



ANEXO I:

ANEXO I. Lista de presença e ausência de táxons da comunidade fitoplanctônica no âmbito do monitoramento das comunidades planctônicas da BTP (entre dezembro 2010 e abril 2011).

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
Cyanophyceae						
<i>Anabaena solitaria</i>				X		20
<i>Anabaena</i> sp.			X			20
<i>Aphanizomenon/Anabaena</i>				X		20
<i>Arthrospira platensis</i>				X		20
<i>Chroococcus minor</i>				X	X	40
<i>Chroococcus minutus</i>				X		20
<i>Cylindrospermopsis</i> cf.	X	X	X	X	X	100
<i>Geitlerinema</i> sp.			X			20
<i>Geitlerinema unigranulatum</i>			X	X	X	60
<i>Limnothrix</i> sp.		X	X	X	X	80
<i>Leptolyngbia</i> sp.		X				20
<i>Merismopedia</i> sp.		X				20
<i>Microcystis</i> sp.				X		20
<i>Myxobactron</i> sp.	X	X	X			60
<i>Oscillatoria</i> sp. 1			X	X		40
<i>Oscillatoria</i> sp. 2			X			20
<i>Planktothrix agardhii</i>		X	X	X		60
<i>Planktothrix</i> sp.	X					20
<i>Planktothrix</i> cf. <i>pseudagardhii</i>			X		X	40
<i>Phormidium chlorinum</i>				X		20
<i>Phormidium</i> sp.		X	X	X	X	80
<i>Pseudanabaena</i> sp.	X	X	X			60
<i>Spirulina</i> cf. <i>subsalsa</i>				X		20
<i>Synechocystis</i> cf. <i>aquatilis</i>	X	X	X			60
<i>Synechococcus</i> cf. <i>nidulans</i>			X			20
<i>Synechococcus</i> sp.			X			20
Chlorophyceae						
<i>Actinastrum aciculare</i>				X		20
<i>Ankistrodesmus fusiformis</i>				X		20
<i>Asterococcus limneticus</i>			X	X	X	60
<i>Carteria</i> sp.			X	X	X	60
<i>Chlamydomonas debaryana</i>	X					20
<i>Chlamydomonas</i> cf. <i>epibiotica</i>			X	X	X	60
<i>Chlamydomonas</i> sp.					X	20

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Chlamydomonas</i> sp. 1		X				20
<i>Chlamydomonas</i> sp. 2	X					20
<i>Chlamydomonas planctogloea</i>		X	X	X	X	80
<i>Chlamydomonas sordida</i>				X		20
<i>Chlorella vulgaris</i>			X			20
<i>Chlorogonium fusiforme</i>	X		X			40
<i>Chloromonas pumilio</i>	X			X		40
<i>Chlorophyceae</i> 1	X	X				40
<i>Chlorophyceae</i> 2	X					20
<i>Chlorophyceae</i> 3	X					20
<i>Chlorophyceae</i> 4	X					20
<i>Chlorophyceae</i> 5	X					20
<i>Closteriopsis</i> sp.	X					20
<i>Closteriopsis acicularis</i>			X			20
<i>Coenochloris hindakii</i>				X		20
<i>Crucigenia</i> sp.	X					20
<i>Desmodesmus communis</i>		X				20
<i>Desmodesmus intermedius</i>					X	20
<i>Desmodesmus lefevrei</i>		X				20
<i>Desmodesmus</i> sp.	X					20
<i>Desmodesmus</i> sp. 2	X					20
<i>Desmodesmus quadricauda</i>				X	X	40
<i>Filamentosa estreita</i>				X		20
<i>Keratococcus suecicus</i>				X		20
<i>Kirchneriella lunaris</i>			X	X		40
<i>Monoraphidium arcuatum</i>			X	X		40
<i>Monoraphidium contortum</i>	X	X	X	X	X	100
<i>Monoraphidium circinale</i>		X	X			40
<i>Monoraphidium irregulare</i>	X	X				40
<i>Monoraphidium griffithii</i>			X		X	40
<i>Monoraphidium nanum</i>	X			X		40
<i>Monoraphidium tortile</i>				X		20
<i>Monoraphidium</i> sp. 1	X					20
<i>Nephroselmis minuta</i>		X				20
<i>Nephroselmis pyriformis</i>		X				20
<i>Nephroselmis rotunda</i>	X					20
<i>Pediastrum</i> sp.	X					20
<i>Pediastrum duplex</i>			X	X		40
<i>Pediastrum simplex</i>				X	X	40

