

Supplementary data

Table S1. Distribution of *rbcL* haplotypes of *Pachymeniopsis lanceolata*.

Country	Korea																				Japan										GenBank Accession Number					
Region	Jeju					Southern coast					Eastern coast																									
Haplotypes	JJ	SG	JD	GM	YS	NH	TY	GA	GI	US	GP	PH	YD	UJ	JB	SC	GW	SK	GS	FK	SM	ES	MS	OS	OT	Total										
LR01	18	29		2	1	7	1	3	8	10		12		8		11	1			1	6	5		1	1	124	MZ558314									
LR02		1				2				3	2	1	2	1	5			16	1	1						35	MZ558315									
LR03												2		10	1											13	MZ558316									
LR04														1													1	MZ558317								
LR05														1													1	MZ558318								
LR06									1	10			1	3												15	MZ558319									
LR07											1			2													3	MZ558320								
LR08											5																5	MZ558321								
LR09								1																			1	MZ558322								
LR10										1																	1	MZ558323								
LR11																			1								2	AB055477								
LR12																2	1	1								4	GU168556									
LR13														1													1	GU168557								
LR14																			2								2	MZ558325								
LR15																			7								7	MZ558326								
Total	18	29	1	2	1	9	1	3	11	12	3	33	1	26	6	11	20	2	2	2	9	6	5	1	1	215										

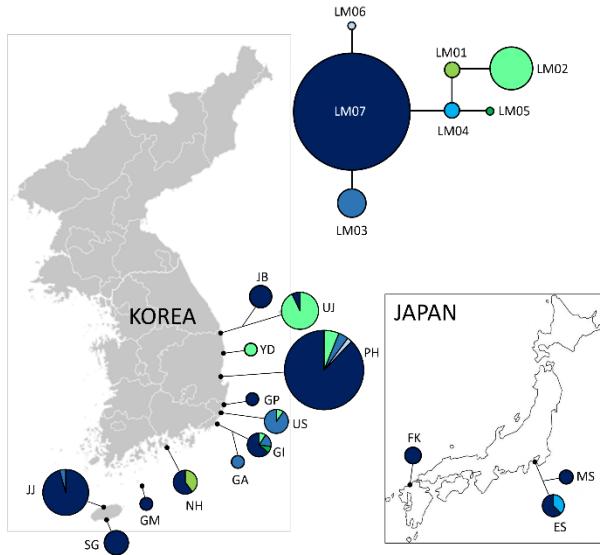
JJ, Jejusi; SG, Seogwipo; JD, Jindo; GM, Geomundo; YS, Yeosu; NH, Namhaedo; TY, Tongyeong; GA, Gwanganri; GI, Gijang; US, Ulsan; GP, Gampo; PH, Pohang; YD, Yeongdeok; UJ, Uljin; JB, Jukbyeon; SC, Samcheok; GW, Gangwon; SK, Sokcho; GS, Goseong; FK, Fukuoka; SM, Shimoda; ES, Enoshima; MS, Misaki; OS, Oshoro; OT, Otaru

Table S2. Distribution of *rbcL* haplotypes of *Pachymeniopsis elliptica*

Country	Korea													Japan					GenBank Accession Number	
Region	Jeju							Southern coast						Eastern coast						GenBank Accession Number
Haplotypes	JJ	SG	WD	GM	TY	GJ	HA	GI	US	GP	PH	JB	SM	MS	KS	HK	Total			
ER01	40	12	7	12	5	4	8	23	2		9	1	4	3	2	1	133	MZ558327		
ER02		1															1	MZ558328		
ER03											1						1	MZ558329		
ER04											1						1	MZ558330		
ER05											1						1	MZ558331		
ER06						1											1	MZ558332		
Total	41	12	7	12	6	4	8	23	2	1	11	1	4	3	2	1	138			

JJ, Jejusi; SG, Seogwipo; WD, Wando; GM, Geomundo; TY, Tongyeong; GJ, Geoje; HA, Haeundae; GI, Gijang; US, Ulsan; GP, Gampo; PH, Pohang; JB, Jukbyeon; SM, Shimoda; MS, Misaki; KS, Katsuura; HK, Hakodate

(A) *Pachymeniopsis lanceolata*



(B) *Pachymeniopsis elliptica*

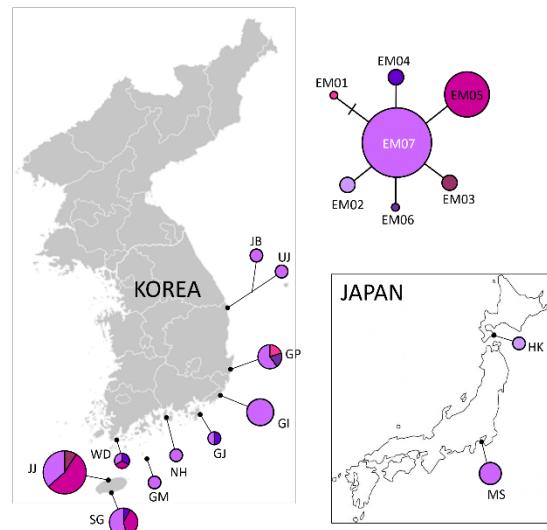


Figure S1. Geographic distribution of haplotypes and haplotype networks of *Pachymeniopsis lanceolata* (A) and *P. elliptica* (B) based on the mitochondrial COI-5P gene. On the map, each circle represents a location and the proportion of pie chart indicates the frequency of specimens for each haplotype. The pie chart color corresponds to the one used in haplotype networks. In the network, each connecting lines represent single mutational steps. The vertical bars represent the number of mutational steps between two haplotypes when >1.