Use of SCN features: No

Max learning objects: Maximum objects/class Strategy N° 5

Actual Values

## PA Selected Samples prediction using all regions training set, Learning with all classes present in the selected samples, no extra training categories, No Calanoida (civ-vi), Cyclopoida, Zooplankton classes in learning set

Confusion Matrix - In percent of Actual Value

										C	onfus	ion V	atrix	– In <sub>I</sub>	percei	nt of	Actua	l Valı	ue								
Cirripedia (larvae)	73%	2%	<1%	11%	<1%	7%		<1%	<1%	1%		<1%	<1%	<1%	<1%	<1%	<1%		<1%	<1%			<1%	<1%		<1%	<1%
Acartia spp.	<1%	71%	<1%	<1%	<1%	1%	7%	2%	1%				<1%	<1%		<1%	<1%				<1%		16%	<1%		<1%	
Oikopleura spp.	1%	2%	67%	2%	17%	3%	<1%	1%	<1%	<1%	<1%	<1%	<1%	<1%	<1%	2%			<1%		<1%	<1%	<1%	<1%		<1%	<1%
Podon/Pleopsis spp.	9%	4%	<1%	47%		26%	1%	3%	3%	<1%	<1%	1%	<1%				<1%	<1%					<1%	<1%		<1%	<1%
Fritillaria spp.		3%	20%		65%	<1%	<1%	<1%	<1%				3%		1%							<1%	5%			<1%	<1%
Evadne spp.	4%	<1%	<1%	4%	<1%	73%	<1%	2%	2%	2%	<1%		7%		<1%	<1%		<1%					<1%			<1%	1%
Corycaeidae	<1%	39%	<1%	1%	<1%	1%	47%	1%	1%			<1%		<1%		<1%			<1%				2%	2%			<1%
Calanoida (ci-ciii)	11%	12%	<1%	15%		15%	11%	16%	1%			1%			5%								11%			2%	
Paracalanus spp.	<1%	20%	<1%	2%		1%		3%	46%															26%			
Gastropoda (larvae/Limacina)	3%	3%		16%		12%		2%		55%	6%							<1%					2%			<1%	
Bivalvia (larvae)				6%			1%			5%	81%		4%													2%	
Polychaeta (larvae)	14%	8%		12%		17%	2%	2%		2%		29%	2%			5%			5%					3%		2%	
Hydrozoa (medusa)		5%				9%			2%	2%		13%	60%			4%		2%	2%							2%	
Centropages spp.		48%			4%									24%							6%			10%	8%		
Echinodermata (larvae)				2%	2%	10%						2%	74%			5%		2%	2%								
Calycophorae (nectophore)								3%				3%	3%	5%		73%			11%					3%			
Decapoda-brachyura (zoeae)	3%	25%		3%		3%								9%		6%	25%		9%					6%	9%		
Ctenophora (larvae)	3%			6%		13%				6%		26%	29%			3%		10%	3%								
Decapoda-non brachyura (larvae)				4%		4%						8%							73%						12%		
Ostracoda	8%			20%		32%	4%				28%									8%							
Tortanus spp.	4%	21%			4%									21%		21%	4%				21%		4%				
Ascidiacea (larvae)			4%		17%																	78%					
Oithona spp.		53%			18%									6%									24%				
Pseudocalanus spp.		29%																						71%			
Calanus spp.		17%		2=0															33%					50%		7.50	
Copepoda (nauplii)				25%												4000										75%	
Euphysa spp. (medusa)	4.000															100%											
Bryozoa (larvae)			<i>O</i> .	<i></i>	<u> </u>	<u> </u>			$\triangleright$		<i>♠</i> .	$\sim$	<i></i>		<b>^</b>		$\wedge$	C.		0	>	1	0.	$\Diamond$			<i>∧ ∧</i>
	Trip	edio (Carl	Oikop	Podol	Plant Control of the	Aria Spp.	Coryce Spp.	Peid Alan	Oldo Orac	Alan.	Pod Wall	Via (1	Nacy Hole	Control	Dago	der dlyco	Dohn ecap	odo teno	phor ecap	Odo Straco	Ortany	is scidic	. Thon	PSELIAL	, dan	Copepolis Spp.	To Tyozo
	Cirrip	lan	70. Po)	200	Fitill Pleapsis	<i>So. So.</i>	<i>70</i> .	JOR	Parado (ci. ci.	Castro Vanus Sp	0. (19)	Polye, Vac/i	, allan	Centro, (nedli		Mala (	Decape Johorae (1)	ocx brack	Sylv.	non br	<b>)</b>	2/2	Oithon,	Pseudl Paspa Pas	Idnus	90. 20.	Cuphysa Sp. (nauplii) (na
						Z)						Polyco Parael inac	in.	7	9		Decape Johorae (no	Ophore	Ta Fore	Ostraco	hyura	7.				~.	9
													9)							ツ	16	draej					
													_	1													

