



In Silico Evaluation of Potential Bioactive Peptides of Phycoerythrins from Selected Rhodophytes

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APPENDIX A

Table A1. Frequency of occurrence of peptides of identical phycoerythrin alpha and beta subunit sequences

	Value of a			
Activity	<i>Porphyridium purpureum</i> (YP_008965769.1)	<i>Porphyra purpurea</i> (NP_053978.1)	<i>Helminthocladia australis</i> (YP_009313668.1)	<i>Gracilariaopsis chorda</i> (YP_009294675.1)
AH	0.5183	0.5122	0.4463	0.4124
APR	0.0061	0.0122	0.0169	0.0113
GLUI	0.0366	0.0366	0.0169	0.0113
AI	0.0061	0.0061	-	-
AM	0.0122	0.0122	0.0113	0.0113
AB	-	-	0.0056	0.0056
AC	-	-	0.0113	0.0056
AO	0.0671	0.0488	0.0452	0.0395
AT	0.0122	0.0122	0.0113	0.0113
35PD	0.0122	0.0061	0.0056	-
AVI	-	-	0.0056	0.0056
LIG	-	-	0.0056	-
DPP3	0.0915	0.0915	0.0847	0.0847
DPP	0.622	0.628	0.6271	0.5763
HYPL	0.0061	-	-	-
HE	-	-	0.0056	0.0056
HYP	0.0244	0.0305	0.0339	0.0226
LCP	0.0061	-	-	-
LEUT	-	-	0.0056	0.0056
NE	0.0305	0.0183	0.0113	0.0113
PAM	0.0061	0.0061	0.0113	0.0113
RE	0.0183	0.0244	0.0113	0.0113

	Value of a			
Activity	<i>Porphyridium purpureum</i> (YP_008965769.1)	<i>Porphyra purpurea</i> (NP_053978.1)	<i>Helminthocladia australis</i> (YP_009313668.1)	<i>Gracilariaopsis chorda</i> (YP_009294675.1)
REN	0.0122	0.0122	0.0339	0.0282
ST	0.0183	0.0244	0.0452	0.0452
TOX	-	-	0.0056	-
XAAP	0.0061	-	-	-

AH- ACE inhibitor, APR- activating ubiquitin-mediated proteolysis, GLUI-alpha-glucosidase inhibitor, AI-anti inflammatory, AM-antiamnestic, AO-antioxidative, AB-antibacterial, AC-anticancer, AT-antithrombotic, 35PD- CaMPDE inhibitor, DPP3-dipeptidyl peptidase III inhibitor, DPP-dipeptidyl peptidase IV inhibitor, NE- neuropeptide, RE-regulating, REN-renin inhibitor, ST-stimulating, PAM-PAM inhibitor, AVI- antiviral, XAAP-xaa-pro inhibitor, TOX-toxic, HYPL-hypolipidemic, LCP-lactocepin inhibitor, HYP- hypotensive, HE- haemolytic, LEUT- Leucyltransferase inhibitor, LIG- bacterial permease ligand.