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Pseudodidymocystis</i>				X		20
<i>Scenedesmus acuminatus</i>				X	X	40
<i>Scenedesmus</i> sp.		X	X		X	60
<i>Tetraselmis</i> sp.			X			20
<i>Tetrastrum triangulare</i>			X	X		40
<i>Tetrallantos lagerheimii</i>		X				20
Zygnemaphyceae						
<i>Closterium</i> sp.	X	X				40
<i>Staurastrum</i> sp.		X	X			40
<i>Staurastrum anatum</i> var.				X	X	40
<i>Staurastrum paradoxum</i> var.				X		20
<i>Staurastrum pseudotetracerum</i>				X		20
<i>Stauroidesmus cuspidatus</i>				X		20
<i>Stauroidesmus</i> sp.	X	X			X	60
Euglenophyceae						
<i>Euglena acus</i>				X	X	40
<i>Euglena polymorpha</i>	X	X				40
<i>Euglena</i> sp.				X	X	40
<i>Euglenophyceae</i> 1				X	X	40
<i>Eutreptiella hirudoidea</i>			X	X	X	60
<i>Monomorpha</i> sp.	X		X		X	60
<i>Phacus</i> sp.	X					20
<i>Trachelomonas volvocina</i>		X	X			40
Bacillariophyceae						
<i>Achnanthes</i> 1		X				20
<i>Amphora</i> sp.					X	20
<i>Asterionellopsis glacialis</i>			X	X		40
<i>Bacillariophyceae</i> 1			X			20
<i>Bacillaria paxillifera</i>		X			X	40
<i>Caloneis westii</i>			X			20
<i>Cocconeis</i> sp.	X					20
<i>Craticula ambigua</i>				X		20
<i>Cymatosira belgica</i>				X	X	40
<i>Cylindrotheca closterium</i>			X		X	40
<i>Diploneis aestuarii</i>					X	20
<i>Diploneis subovalis</i>					X	20
<i>Diploneis weissflogii</i>					X	20
<i>Ditylum</i> sp.	X					20
<i>Encyonema</i> sp.					X	20



Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Entomoneis</i> sp.			X	X		40
<i>Eolimna</i> sp.				X	X	40
<i>Eunotia</i> sp.			X	X	X	60
<i>Entomoneis</i> sp.					X	20
<i>Fallacia subforcipata</i>					X	20
<i>Fallacia</i> cf. <i>pygmea</i>				X		20
<i>Fallacia</i> sp.						
<i>Gomphonema</i> sp.			X	X		40
<i>Gyrosigma balticum</i>		X	X			40
<i>Gyrosigma sinense</i>			X			20
<i>Gyrosigma terryanum</i>					X	20
<i>Gyrosigma</i> sp. 1		X				20
<i>Gyrosigma</i> sp. 2		X	X			40
<i>Gyrosigma</i> sp. 3	X					20
<i>Haslea</i> cf. <i>trompii</i>			X			20
<i>Koizumia adaroi</i>			X			20
<i>Navicula</i> cf. <i>cryptocephala</i>	X					20
<i>Navicula cryptotenella</i>			X	X	X	60
<i>Navicula</i> cf. <i>erifuga</i>				X	X	40
<i>Navicula phylepta</i>					X	20
<i>Navicula</i> cf. <i>veneta</i>			X			20
<i>Navicula</i> sp.	X	X	X	X	X	100
<i>Naviculaceae</i> 1	X					20
<i>Nitzschia</i> cf. <i>longissima</i>	X	X	X			60
<i>Nitzschia longissima</i>					X	20
<i>Nitzschia palea</i>				X		20
<i>Nitzschia reversa</i>			X	X	X	60
<i>Nitzschia sigma</i>				X	X	40
<i>Nitzschia</i> sp. 1	X	X	X	X	X	100
<i>Nitzschia</i> sp. 2	X	X	X			60
<i>Nitzschia</i> sp. 3	X	X	X	X		80
<i>Nitzschia</i> sp. 4				X	X	40
<i>Nitzschia</i> sp. 5				X	X	40
<i>Petrodictyon gemma</i>			X			20
<i>Pleurosigma</i> sp. 1	X					20
<i>Pleurosigma</i> sp.				X		20
<i>Pleurosigma angulatum</i>		X				20
<i>Pleurosigma intermedium</i>				X		20
<i>Pleurosigma normanii</i>				X		20

