

# Harmful Algae Report

Delaware Inland Bays Citizen Monitor Program

All data from 6/14/03

| Water Body             | Tributary           | Site   | Date    | Name                                  | Comment if ID uncertain | Abundance | MCL  |
|------------------------|---------------------|--|---------|---------------------------------------|-------------------------|-----------|------|
| <b>Assawoman Bay</b>   |                     |  |         |                                       |                         |           |      |
|                        | <u>Roy Creek</u>    |  |         |                                       |                         |           |      |
|                        |                     | BA01: Keenwick on Bay, Roy Creek               | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |      |
|                        |                     | BA02: Keenwick Sound, entrance to canal system | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Common    | 0.15 |
|                        |                     |  | 6/16/03 | <i>Amphidinium sp. (T)</i>            |                         | Present   |      |
|                        |                     |  | 6/16/03 | <i>Heterocapsa rotundata (B)</i>      |                         | Present   |      |
|                        |                     |  | 6/16/03 | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |      |
| <b>Assawoman Canal</b> |                     |  |         |                                       |                         |           |      |
|                        |                     | IR50: Assawoman Canal at N end, marina dock    | 6/18/03 | <i>Akashiwo sanguineum (B)</i>        |                         | Present   |      |
|                        |                     |  | 6/18/03 | <i>Gyrodinium instriatum (B)</i>      |                         | Present   |      |
|                        |                     |  | 6/18/03 | <i>Heterosigma akashiwo. (T)</i>      |                         | Common    | 0.10 |
|                        |                     |  | 6/18/03 | <i>Prorocentrum minimum (T)</i>       |                         | Present   |      |
| <b>Indian River</b>    |                     |  |         |                                       |                         |           |      |
|                        |                     | IR04: Warwick Cove                             | 6/16/03 | <i>Chaetoceros sp. (T)</i>            |                         | Common    | 0.20 |
|                        |                     |  | 6/16/03 | <i>Prorocentrum minimum (T)</i>       |                         | Present   |      |
|                        |                     | IR07: Holt's Landing State Park                | 6/18/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10-15 um Clr            | Present   |      |
|                        |                     | IR11: Big Ditch Point                          | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10-15 um Clr            | Present   |      |
|                        |                     | IR36B: James Farm, Pasture Point               | 6/15/03 | <i>"Gymnodinioid" sp. (S)</i>         | 20 um Clr               | Present   |      |
|                        |                     |  | 6/15/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |      |
|                        |                     |  | 6/15/03 | <i>Chaetoceros sp. (T)</i>            |                         | Common    | 0.10 |
|                        |                     | IRB5W: shellfish site, upper Indian River Bay  | 6/17/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |      |
|                        |                     |  | 6/17/03 | <i>Chaetoceros sp. (T)</i>            |                         | Common    |      |
|                        | <u>Pepper Creek</u> |  |         |                                       |                         |           |      |
|                        |                     | IP2S: DNREC site, upper Pepper Creek           | 6/17/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10-15 um Grn            | Present   |      |
|                        |                     |  | 6/17/03 | <i>Chaetoceros sp. (T)</i>            |                         | Common    | 0.22 |
|                        |                     |  | 6/17/03 | <i>Gyrodinium instriatum (B)</i>      |                         | Common    | 0.31 |
|                        |                     |  | 6/17/03 | <i>Kryptoperidium foliaceum-2 (B)</i> |                         | Present   |      |
|                        | <u>White Creek</u>  |  |         |                                       |                         |           |      |
|                        |                     | IR32: Holly Terrace Acres                      | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |      |
|                        |                     |  | 6/16/03 | <i>Chaetoceros sp. (T)</i>            |                         | Present   |      |
|                        |                     |  | 6/16/03 | <i>Dinophysis sp. (T)</i>             |                         | Present   | 0.02 |
|                        |                     |  | 6/16/03 | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |      |

