

Online Resource 5: Euclidean distance matrix between *E. diaphana* individuals. Individuals are arranged by genotype (AIMS1-4) and distances within and outside the clonal distribution are shown in white and grey, respectively. Name codes: Ed = *Exaiptasia diaphana* sent from AIMS, S= *Exaiptasia diaphana* originally from AIMS but held at Swinburne University of Technology (with I, II, A, B, and C as individuals)

Genotype	<u>AIMS1</u>								<u>AIMS3</u>							<u>AIMS2</u>					<u>AIMS4</u>		
Individual	Ed.01	Ed.02	Ed.03	Ed.07	Ed.08	Ed.09	Ed.12	Ed.21	Ed.06	Ed.11a	Ed.11b	Ed.14	Ed.17	Ed.18	Ed.19	Ed.10	Ed.20	Ed.22	SC	SII	SA	SB	SI
Ed.01	0.00	3.76	1.67	4.22	0.50	0.71	2.90	2.12	28.28	28.29	29.48	28.31	28.87	28.29	28.32	22.11	22.12	21.96	21.92	22.16	30.66	30.80	28.97
Ed.02	3.76	0.00	3.69	5.45	3.72	3.72	4.18	4.42	28.64	28.65	29.57	28.67	29.21	28.66	28.69	22.22	22.42	22.12	22.05	22.33	30.37	30.56	28.56
Ed.03	1.67	3.69	0.00	4.37	1.59	1.81	2.90	2.63	28.32	28.33	29.46	28.35	28.90	28.34	28.38	22.11	22.15	21.99	21.94	22.18	30.67	30.82	29.01
Ed.07	4.22	5.45	4.37	0.00	4.18	4.18	5.41	4.74	28.63	28.64	29.65	28.66	29.12	28.63	28.69	22.30	22.43	22.25	22.14	22.37	30.54	30.75	28.86
Ed.08	0.50	3.72	1.59	4.18	0.00	0.50	2.84	2.05	28.28	28.29	29.47	28.30	28.87	28.28	28.32	22.10	22.12	21.96	21.91	22.16	30.65	30.80	28.97
Ed.09	0.71	3.72	1.81	4.18	0.50	0.00	2.79	1.99	28.27	28.28	29.47	28.30	28.86	28.28	28.31	22.12	22.14	21.98	21.93	22.17	30.67	30.81	28.97
Ed.12	2.90	4.18	2.90	5.41	2.84	2.79	0.00	3.44	28.67	28.68	29.87	28.70	28.96	28.67	28.72	22.25	22.27	22.15	22.11	22.44	30.90	31.07	29.09
Ed.21	2.12	4.42	2.63	4.74	2.05	1.99	3.44	0.00	28.32	28.32	29.60	28.35	28.87	28.31	28.35	22.32	22.34	22.18	22.13	22.36	30.51	30.66	28.74
Ed.06	28.28	28.64	28.32	28.63	28.28	28.27	28.67	28.32	0.00	1.73	8.67	1.00	4.43	1.50	1.67	28.16	28.23	27.95	27.91	28.15	32.61	32.61	31.51
Ed.11a	28.29	28.65	28.33	28.64	28.29	28.28	28.68	28.32	1.73	0.00	8.82	0.00	4.43	0.50	1.33	28.20	28.26	27.99	27.96	28.21	32.61	32.60	31.50
Ed.11b	29.48	29.57	29.46	29.65	29.47	29.47	29.87	29.60	8.67	8.82	0.00	8.68	9.61	8.66	9.07	29.47	29.89	29.19	29.10	29.43	32.73	32.84	31.43
Ed.14	28.31	28.67	28.35	28.66	28.30	28.30	28.70	28.35	1.00	0.00	8.68	0.00	4.43	1.00	1.67	28.20	28.27	27.99	27.96	28.21	32.63	32.63	31.53
Ed.17	28.87	29.21	28.90	29.12	28.87	28.86	28.96	28.87	4.43	4.43	9.61	4.43	0.00	4.59	4.86	28.72	28.87	28.46	28.47	28.72	32.71	32.73	31.40
Ed.18	28.29	28.66	28.34	28.63	28.28	28.28	28.67	28.31	1.50	0.50	8.66	1.00	4.59	0.00	1.24	28.17	28.23	27.97	27.93	28.18	32.63	32.61	31.50
Ed.19	28.32	28.69	28.38	28.69	28.32	28.31	28.72	28.35	1.67	1.33	9.07	1.67	4.86	1.24	0.00	28.12	28.13	27.97	27.93	28.17	32.70	32.63	31.58
Ed.10	22.11	22.22	22.11	22.30	22.10	22.12	22.25	22.32	28.16	28.20	29.47	28.20	28.72	28.17	28.12	0.00	4.15	3.66	3.14	4.43	30.51	30.69	26.88
Ed.20	22.12	22.42	22.15	22.43	22.12	22.14	22.27	22.34	28.23	28.26	29.89	28.27	28.87	28.23	28.13	4.15	0.00	4.37	4.04	5.03	30.40	30.56	26.84
Ed.22	21.96	22.12	21.99	22.25	21.96	21.98	22.15	22.18	27.95	27.99	29.19	27.99	28.46	27.97	27.97	3.66	4.37	0.00	2.09	3.88	30.22	30.45	26.68
SC	21.92	22.05	21.94	22.14	21.91	21.93	22.11	22.13	27.91	27.96	29.10	27.96	28.47	27.93	27.93	3.14	4.04	2.09	0.00	3.47	30.22	30.43	26.67
SII	22.16	22.33	22.18	22.37	22.16	22.17	22.44	22.36	28.15	28.21	29.43	28.21	28.72	28.18	28.17	4.43	5.03	3.88	3.47	0.00	29.69	29.88	26.27