

Use of SCN features: Yes  
Max learning objects: 20000 objects/class  
Strategy N° 6

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

Confusion Matrix – In percent of Actual Value

Classification Report Matrix  
max 20000 learning objects per class

Actual Values

Cirripedia (larvae)	70%	<1%	<1%	12%	<1%	9%		<1%	<1%	1%		<1%	<1%	<1%	<1%	<1%		<1%	<1%			<1%	<1%		<1%		<1%		
Acartia spp.	<1%	57%	<1%	<1%	<1%	1%	11%	4%	6%					<1%		<1%	<1%				<1%		17%	2%					
Oikopleura spp.	<1%	2%	66%	2%	19%	3%	<1%	<1%	<1%	<1%		<1%	<1%	<1%	<1%	2%				<1%	<1%	1%	<1%		1%		<1%	<1%	<1%
Podon/Pleopsis spp.	9%	1%	<1%	44%	<1%	31%	2%	2%	5%	2%		<1%	<1%	<1%		<1%	<1%					<1%	<1%		<1%		<1%		<1%
Fritillaria spp.	<1%	2%	21%		63%	1%	<1%	1%	<1%				1%		2%					<1%	7%			<1%		<1%	<1%		
Evadne spp.	5%		<1%	4%	<1%	75%	1%	<1%	2%	2%	<1%	<1%	6%		<1%						<1%			<1%		<1%			
Corycaeidae	<1%	17%	<1%	1%	<1%	1%	63%	2%	3%					2%		<1%		<1%			2%	4%			<1%	<1%			
Calanoida (ci-ciui)	11%	5%	<1%	14%	<1%	20%	11%	12%	5%			1%			3%						12%			2%		<1%	2%		
Paracalanus spp.	<1%	9%		1%	<1%	2%		3%	52%					1%								30%							
Gastropoda (larvae/Limacina)	2%	2%		17%		13%		2%	<1%	54%	6%						<1%				4%			<1%					
Bivalvia (larvae)				5%			1%			4%	81%		5%												2%			1%	
Polychaeta (larvae)	18%	5%		12%		17%	2%	2%		3%		26%			3%		5%					6%	2%						
Hydrozoa (medusa)		2%				4%		2%	2%			5%	75%		7%		2%					2%							
Centropages spp.		22%	2%		4%									42%			2%		4%			16%	8%						
Echinodermata (larvae)					2%	7%						2%	83%		2%		2%												
Calycophorae (nectophore)		3%										3%	3%	5%	73%		11%					3%							
Decapoda-brachyura (zoeae)		6%				3%		3%						9%	6%	62%	6%					3%							
Ctenophora (larvae)	3%			10%		19%				3%		19%	32%		3%		3%	3%							3%				
Decapoda-non brachyura (larvae)				4%		4%	4%					4%		4%		4%		65%					12%						
Ostracoda	8%			12%		36%	4%				28%								4%									8%	
Tortanus spp.	8%	4%	4%											33%	17%	4%	4%		21%		4%								
Ascidiaacea (larvae)			22%		17%															61%									
Oithona spp.		41%	6%		12%									6%								35%							
Pseudocalanus spp.																							100%						
Calanus spp.														17%			17%						67%						
Copepoda (nauplii)				25%																					75%				
Euphysa spp. (medusa)															100%														
Bryozoa (larvae)	100%																												

Predicted Values

Extra  
training  
classes

precision

recall

f1-score

Cirripedia (larvae) (n=3231-train=7685)	0.94	0.70	0.80
Acartia spp. (n=2290-train=20000)	0.88	0.57	0.69
Oikopleura spp. (n=1773-train=5305)	0.90	0.66	0.76
Podon/Pleopsis spp. (n=607-train=7347)	0.35	0.44	0.39
Fritillaria spp. (n=475-train=6992)	0.44	0.63	0.52
Evadne spp. (n=358-train=11064)	0.29	0.75	0.42
Corycaeidae (n=335-train=1760)	0.42	0.63	0.50
Calanoida (ci-ciui) (n=150-train=5557)	0.11	0.12	0.12
Paracalanus spp. (n=141-train=1619)	0.26	0.52	0.35
Gastropoda (larvae/Limacina) (n=126-train=3272)	0.48	0.54	0.51
Bivalvia (larvae) (n=96-train=3764)	0.84	0.81	0.83
Polychaeta (larvae) (n=65-train=1577)	0.33	0.26	0.29
Hydrozoa (medusa) (n=55-train=4052)	0.26	0.75	0.39
Centropages spp. (n=50-train=3620)	0.29	0.42	0.34
Echinodermata (larvae) (n=42-train=3043)	0.00	0.00	0.00
Calycophorae (nectophore) (n=37-train=966)	0.25	0.73	0.38
Decapoda-brachyura (zoeae) (n=32-train=628)	0.38	0.62	0.48
Ctenophora (larvae) (n=31-train=42)	0.50	0.03	0.06
Decapoda-non brachyura (larvae) (n=26-train=423)	0.50	0.65	0.57
Ostracoda (n=25-train=25)	0.50	0.04	0.07
Tortanus spp. (n=24-train=203)	0.56	0.21	0.30
Ascidiaacea (larvae) (n=23-train=861)	0.78	0.61	0.68
Oithona spp. (n=17-train=5881)	0.01	0.35	0.02
Pseudocalanus spp. (n=7-train=4845)	0.05	1.00	0.10
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
Harpacticoida- epibenthic (n=0-train=555)	-	-	-
Platyhelminthes/Nemertea (larvae) (n=0-train=183)	-	-	-
macro avg (corr)	0.37	0.46	0.35
weighted avg	0.76	0.62	0.67
	precision	recall	f1-score