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|-------------------------------|--------------------|---|---------|---------------------------------------|-------------------------|-----------|-------|
| <b>Indian River</b>           |                    |   |         |                                       |                         |           |       |
|                               | <u>White Creek</u> |   |         |                                       |                         |           |       |
|                               |                    | IR32: Holly Terrace Acres   |         |                                       |                         |           |       |
|                               |                    |   | 6/16/03 | <i>Kryptoperidium foliaceum-1 (B)</i> |                         | Present   |       |
|                               |                    |   | 6/16/03 | <i>Prorocentrum minimum (T)</i>       |                         | Present   |       |
| <b>Lewes - Rehoboth Canal</b> |                    |   |         |                                       |                         |           |       |
|                               |                    | RB02: Lewes - Rehoboth Canal at Lewes                                     |         |                                       |                         |           |       |
|                               |                    |   | 6/24/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |       |
|                               |                    |   | 6/24/03 | <i>Heterocapsa rotundata (B)</i>      |                         | Common    |       |
|                               |                    |   | 6/24/03 | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |       |
|                               |                    | RB45: Lewes-Rehoboth Canal - Rehoboth                                     |         |                                       |                         |           |       |
|                               |                    |   | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10 um Grn               | Present   |       |
|                               |                    |   | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Common    | 0.20  |
|                               |                    |   | 6/16/03 | <i>Chaetoceros sp. (T)</i>            |                         | Present   |       |
|                               |                    |   | 6/16/03 | <i>Dinophysis sp. (T)</i>             |                         | Present   | 0.01  |
|                               |                    |   | 6/16/03 | <i>Heterocapsa rotundata (B)</i>      |                         | Common    | 0.10  |
| <b>Little Assawoman Bay</b>   |                    |   |         |                                       |                         |           |       |
|                               |                    | LA2S: DNREC site in the Little Assawoman Bay; surface sample              |         |                                       |                         |           |       |
|                               |                    |   | 6/24/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Common    | 0.25  |
|                               |                    |   | 6/24/03 | <i>Dinophysis acuminata (T)</i>       |                         | Present   | 0.01  |
|                               |                    |   | 6/24/03 | <i>Scrippsiella sp. (B)</i>           |                         | Present   | 0.01  |
|                               |                    | LA41: Coastal Kayaks, knee deep wading sample                             |         |                                       |                         |           |       |
|                               |                    |   | 6/19/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10-15 um Clr            | Present   | 0.10  |
|                               |                    |   | 6/19/03 | <i>Dinophysis acuminata (T)</i>       |                         | Present   | 0.00  |
|                               |                    |   | 6/19/03 | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |       |
|                               |                    | LA42: Narrows Beach, off of Rt. 1 south of South Bethany knee deep wading |         |                                       |                         |           |       |
|                               |                    |   | 6/19/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10-15 um Clr            | Present   |       |
|                               |                    |   | 6/19/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |       |
|                               |                    | <u>Dirickson Creek</u>  |         |                                       |                         |           |       |
|                               |                    | LA03: Mulberry Landing  |         |                                       |                         |           |       |
|                               |                    |   | 6/16/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |       |
|                               |                    | LA20: Swann Keys: boat ramp at S end of Blue Teal Rd                      |         |                                       |                         |           |       |
|                               |                    |   | 6/18/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   |       |
|                               |                    |   | 6/18/03 | <i>"Gymnodinioid" sp. (S)</i>         | 10 um Clear             | Present   |       |
|                               |                    |   | 6/18/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15 um Amb               | Present   |       |
|                               |                    |   | 6/18/03 | <i>Chattonella subsalsa (T)</i>       |                         | Present   |       |
|                               |                    |   | 6/18/03 | <i>Gyrodinium instriatum (B)</i>      |                         | Common    | 0.15  |
|                               |                    |   | 6/18/03 | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |       |
|                               |                    | LA6S: DNREC site downstream from bridge at road 381; surface sample       |         |                                       |                         |           |       |
|                               |                    |   | 6/24/03 | <i>"Gymnodinioid" sp. (S)</i>         | 15-25 um Grn            | Present   | 0.01  |
|                               |                    |   | 6/24/03 | <i>Gyrodinium uncatenum (B)</i>       |                         | Present   | 0.01  |
|                               |                    |   | 6/24/03 | <i>Kryptoperidium foliaceum-1 (B)</i> |                         | Present   | 0.01  |
|                               |                    | <u>Jefferson Creek</u>  |         |                                       |                         |           |       |
|                               |                    | SB10E: SB: Russell Canal east dead end                                    |         |                                       |                         |           |       |
|                               |                    |   | 6/14/03 | <i>Gyrodinium instriatum (B)</i>      |                         | Present   |       |
|                               |                    |   | 6/14/03 | <i>Pleurochrysis carterae (B)</i>     |                         | Abundant  | 24.70 |