Predicted Values

Classification Report Matrix

max	max available learning object						
	precision	recall	f1-score				
Cirripedia (larvae) (n=3231-train=7685)	0.94	0.73	0.83				
Acartia spp. (n=2290-train=111319)	0.81	0.71	0.76				
<b>Oikopleura spp.</b> (n=1773-train=5305)	0.91	0.67	0.77				
Podon/Pleopsis spp. (n=607-train=7347)	0.37	0.47	0.42				
Fritillaria spp. (n=475-train=6992)	0.48	0.65	0.55				
Evadne spp. (n=358-train=11064)	0.33	0.73	0.45				
Corycaeidae (n=335-train=1760)	0.46	0.47	0.47				
Calanoida (ci-ciii) (n=150-train=5557)	0.18	0.16	0.17				
Paracalanus spp. (n=141-train=1619)	0.46	0.46	0.46				
Gastropoda (larvae/Limacina) (n=126-train=3272)	0.51	0.55	0.53				
Bivalvia (larvae) (n=96-train=3764)	0.80	0.81	0.81				
Polychaeta (larvae) (n=65-train=1577)	0.29	0.29	0.29				
<b>Hydrozoa (medusa)</b> (n=55-train=4052)	0.20	0.60	0.30				
Centropages spp. (n=50-train=3620)	0.40	0.24	0.30				
Echinodermata (larvae) (n=42-train=3043)	0.00	0.00	0.00				
Calycophorae (nectophore) (n=37-train=966)	0.25	0.73	0.37				
Decapoda-brachyura (zoeae) (n=32-train=628)	0.40	0.25	0.31				
Ctenophora (larvae) (n=31-train=42)	0.33	0.10	0.15				
ecapoda-non brachyura (larvae) (n=26-train=423)	0.46	0.73	0.57				
Ostracoda (n=25-train=25)	0.25	0.08	0.12				
Tortanus spp. (n=24-train=203)	0.45	0.21	0.29				
Ascidiacea (larvae) (n=23-train=861)	0.67	0.78	0.72				
Oithona spp. (n=17-train=5881)	0.01	0.24	0.02				
Pseudocalanus spp. (n=7-train=4845)	0.06	0.71	0.12				
Calanus spp. (n=6-train=359)	0.00	0.00	0.00				
Copepoda (nauplii) (n=4-train=11555)	0.06	0.75	0.12				
Euphysa spp. (medusa) (n=3-train=3)	0.00	0.00	0.00				
Bryozoa (larvae) (n=1-train=1142)	0.00	0.00	0.00				
macro avg	0.36	0.43	0.35				
weighted avg	0.76	0.66	0.69				
	precision	recall	f1-score				

## Predictions of discarded taxa from training

Acartia sp	45.9% (n=277)	0.0%	2.1% (n=7)	
Bivalvia (larvae	0.0%	0.0%	31.6% (n=106)	
Bryozoa (larvae	0.2% (n=1)	0.0%	2.7% (n=9)	40
Calanoida (ci-ciii	7.3% (n=44)	0.0%	2.1% (n=7)	
Calycophorae (nectophore	0.2% (n=1)	0.0%	0.0%	
Centropages spp	0.8% (n=5)	0.0%	0.0%	
Cirripedia (larvae	2.0% (n=12)	0.0%	2.4% (n=8)	
Copepoda (nauplii	0.2% (n=1)	0.0%	2.1% (n=7)	30
Corycaeida	9.0% (n=54)	33.3% (n=1)	2.1% (n=7)	
Decapoda-non brachyura (larvae Echinodermata (larvae Evadne spp Fritillaria spp	0.2% (n=1)	0.0%	0.3% (n=1)	
Echinodermata (larvae	0.2% (n=1)	0.0%	0.0%	
Evadne spp	11.1% (n=67)	33.3% (n=1)	<b>7.5%</b> (n=25)	20
Fritillaria spp	0.7% (n=4)	0.0%	0.3% (n=1)	20
Gastropoda (larvae/Limacina	0.0%	0.0%	15.2% (n=51)	
Hydrozoa (medusa	0.2% (n=1)	0.0%	8.1% (n=27)	
Oikopleura spp	0.0%	0.0%	0.3% (n=1)	
Oithona spp	11.6% (n=70)	33.3% (n=1)	0.6% (n=2)	10
Paracalanus spp	5.1% (n=31)	0.0%	0.6% (n=2)	
Podon/Pleopsis spp	0.7% (n=4)	0.0%	20.0% (n=67)	
Polychaeta (larvae	0.0%	0.0%	2.1% (n=7)	
Pseudocalanus spp		0.0%	0.0%	0
	$n \gtrsim 603$	Cyclopoida (u	Zooplankton (u	0 <sup>Inid</sup> )

Actual discarded Taxa