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Pleurosigma salinarum</i>			X	X	X	60
<i>Pseudo-nitzschia delicatissima</i>				X	X	40
<i>Pseudo-nitzschia cf. heimii</i>				X	X	40
<i>Pseudo-nitzschia pungens</i>			X	X	X	60
<i>Pseudo-nitzschia cf. seriata</i>			X	X	X	60
<i>Pseudo-nitzschia turgidula</i>		X	X			40
<i>Pseudo-nitzschia sp.</i>					X	20
<i>Sellaphora sp.</i>				X	X	40
<i>Surirella sp.</i>	X		X	X	X	80
<i>Synedropsis cf. hyperborea</i>			X	X		40
<i>Tryblionella sp.</i>			X		X	40
<i>Tryblionella apiculata</i>				X	X	40
<i>Tryblionella levidensis</i>				X	X	40
<i>Ulnaria acus</i>				X		20
Fragilariophyceae						
<i>Asterionellopsis glacialis</i>					X	20
<i>Cymatosira cf. belgica</i>	X		X			40
<i>Fragilaria sp.</i>				X	X	40
<i>Lioloma pacificum</i>					X	20
<i>Thalassionema frauenfeldi</i>			X	X	X	60
<i>Thalassionema sp. 1</i>				X	X	40
<i>Thalassionema sp. 2</i>				X	X	40
<i>Thalassionema nitzschioides</i>	X	X	X	X	X	100
<i>Thalassiothrix longissima</i>					X	20
<i>Ulnaria ulna</i>					X	20
Coccinodiscophyceae						
<i>Actinoptychus campanulifer</i>	X	X		X	X	80
<i>Actinoptychus senarius</i>		X	X	X	X	80
<i>Aulacoseira ambigua var.</i>		X	X	X	X	80
<i>Aulacoseira ambigua var.</i>			X	X	X	60
<i>Aulacoseira ambigua var.</i>	X	X				40
<i>Aulacoseiragranulata var.</i>	X	X	X	X	X	100
<i>Aulacoseira granulata var.</i>		X	X	X	X	80
<i>Bacteriastrum delicatulum</i>					X	20
<i>Bacteriastrum hyalinum</i>					X	20
<i>Bellerochea sp.</i>				X		20
<i>Cêntrica filamentosa</i>	X					20
<i>Cerataulina sp.</i>				X		20
<i>Cerataulina sp. 2</i>					X	20

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Cerataulus smithii</i>					X	20
<i>Chaetoceros atlanticus</i>				X		20
<i>Chaetoceros cf. compressus</i>				X	X	40
<i>Chaetoceros cf. decipiens</i>			X	X	X	60
<i>Chaetoceros cf. dydimus</i>				X		20
<i>Chaetoceros cf. eibenii</i>					X	20
<i>Chaetoceros cf. lorenzianus</i>				X		20
<i>Chaetoceros cf. socialis</i>			X	X		40
<i>Chaetoceros sp.</i>	X					20
<i>Chaetoceros sp. 1</i>		X				20
<i>Chaetoceros sp. 2</i>		X				20
<i>Chaetoceros sp. 3</i>		X	X	X	X	80
<i>Chaetoceros sp. 4</i>		X		X		40
<i>Chaetoceros sp. 5</i>				X		20
<i>Chaetoceros sp. 6</i>				X	X	40
<i>Chaetoceros sp. 7</i>				X	X	40
<i>Chaetoceros sp. 8</i>					X	20
<i>Chaetoceros sp. 9</i>					X	20
<i>Chaetoceros sp. 10</i>					X	20
<i>Coscinodiscus argus</i>		X	X	X	X	80
<i>Coscinodiscus concinnus</i>					X	20
<i>Coscinodiscus granii</i>	X	X	X	X	X	100
<i>Coscinodiscus jonesianus</i>	X		X			40
<i>Coscinodiscus leptopus</i>	X					20
<i>Coscinodiscus marginatus</i>		X			X	40
<i>Coscinodiscus rothii</i>			X			20
<i>Coscinodiscus sp.</i>					X	20
<i>Cyclotella cf. litoralis</i>		X		X		40
<i>Cyclotella litoralis</i>					X	20
<i>Cyclotella sp.</i>	X			X	X	60
<i>Cyclotella meneghiniana</i>			X			20
<i>Cyclotella striata</i>	X					20
<i>Cyclotella stylum</i>	X	X	X	X	X	100
<i>Cylindrotheca cf. closterium</i>			X	X		40
<i>Cylindrotheca closterioides</i>		X				20
<i>Cylindrotheca sp. 1</i>		X	X			40
<i>Diatomácea filamentosa</i>				X		20
<i>Dactyliosolen cf. antarcticus</i>				X		20
<i>Dactyliosolen fragilissimus</i>				X		20

