

Table 2. Phaeophyta. Source of specimens, reproductive phase, estimated nuclear genome size. Data standardized to the DNA level of chicken erythrocytes (RBC = 2.4 pg).

Species	Location	Reproductive Phase	Number of Slides	Number of Nuclei	Nuclear Genome Size (pg)		
					2C	4C	8C
Cutleriales							
<i>Cutleria hancockii</i> Dawson	MEX		4	202	0.8 ± 0.2		
<i>Cutleria multifida</i> (Smith) Greville	AUS		3	109	1.0 ± 0.1		
Desmarestiales							
<i>Arthrocladia villosa</i> (Hudson) Duby ⁵	NC		5	171	0.5 ± 0.8		
<i>A. villosa</i>			5	144		1.1± 0.2	
<i>Desmarestia aculeata</i> (Linnaeus) Lamouroux	ME		2	40		1.6 ± 0.4	
<i>Desmarestia viridis</i> (O.F. Muller) Lamouroux	ME		3	106		1.7± 0.3	
Dictyotales							
<i>Dictyota ciliolata</i> Kützing	NC	Me fix	3	106	1.4 ± 0.3*		
<i>Dictyota ciliolata</i>	NC	Me fix		10			9.2 NV
<i>Dictyota ciliolata</i>	NC	Me fix		10			8.8 NV
<i>Dictyota menstrualis</i> (Hoyt) Schnetter, Horning et Weber-Peukert	NC		1	12	[1.1] ³	2.2 ± 0.7	
<i>Dictyota menstrualis</i>	NC	Me fix	2	26	1.65 ± 0.3*		
<i>Dictyota menstrualis</i>	NC	Me fix					
<i>Dictyota menstrualis</i>	NC						
<i>Dictyopteris delicatula</i> Lamouroux	NC	Me fix	2	40	1.48 ± 0.3*		
<i>Dictyopteris delicatula</i>	NC	Me fix		10			13.2 NV
<i>Dictyopteris hoytii</i> Taylor	NC	Me fix	4	211	2.3 ± 0.4*		
<i>Dictyopteris hoytii</i>	NC		3	105	2.0 ± 0.4*		
<i>Dictyopteris polypodioides</i> (DeCandolle) Lamouroux ¹ (= <i>Dictyopteris membranacea</i> (Stackhouse) Batters)	NC		4	85	1.3 ± 0.4 ³		
<i>Dictyopteris polypodioides</i>	NC	Me fix	4	90		3.1 ± 0.6*	
<i>Dictyopteris polypodioides</i>	NC	Me fix					
<i>Dictyopteris polypodioides</i>	NC						
<i>Padina durvillea</i> Bory	MEX		4	140	1.3 ± 0.3 ³		
<i>Padina gymnospora</i> (Kützing) Sonder	FLA		4	177	[1.1] ³	2.2 ± 0.4	
<i>Padina gymnospora</i>	NC	Me fix	4	120			4.9 ± 0.8*

Padina gymnospora	NC		3	60		4.1 ± 0.8*
Padina gymnospora	NC	Me fix	4	82		4.3 ± 0.6*
Padina jamaicensis (Collins) Papenfuss	FLA					
Padina japonica Yamada	HI		3	37		2.4 ± 0.4*
Zonaria tournefortii (Lamouroux) Montagne	NC	Me fix	4	164		2.1 ± 0.3*