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|-----------------------------|-----------|--------|--|---------------------------------------|-------------------------|-----------|-------|
| <b>Little Assawoman Bay</b> |           |        |  |                                       |                         |           |       |
| <u>Jefferson Creek</u>      |           |        |  |                                       |                         |           |       |
|                             |           | SB10E: | SB: Russell Canal east dead end                                    |                                       |                         |           |       |
|                             |           |        | 6/19/03  | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |       |
|                             |           | SB10W: | SB: Russell Canal west dead end                                    |                                       |                         |           |       |
|                             |           |        | 6/14/03  | <i>"Gymnodinoid" sp. (S)</i>          | 15-25 um Grn            | Present   |       |
|                             |           |        | 6/14/03  | <i>"Gymnodinoid" sp. (S)</i>          | 20 um Clr               | Present   |       |
|                             |           |        | 6/14/03  | <i>Gyrodinium instriatum (B)</i>      |                         | Present   |       |
|                             |           |        | 6/14/03  | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |       |
|                             |           |        | 6/14/03  | <i>Kryptoperidium foliaceum-1 (B)</i> |                         | Present   |       |
|                             |           |        | 6/14/03  | <i>Kryptoperidium foliaceum-2 (B)</i> |                         | Present   |       |
|                             |           |        | 6/19/03  | <i>"Gymnodinoid" sp. (S)</i>          | 15-25 um Grn            | Present   |       |
|                             |           |        | 6/19/03  | <i>Pleurochrysis carterae (B)</i>     |                         | Abundant  | 54.40 |
| <u>Miller Creek</u>         |           |        |  |                                       |                         |           |       |
|                             |           | LA5S:  | DNREC site near Sassafras landing; surface sample                  |                                       |                         |           |       |
|                             |           |        | 6/24/03  | <i>"Gymnodinoid" sp. (S)</i>          | 15-25 um Grn            | Common    | 0.38  |
|                             |           |        | 6/24/03  | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   | 0.01  |
|                             |           |        | 6/24/03  | <i>Kryptoperidium foliaceum-1 (B)</i> |                         | Present   | 0.01  |
| <b>Rehoboth Bay</b>         |           |        |  |                                       |                         |           |       |
|                             |           | RB07:  | West Bay Park  |                                       |                         |           |       |
|                             |           |        | 6/16/03  | <i>Chaetoceros sp. (T)</i>            |                         | Common    | 0.50  |
|                             |           |        | 6/16/03  | <i>Dinophysis sp. (T)</i>             |                         | Present   | 0.01  |
|                             |           | RB50:  | Delaware Seashore State Park at New Road; knee deep wading sample. |                                       |                         |           |       |
|                             |           |        | 6/25/03  | <i>Dinophysis acuminata (T)</i>       |                         | Present   | 0.01  |
|                             |           | RB52B: | NE of Marsh Island, western Rehoboth Bay                           |                                       |                         |           |       |
|                             |           |        | 6/23/03  | <i>Dinophysis acuminata (T)</i>       |                         | Present   | 0.01  |
|                             |           | RB53B: | Off Country Club near seasonal shell fish buoy                     |                                       |                         |           |       |
|                             |           |        | 6/23/03  | <i>Dinophysis acuminata (T)</i>       |                         | Present   | 0.02  |
|                             |           | RB54:  | Savage Ditch, knee deep wading sample.                             |                                       |                         |           |       |
|                             |           |        | 6/25/03  | <i>Dinophysis acuminata (T)</i>       |                         | Not Found |       |
| <u>Arnell Creek</u>         |           |        |  |                                       |                         |           |       |
|                             |           | AC2S:  | DNREC Site, Arnell Creek, surface sample                           |                                       |                         |           |       |
|                             |           |        | 6/17/03  | <i>"Gymnodinoid" sp. (S)</i>          | 15 um Grn               | Common    |       |
|                             |           |        | 6/17/03  | <i>Chaetoceros sp. (T)</i>            |                         | Many      |       |
|                             |           |        | 6/17/03  | <i>Prorocentrum minimum (T)</i>       |                         | Present   |       |
| <u>Guinea Creek</u>         |           |        |  |                                       |                         |           |       |
|                             |           | RB05:  | Mouth of Guinea Creek (Pot Nets Creekside)                         |                                       |                         |           |       |
|                             |           |        | 6/16/03  | <i>"Gymnodinoid" sp. (S)</i>          | 15-25 um Grn            | Present   |       |
|                             |           |        | 6/16/03  | <i>Heterosigma akashiwo. (T)</i>      |                         | Present   |       |
|                             |           | RB06:  | Guinea Creek (Winding Creek Village)                               |                                       |                         |           |       |
|                             |           |        | 6/16/03  | <i>"Gymnodinoid" sp. (S)</i>          | 15-25 um Grn            | Common    | 0.45  |
|                             |           |        | 6/16/03  | <i>Dinophysis sp. (T)</i>             |                         | Present   | 0.03  |
|                             |           |        | 6/16/03  | <i>Dinophysis sp. (T)</i>             |                         | Present   | 0.01  |
|                             |           |        | 6/16/03  | <i>Gyrodinium instriatum (B)</i>      |                         | Common    | 0.10  |
|                             |           |        | 6/16/03  | <i>Kryptoperidium foliaceum-1 (B)</i> |                         | Present   |       |
|                             |           |        | 6/16/03  | <i>Kryptoperidium foliaceum-2 (B)</i> |                         | Present   |       |