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Ditylum</i> sp.				X		20
<i>Ditylum</i> sp. 1		X				20
<i>Ditylum</i> sp. 2		X				20
<i>Ditylum</i> sp. 3		X				20
<i>Ditylum</i> sp. 4		X				20
<i>Ditylum</i> cf. <i>brighwetellii</i>			X	X		40
<i>Ditylumbrighwetellii</i>					X	20
<i>Eucampia</i> sp 1		X				20
<i>Eucampia</i> sp 2		X				20
<i>Eupodiscus radiatus</i>		X				20
<i>Guinardia</i> sp.			X	X	X	60
<i>Guinardia striata</i>					X	20
<i>Hemiaulus hauckii</i>			X			20
<i>Hemiaulus</i> cf. <i>indicus</i>			X			20
<i>Hemiaulus indicus</i>					X	20
<i>Hemiaulus</i> sp.		X	X	X	X	80
<i>Hemiaulus sinensis</i>					X	20
<i>Leptocylindrus</i> sp.					X	20
<i>Melosira</i> sp 1			X	X		40
<i>Melosira moniliformis</i> var.					X	20
<i>Melosira nummuloides</i>	X		X	X		60
<i>Melosira varians</i>		X	X	X	X	80
<i>Odontella aurita</i>		X				20
<i>Odontella longicuris</i>				X		20
<i>Odontella mobiliensis</i>			X	X	X	60
<i>Odontella rhombus</i>			X	X	X	60
<i>Odontella</i> sp. 1		X				20
<i>Orthoseira</i> sp.	X					20
<i>Paralia sulcata</i>	X	X	X	X	X	100
<i>Podosira</i> sp.			X			20
<i>Rhizosolenia pungens</i>		X			X	40
<i>Rhizosolenia setigera</i>					X	20
<i>Skeletonema</i> sp.		X		X		40
<i>Skeletonema</i> sp. 1					X	20
<i>Skeletonema</i> sp. 2					X	20
<i>Skeletonema costatum</i>		X	X	X	X	80
<i>Thalassiosira</i> sp. 1		X	X			40
<i>Thalassiosira</i> sp. 2		X	X			40
<i>Thalassiosira cedarkeyensis</i>				X		20