Ectocarpales

Acinetospora crinita (Harvey) Kornmann ^{1,2}	NC		5	105	[0.5] ³	1.0 ± 0.2
Adenocystis utricularis (Bory de Saint-Vincent) Skottsberg	NZ		2	105		0.35 ± 0.1*
Cladosiphon occidentalis Kylin	NC		3	144	[0.3] ³	0.7 ± 0.1
Colpomenia sinuosa (Mertens ex Roth) Derbès et Solier	MEX		3	108	0.6 ± 0.1	
Colpomenia sinuosa	NC	Me fix	4	138	0.3 ± 0.05*	
Colpomenia phaeodactyla (Dawson) Norris et Wynne	MEX		5	207	0.5 ± 0.1	
Ecocarpus siliculosus (Dillwyn) Lyngbye ²	NC		4	132	0.5 ± 0.1	1.0 ± 0.2
E. siliculosus						
Hinksia irregularis (Kützinger) Amsler ⁵	NC		1	9		0.4 ± 0.1
H. irregularis						
Hinksia mitchelliae (Harvey) Silva in Silva, Meñez et Moe ^{2,5}	NC		4	152	0.7 ± 0.2	
H. mitchelliae	NC		1	57		1.6 ± 0.3
Hummia onusta (Kützinger) Fiore	NC		3	108	[0.6] ³	1.1 ± 0.2
Hydroclathrus clathratus (C. Agardh) Howe	HI		3	81	0.9 ± 0.2	
Petalonia fascia (O.F. Muller) Kuntze	NC		5	200	0.5 ± 0.1	
Punctaria tenuissima (C. Agardh) Greville	NC		6	220	0.5 ± 0.1	
Rosenvingea orientalis (J. Agardh) Børgesen	NC		7	273	0.4 ± 0.1	
Scytosiphon lomentaria (Lyngbye) C. Agardh	NC		4	141	0.5 ± 0.1	
Stilophora rhizodes (Turner) J. Agardh	NC		3	109	0.2 ± 0.1	
S. rhizodes ⁵						
Striaria attenuata (C. Agardh) Greville	NC		5	134	[0.3] ³	0.6 ± 0.1

Fucales

Ascophyllum nodosum (Linnaeus) LeJolis	ME		4	95	[1.7] ³	3.3 ± 1.0
Fucus vesiculosus Linnaeus	ME		5	141	[1.1] ³	2.2 ± 0.4
Sargassum echinocarpum J. Agardh	HI		3	78	[0.7] ³	1.3 ± 0.2
Sargassum filipendula C. Agardh	NC		5	139	[0.4] ³	0.8 ± 0.1

Sargassum filipendula	NC	Me fix	2	54		1.4 ± 0.3*	
Sargassum filipendula	NC	Me fix	3	84			3.6 ± 0.5 *
Sargassum filipendula	NC		3	89			3.7 ± 0.6*
Sargassum fluitans Børgesen	NC		3	96	[0.4] ³	0.8 ± 0.1	
Laminariales							
Agarum clathratum Dumortier	ME		3	56	[1.2] ³	2.5 ± 0.5	
Alaria esculenta (Linnaeus) Greville	ME		4	163	[1.2] ³	2.3 ± 0.5	
A. esculenta ⁵			1	5	1.4 ± 0.1		
Ecklonia radiata (C. Agardh) J. Agardh	AUS		4	112	[1.3]	2.6 ± 0.4	
Laminaria digitata (Hudson) Lamouroux	ME		4	106	[1.4] ³	2.7 ± 0.5	
Laminaria saccharina (Linnaeus) Greville	ME		4	125	[0.6] ^{3,4}	1.3 ± 0.3	
Sphacelariales							
Sphacelaria rigidula Kützing ¹	NC		4	127	1.8 ± 0.4		
Sphacelaria sp.	4315		3	116	[1.2] ³	2.5 ± 0.4	
Sporochnales							
Carpomitra costata (Stackhouse) Batters	AUS		4	143	[0.8] ³	1.6 ± 0.3	
Carpomitra costata	Stew.Is.		4	213		1.55 ± 0.3*	
Perithalia caudata (Labillardière) Womersley	AUS		4	159	[0.9] ³	1.9 ± 0.3	
Sporochnus pedunculatus (Hudson) C. Agardh	NC	Me fix	2	20	0.84 ± 0.1*		
Sporochnus pedunculatus	NC	Me fix	4	154		1.67 ± 0.2*	