Supplementary Table 1. Functional traits of phytoplankton taxa found in analyzed samples

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| --- | --- | --- | --- | --- | --- | --- | --- |
| Species | Size as particle | Shape as particle | Toxicity | Motility | Armor | Spines | Reference |
| *Anabaena flos-aquae* | 35.00 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Aphanizomenon flos-aquae* | 54.34 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Aphanizomenon issatschenkoi* | 40.00 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Aphanizomenon* sp. | 52.50 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Aphanocapsa* sp. | 11.67 | spherical colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Chroococcus* sp. | 10.00 | spherical colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Gleocapsa sp.* | 4.00 | spherical colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Gomphosphaeria sp.* | 8.25 | spherical colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Merismopedia tenuissima* | 1.00 | flat colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Microcystis aeruginosa* | 26.75 | spherical colony | toxic | non motile | armorless | spineless | 1–3 |
| *Microcystis* sp. | 15.67 | spherical colony | toxic | non motile | armorless | spineless | 1–3 |
| *Microcystis viridis* | 5.00 | spherical colony | toxic | non motile | armorless | spineless | 1–3 |
| *Microcystis wesenbergii* | 15.71 | spherical colony | toxic | non motile | armorless | spineless | 1–3 |
| *Oscillatoria* sp. | 65.80 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Oscillatoria tenuis* | 55.00 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Planktothrix* | 90.00 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Planktothrix aghardii* | 49.00 | filament | toxic | non motile | armorless | spineless | 1–3 |
| *Snowella lacustris* | 8.50 | spherical colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Snowella sp.* | 7.63 | spherical colony | non toxic | non motile | armorless | spineless | 1–3 |
| *Woronichinia naegeliana* | 7.00 | spherical colony | toxic | non motile | armorless | spineless | 1–3 |
| *Dinobryon* sp. | 10.00 | spherical colony | non toxic | motile | armored | spineless | 4 |
| *Achnanthes* sp. | 8.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Amphora* sp. | 12.38 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Asterionella formosa* | 11.00 | circular colony | non toxic | non motile | armored | spineless | 5 |
| *Aulacoseira granulata* | 4.57 | filament | non toxic | non motile | armored | spines | 5 |
| *Aulacoseira* sp. | 4.45 | filament | non toxic | non motile | armored | spines | 5 |
| *Coscinodiscus* | 15.00 | discoid | non toxic | non motile | armored | spineless | 5 |
| *Cyclotella* sp. | 5.20 | discoid | non toxic | non motile | armored | spineless | 5 |
| *Cymatopleura* sp. | 13.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Cymbella* sp. | 17.60 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Diatoma vulgare* | 10.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Gyrosigma* sp. | 34.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Melosira* sp. | 4.00 | filament | non toxic | non motile | armored | spineless | 5 |
| *Melosira varians* | 7.50 | filament | non toxic | non motile | armored | spineless | 5 |
| *Navicula* sp. | 12.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Nitzschia* sp. | 38.81 | discoid | non toxic | non motile | armored | spineless | 5 |
| *Pinnularia* sp. | 30.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Rhoicosphenia curvata* | 6.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Stephanodiscus hantzschii* | 3.50 | discoid | non toxic | non motile | armored | spineless | 5 |
| *Surirella* sp. | 10.00 | cylindric | non toxic | non motile | armored | spineless | 5 |
| *Synedra acus* | 2.00 | spindle | non toxic | non motile | armored | spineless | 5 |
| *Synedra* sp. | 52.00 | spindle | non toxic | non motile | armored | spineless | 5 |
| *Cryptomonas* sp. | 6.00 | ellipsoid | non toxic | motile | armorless | spineless | 6,7 |
| *Rhodomonas* sp. | 5.00 | ellipsoid | non toxic | motile | armorless | spineless | 6,7 |
| *Ceratium hirundinella* | 27.69 | double cone | non toxic | motile | armored | horns | 6 |
| *Peridinium* sp. | 10.57 | ellipsoid | non toxic | motile | armored | spines | 6 |
| *Peridiniopsis sp.* | 6.00 | ellipsoid | non toxic | motile | armored | spines | 6 |
| *Euglena* *acus* | 60.00 | spindle | non toxic | motile | armorless | spineless | 8 |
| *Euglena oxyuris* | 38.00 | spindle | non toxic | motile | armorless | spineless | 8 |
| *Euglena* sp. | 19.67 | spindle | non toxic | motile | armorless | spineless | 8 |
