623-2010 (78-010) Fieldmaster Secchi Disk

Limnological, 200 mm

Introduction:

Need to determine how clear the water is? Seeing may not be believing. Measure the turbidity or degree of visibility of the water you're testing with our limnological secchi disk.

With our professional equipment, you'll leave nothing to chance. Results are meaningless if they're not repeatable and can't be compared with the results of others.

Our secchi disk, therefore, meets the standards established by the sampling industry. Defined to be 200 mm (7-7/8") in diameter, it has four quadrants, two white and two black.

Purpose:

To give an indication of transparency or index of suspended matter in the water. The smaller the number (5 feet, for example) the more suspended materials in the water.

Can also be used to determine the depth of light penetration and a rough estimate of the extent of the littoral zone.

It may also be used as a sounding line and weight to measure the depth of the water at any given point.

How To Use:

1. Use in shallow water in a shaded location. For fresh water use.
2. Calibrate your line.We recommend using two different colored permanent markers, one for meters, one for half meters. Make sure the first 1/2 m marking is **exactly** 1/2 m from the black and white surface.
3. Tie the included line securely to the eyebolt attached to the disk. [If using an already marked line, tie so that the first half-meter mark is one half meter from the disk face.] *See knot on Page 2.*
4. Lower the disk until you are no longer able to distinguish between the black and white quadrants.
5. Count the marks on the line as it's being lowered and make a depth reading at this point. This reading or index is the depth of the disk as indicated by the marks on your line. Lower it further until it is completely out of sight and then begin to raise it slowly.
6. When you've reached the point where you can just distinguish between the black and white quadrants, take another reading.
7. Repeat three times, recording each reading.
8. Calculate the average of all three readings to determine your final average. This is the proper Secchi Disk reading or index.

Maintenance:

Fieldmaster® Equipment is designed to be used for year after year, class after class. Simply follow these commonsense precautions. All aquatic samplers should be rinsed in fresh water after each day's use, then air dried completely. The line should be washed and hung out loosely to dry in the open air. When dry, you can store all samplers in their closed position or in their carrying case. Store in a clean, dry place only. This will help ensure a clean sampler at the start of the next sampling session.

Specifications:

Secchi Disk:

200 mm (7-7/8") diameter plastic disk with four quadrants, two white and two black. Includes an attached stainless steel eye bolt and weight fastened to the underside.

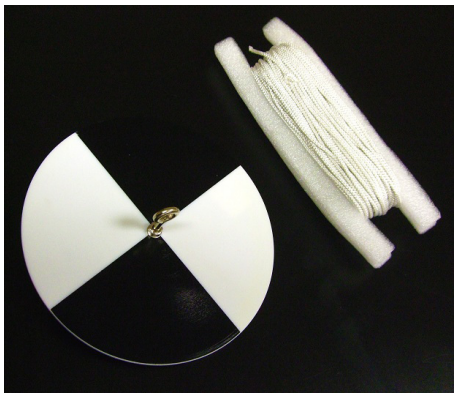
Braided Polyester Line:

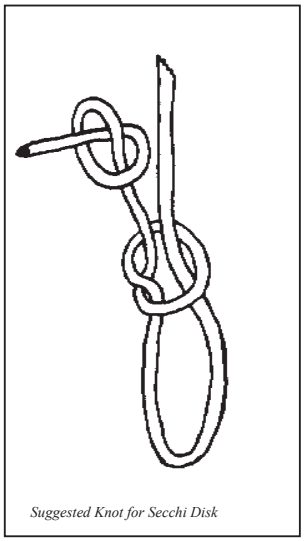
20 meters, uncalibrated, with plastic winding float. Less stretch than nylon and more wear than twisted line makes it a perfect choice for students. Stretches less than 5% and remains strong even if it frays.

The Fieldmaster® Secchi Disk has been extensively field-tested by students of Dr. Terry Richardson, Professor of Biology, University of North Alabama, one of the designers of the well-regarded Ogeechee Corer. Dr. Richardson states this school version of the industry standard is fully acceptable and yields reliable data under a variety of weather and water conditions.

Beware: Any other shapes, sizes and colors are not true Secchi Disks. Any index obtained is not usable and cannot be compared with prior data.

The smaller the index - 5', for example - the more suspended material there is. The water is less transparent with a lower degree of visibility.





Suggested Knot for Secchi Disk

Accessories:

7900-A12 Polyester line and Float:
Order if additional line is needed

Warranty and Parts:

We replace all missing or defective parts free of charge. For additional parts, use part numbers above. We accept Mastercard, Visa, American Express, checks, institutional P.O.'s. All products guaranteed free from defect for 90 days. This guarantee does not include accident, misuse, or normal wear and tear.

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