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|---------------------|----------------------|---|---------|---------------------------------------|-------------------------|-----------|------|
| <b>Rehoboth Bay</b> |                      |   |         |                                       |                         |           |      |
|                     | <u>Guinea Creek</u>  |   |         |                                       |                         |           |      |
|                     | RB06:                | Guinea Creek (Winding Creek Village)                              | 6/16/03 | <i>Prorocentrum minimum</i> (T)       |                         | Present   |      |
|                     | RB06A:               | Guinea Creek @ Rd 298 Bridge                                      | 6/16/03 | " <i>Gymnodinoid</i> " sp. (S)        | 15 um Clear             | Present   |      |
|                     | <u>Herring Creek</u> |   |         |                                       |                         |           |      |
|                     | RB04:                | Herring Creek, Mid-Section  | 6/15/03 | " <i>Gymnodinoid</i> " sp. (S)        | 15-25 um Grn            | Many      | 2.00 |
|                     |                      |   | 6/15/03 | <i>Dinophysis</i> sp. (T)             |                         | Present   | 0.01 |
|                     |                      |   | 6/15/03 | <i>Gyrodinium instriatum</i> (B)      |                         | Present   |      |
|                     |                      |   | 6/15/03 | <i>Heterosigma akashiwo</i> . (T)     |                         | Present   |      |
|                     |                      |   | 6/15/03 | <i>Kryptoperidium foliaceum-1</i> (B) |                         | Present   |      |
|                     | <u>Love Creek</u>    |   |         |                                       |                         |           |      |
|                     | RB51B:               | SW side of mouth, opposite DNREC site RLC1, near Charlie Turner's | 6/20/03 | <i>Akashiwo sanguineum</i> (B)        |                         | Present   |      |
|                     |                      |   | 6/20/03 | <i>Chaetoceros</i> sp. (T)            |                         | Common    |      |
|                     |                      |   | 6/20/03 | <i>Dinophysis acuminata</i> (T)       |                         | Present   | 0.02 |
|                     | RLC1W:               | shellfish site, mouth of Love Creek.                              | 6/17/03 | " <i>Gymnodinoid</i> " sp. (S)        | 15-25 um Grn            | Present   |      |
|                     |                      |   | 6/17/03 | <i>Chaetoceros</i> sp. (T)            |                         | Common    | 0.25 |
|                     |                      |   | 6/17/03 | <i>Dinophysis</i> sp. (T)             |                         | Present   | 0.03 |
|                     |                      |   | 6/17/03 | <i>Gyrodinium instriatum</i> (B)      |                         | Present   |      |
|                     |                      |   | 6/17/03 | <i>Kryptoperidium foliaceum-1</i> (B) |                         | Present   |      |
|                     |                      |   | 6/17/03 | <i>Prorocentrum minimum</i> (T)       |                         | Present   |      |
|                     |                      |   | 6/20/03 | <i>Chaetoceros</i> sp. (T)            |                         | Common    |      |
|                     |                      |   | 6/20/03 | <i>Dinophysis acuminata</i> (T)       |                         | Present   | 0.03 |
|                     |                      |   | 6/20/03 | <i>Gyrodinium instriatum</i> (B)      |                         | Common    |      |
|                     |                      |   | 6/23/03 | <i>Dinophysis acuminata</i> (T)       |                         | Common    | 0.18 |
|                     |                      |   | 6/25/03 | <i>Akashiwo sanguineum</i> (B)        |                         | Present   |      |
|                     |                      |   | 6/25/03 | <i>Chaetoceros</i> sp. (T)            |                         | Many      | 1.50 |
|                     |                      |   | 6/25/03 | <i>Dinophysis acuminata</i> (T)       |                         | Present   | 0.20 |
|                     |                      |   | 6/25/03 | <i>Gyrodinium instriatum</i> (B)      |                         | Present   |      |
|                     |                      |   | 6/25/03 | <i>Prorocentrum minimum</i> (T)       |                         | Present   |      |
|                     | RLC2S:               | DNREC site, upper Love Creek                                      | 6/17/03 | <i>Chaetoceros</i> sp. (T)            |                         | Common    | 0.35 |
|                     | <u>Torquay Canal</u> |   |         |                                       |                         |           |      |
|                     | RB46:                | Torquay Canal at bulkhead   | 6/24/03 | " <i>Gymnodinoid</i> " sp. (S)        | 15-25 um Grn            | Common    | 0.50 |
|                     |                      |   | 6/24/03 | <i>Akashiwo sanguineum</i> (B)        |                         | Present   |      |
|                     |                      |   | 6/24/03 | <i>Dinophysis acuminata</i> (T)       |                         | Present   | 0.01 |
|                     |                      |   | 6/24/03 | <i>Gyrodinium instriatum</i> (B)      |                         | Present   | 0.09 |
|                     |                      |   | 6/24/03 | <i>Gyrodinium uncatenum</i> (B)       |                         | Present   |      |
|                     |                      |   | 6/24/03 | <i>Prorocentrum minimum</i> (T)       |                         | Present   |      |

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