1.795	25.646	69.751
PC3	1.381	19.728	89.534	1.385	19.783	89.534

Extraction Method: Principal Component Analysis.

Table S26. Principal Component Analysis of Data Obtained for Cabbage—Component matrix for plant stress factors and antioxidants.

	Component ^a		
	PC1	PC2	PC3
PW	0.983		
DPPH	0.926		
Org. Matter	-0.883		
H ₂ O ₂	-0.617	0.605	
SOD		0.875	
Phenols		-0.812	
MDA			0.927

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 4 iterations.

Table S27. Principal Component Analysis of Data Obtained for Cabbage—Total Variance Explained for Plant Minerals.

Component	Total Variance Explained					
	Initial Eigenvalues			Rotation Sums of Squared Loadings		
	Total	% of Variance	Cumulative %	Total	% of Variance	Cumulative %
PC1	6.881	62.558	62.558	4.131	37.558	37.558
PC2	2.556	23.235	85.793	3.832	34.834	72.392
PC3	1.003	9.118	94.911	2.477	22.519	94.911

Extraction Method: Principal Component Analysis.

Table S28. Principal Component Analysis of Data Obtained for Cabbage—Component matrix for leaf mineral levels.

	Component ^a		
	PC1	PC2	PC3
l-Zn	0.992		
Org. Matter	-0.897		
PW	0.858		
l-Cu	0.701	0.500	
l-N		0.976	
l-K		0.930	
l-P		0.887	
l-Ca	0.574	0.695	
l-Na			0.968
l-Mg	0.607		0.716

Extraction Method: Principal Component Analysis; Rotation Method: Varimax with Kaiser Normalization; a. Rotation converged in 4 iterations.