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Thalassiosira excentrica</i>			X	X	X	60
<i>Thalassiosira cf. nodulolineata</i>			X	X	X	60
<i>Thalassiosira nordenskiöldii</i>				X		20
<i>Thalassiosira cf. rudis</i>		X	X	X	X	80
<i>Thalassiosira punctigera</i>				X	X	40
<i>Thalassiosira sp. 1</i>				X	X	40
<i>Thalassiosira sp. 2</i>				X	X	40
<i>Thalassiosira sp. 3</i>				X	X	40
<i>Thalassiosira sp. 4</i>					X	20
<i>Thalassiosira tenera</i>	X	X	X	X	X	100
<i>Triceratium favus var. favus</i>	X	X	X			60
Cryptophyceae						
<i>Cryptomonas brasiliensis</i>		X	X	X	X	80
<i>Cryptomonas erosa</i>			X			20
<i>Cryptomonas obovata</i>	X	X				40
<i>Cryptomonas parapyrenoidifera</i>				X	X	40
<i>Cryptomonas platyrris</i>				X		20
<i>Cryptomonas sp.</i>		X				20
<i>Cryptomonas sp. 1</i>	X					20
<i>Cryptomonas sp. 2</i>	X					20
<i>Cryptomonas sp. 3</i>	X					20
<i>Chroomonas sp. 4</i>			X			20
<i>Cryptophyceae 1</i>	X	X	X			60
<i>Geminifera sp. 1</i>	X					20
<i>Geminifera sp. 2</i>	X					20
<i>Hemiselmis sp.</i>	X					20
<i>Hemiselmis virescens</i>			X	X		40
<i>Rhinomonas fulva</i>	X		X	X	X	80
<i>Teleaulax acuta</i>	X	X	X	X		80
<i>Teleaulax sp.</i>				X		20
Chrysophyceae						
<i>Chormulina elegans</i>			X	X	X	60
<i>Chormulina sp.</i>	X	X				40
<i>Chormulina sp. 1</i>				X	X	40
<i>Chormulina sp. 2</i>				X	X	40
<i>Chormulina sp. 3</i>					X	20
<i>Chrysococcus sp.</i>	X					20
<i>Chrysophyceae 1</i>	X	X				40
<i>Chrysophyceae 2</i>	X					20

Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
<i>Chrysophyceae 6</i>				X		20
<i>Ochromonas minima</i>	X					20
<i>Ochromonas sp. 2</i>	X		X			40
<i>Ochromonas sp. 1</i>	X	X	X	X	X	100
<i>Sarcinochrysis marina</i>			X	X		40
Dinophyceae						
<i>Alexandrium affine</i>					X	20
<i>Alexandrium sp.</i>				X	X	40
<i>Alexandrium cf. fraterculus</i>			X	X	X	60
<i>Alexandrium cf. ostenfeldii</i>					X	20
<i>Ceratium furca</i>		X	X	X		60
<i>Ceratium fusus</i>			X	X	X	60
<i>Dictyocha crux</i>				X	X	40
<i>Dinophyceae 1</i>	X	X	X			60
<i>Dinophyceae 2</i>	X	X	X			60
<i>Dinophyceae 3</i>	X	X				40
<i>Goniaulax sp.</i>		X			X	40
<i>Goniaulax cf. spinifera</i>			X	X	X	60
<i>Goniaulax cf. polygramma</i>			X			20
<i>Gymnodinium sp.</i>	X	X	X			60
<i>Herdmania litoralis</i>				X	X	40
<i>Peridiniopsis sp.</i>	X	X				40
<i>Peridinium sp. 1</i>	X	X				40
<i>Peridinium cf. subinermis</i>			X			20
<i>Protoperdinium cf. brevipes</i>				X		20
<i>Protoperdinium cf. conicum</i>			X			20
<i>Protoperdinium sp.</i>	X	X		X		60
<i>Protoperdinium latissimum</i>		X				20
<i>Protoperdinium pellucidum</i>				X		20
<i>Scrippsiella trochoidea</i>	X	X			X	60
Desconhecida						
Desconhecida 1			X	X	X	60
Desconhecida 3			X			20
Desconhecida 2			X			20
Filamentosa 1				X		20
Filamentosa 2				X	X	40
Fitoflagelada						
Fitoflagelada 1			X	X	X	60
Fitoflagelada 2			X	X	X	60



Divisão Taxonômica	Campanhas					Frequência Relativa (%)
	dez/10	jan/11	fev/11	mar/11	abr/11	
Fitoflagelada 3			X	X	X	60
Fitoflagelada 4				X		20
Prasinophyceae						
<i>Micromonas pusilla</i>		X	X			40
<i>Tetraselmis coração</i>			X			20
<i>Tetraselmis</i> sp.			X			20
<i>Tetraselmis</i> sp. 1				X	X	40
<i>Tetraselmis</i> cf. <i>tetrathele</i>		X		X	X	60
Prymnesiophyceae						
<i>Diacronema</i> cf. <i>vlkianum</i>	X	X	X			60
<i>Prymnesium</i> sp.		X	X			40
Xantophyceae						
<i>Isthmochloron</i> sp.				X	X	40
<i>Xantophyceae</i> 1		X				20
<i>Xanthidium</i> sp.		X	X			40