| *Euglena texta* | 10.00 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Lepocinclis* sp. | 15.00 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Phacus acuminatus* | 8.00 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Phacus caudatus* | 13.25 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Phacus curvicauda* | 10.00 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Phacus longicauda* | 21.50 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Phacus monilatus* | 7.20 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Phacus* sp. | 14.69 | ellipsoid | non toxic | motile | armorless | spineless | 8 |
| *Trachelomonas armata* | 8.00 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Trachelomonas hispida* | 5.00 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Trachelomonas nigra* | 5.50 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Trachelomonas oblonga* | 6.25 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Trachelomonas planctonica* | 5.83 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Trachelomonas* sp. | 4.90 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Trachelomonas volvocina* | 4.46 | ellipsoid | non toxic | motile | armored | spineless | 8 |
| *Botryococcus braunii* | 12.56 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Characium* sp. | 30.00 | ellipsoid | non toxic | non motile | armorless | spineless | 9 |
| *Coelastrum microporum* | 7.50 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Coelastrum* *reticulatum* | 6.00 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Coelastrum* *sp.* | 6.56 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Coenocystis* sp. | 2.00 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Crucigenia apiculata* | 1.87 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Crucigenia tetrapedia* | 1.91 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Crucigeniella apiculata* | 2.21 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Desmodesmus opoliensis* | 6.00 | cylindric colony | non toxic | non motile | armorless | spines | 9 |
| *Desmodesmus* sp. | 5.41 | cylindric colony | non toxic | non motile | armorless | spines | 9 |
| *Dictyosphaerium pulchellum* | 9.00 | spherical colony | non toxic | non motile | armorless | spineless | 9 |
| *Lagerheimia ciliata* | 4.50 | ellipsoid | non toxic | non motile | armorless | spines | 9 |
| *Monoraphidium* sp. | 45.00 | spindle | non toxic | non motile | armorless | spineless | 9 |
| *Nephrocytium* sp. | 5.00 | ellipsoid | non toxic | non motile | armorless | spineless | 9 |
| *Oocystis* sp. | 3.29 | ellipsoid | non toxic | non motile | armorless | spineless | 9 |
| *Pediastrum biradiatum* | 6.30 | flat colony | non toxic | non motile | armorless | spineless | 9 |
| *Pediastrum boryanum* | 10.31 | flat colony | non toxic | non motile | armorless | spineless | 9 |
| *Pediastrum duplex* | 11.48 | flat colony | non toxic | non motile | armorless | spineless | 9 |
| *Pediastrum simplex* | 12.16 | flat colony | non toxic | non motile | armorless | spineless | 9 |
| *Pediastrum tetras* | 6.63 | flat colony | non toxic | non motile | armorless | spineless | 9 |
| *Phacotus lendneri* | 5.06 | ellipsoid | non toxic | motile | armored | spineless | 9 |
| *Scenedesmus acuminatus* | 6.63 | cylindric colony | non toxic | non motile | armorless | spineless | 9 |
| *Scenedesmus ecornis* | 13.33 | cylindric colony | non toxic | non motile | armorless | spineless | 9 |
| *Scenedesmus* sp. | 5.41 | cylindric colony | non toxic | non motile | armorless | spineless | 9 |
| *Schroederia setigera* | 15.00 | spindle | non toxic | non motile | armorless | spineless | 9 |
| *Tetraedron caudatum* | 3.50 | cone | non toxic | non motile | armorless | spineless | 9 |
| *Tetraedron minimum* | 2.00 | cone | non toxic | non motile | armorless | spineless | 9 |
| *Tetrastrum staurogeniaeforme* | 4.00 | cone | non toxic | non motile | armorless | spines | 9 |
| *Closterium aciculare* | 39.00 | spindle | non toxic | non motile | armorless | spineless | 10 |
| *Closterium acutum* | 35.00 | spindle | non toxic | non motile | armorless | spineless | 10 |
| *Closterium gracile* | 32.00 | spindle | non toxic | non motile | armorless | spineless | 10 |
| *Closterium sp* | 60.00 | spindle | non toxic | non motile | armorless | spineless | 10 |
| *Cosmarium* sp. | 6.20 | ellipsoid | non toxic | non motile | armorless | spineless | 10 |
| *Staurastrum gracile* | 3.19 | ellipsoid | non toxic | non motile | armorless | spines | 10 |
| *Staurastrum planctonicum* | 2.00 | ellipsoid | non toxic | non motile | armorless | spines | 10 |
| *Staurastrum* sp. | 3.25 | ellipsoid | non toxic | non motile | armorless | spines | 10 |

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