1.0

0.8

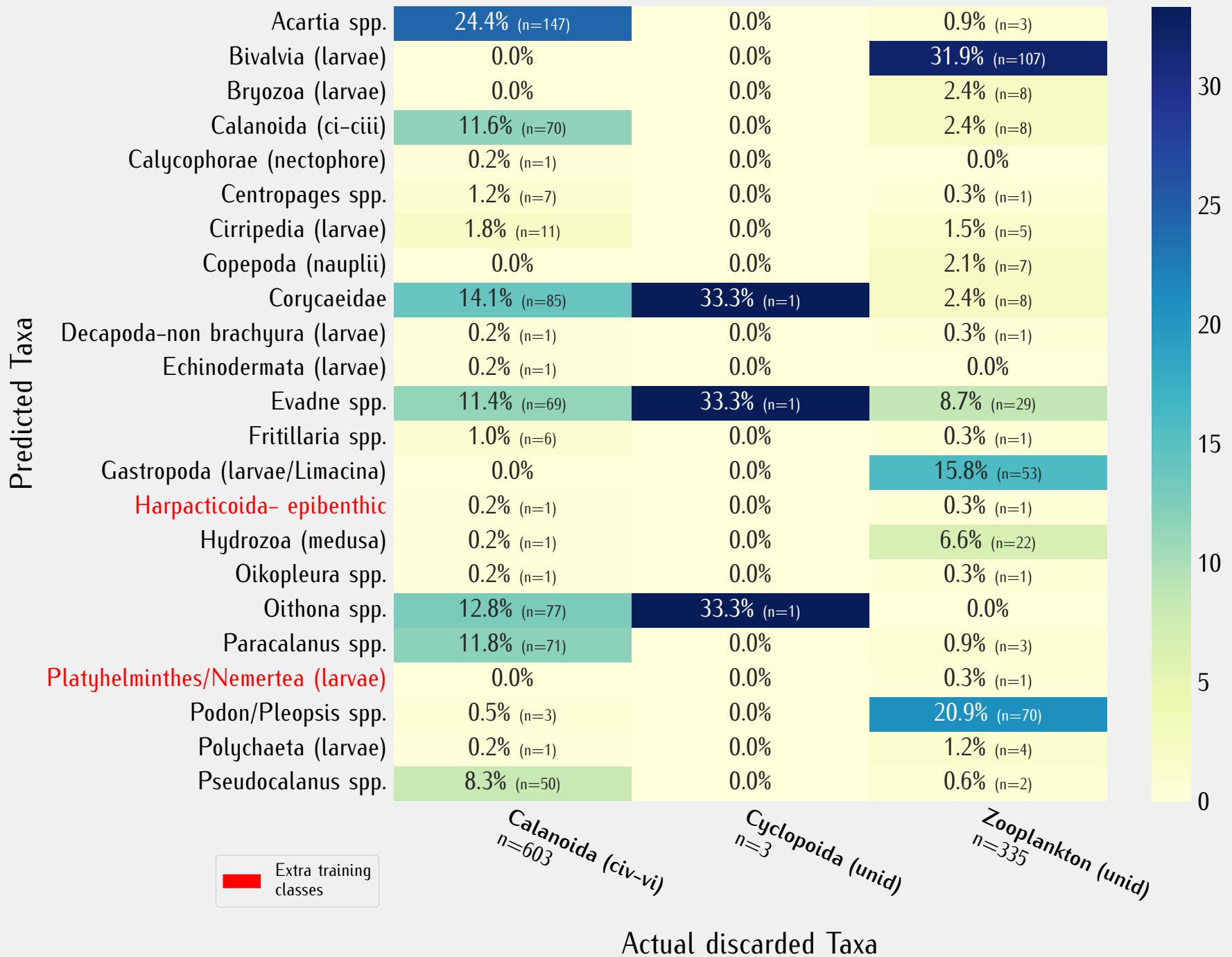
0.6

0.4

0.2

0.0

# Predictions of discarded taxa from training



Relative Abundance of Top Taxonomic Instances per Sample

