

The mission of the Hillsboro Lighthouse Preservation Society, Inc., "HLPS" is to promote the history of the Hillsboro Light Station and the Hillsboro Inlet area through preservation of structures and artifacts, education, and public access tours.

EIGHTH YEAR OF PUBLICATION

President's Corner

Dear HLPS Members and Lighthouse Friends,

New officers of our Society will be elected at our October General Meeting, (see below). I will be stepping down as an officer. I have enjoyed working for our growing Society since its beginning in 1997 and in my duties as President, Treasurer, and Big Diamond editor for the last four years. My 83rd birthday is just around the corner and I prefer not to have such a demanding schedule in the future. It will give me time to gather up HLPS history saved by me and former President, Dave Butler, until his untimely death. Since then there have also been hundreds of newspaper articles, photographs, as well as photos I have from State and National Archives that need to be put into albums. I still will help out at every tour where needed, climb the tower as long as I am able, and always be enthusiastic about OUR lighthouse.

Sincerely, Hib Casselberry

October General Meeting

On Tuesday, October 11, 2005, we will have a general meeting of HLPS at the Hillsboro Club for the election of officers. All members in good standing are urged to attend. Hors d'oeuvres and punch will be served and there will be a cash bar. Come to meet your fellow members and enjoy this Club's beautiful building. The end of September you will receive notice of time and reservations required.

The 1906 Third Keeper's Cottage

JULY 2005

By the time you read this issue of *the Big Diamond*, the 1906 Third Keeper's Cottage that found a new home at the Hillsboro Club in the 1930's will have been dismantled. It had been sitting adjacent to the beach and the lighthouse station, but boxed-in by newer buildings. If this historic building had been moved by ocean barge, there were several impossible scenarios ----- damage to our coral reefs and sea turtle nests and an estimated moving cost of \$500,000.00. If moved by land the cottage would have to be cut into four or more parts and reconstructed. Experts in this field suggested the structure was too fragile for this method of removal.

The old doors, hardware, jambs, & trim, base, wainscot, chair rail, & wood wall paneling, along with other architectural features including the front porch posts and windows & their trim, iron weights, etc. have been saved so that a replica of the cottage can be built in the future.

We thank Chris Eck, Broward County Historical Preservation Officer, for his work on this project and the Broward County Commissioners who gave a \$40,000.00 grant to this effort. Without their help, these parts of the cottage would have been lost.

Next Lighthouse Tour on Sat. Aug. 13 (See page 2)

Next Lighthouse Tour Slated for August 13

On Saturday, August 13th we will have our 3rd tour of 2005. Come see where the Barefoot Mailman lost his life at this inlet. See the minimuseum with watercolor paintings of the ships that were wrecked off our shores and photographs of the boat wrecked there last May. Gone is the Third Keeper's Cottage, but get a glimpse of the new construction rising in its place.

Since no cars or pedestrians are allowed at the lighthouse gate and no access by private boat at the shoreline will be allowed, we ask that you park your car at the Pompano Beach City Parking Lot, a block north of East Atlantic Blvd. on North Riverside Drive on the east side of the waterway. Allow 3 hours for parking fee. Check in at the HLPS table and receive your wrist band before climbing aboard the chartered shuttle bus. Enjoy the ride and narrative by Dr. Ray McAllister. The shuttling begins at 9:00 A.M. until 3:00 PM The last shuttle from the Lighthouse backto the parking lot leaves the Lighthouse Station at 4:30 P.M.,

There will be active Coast Guard personnel, Coast Guard Auxiliary members and HLPS board members there to answer your questions. Lighthouse T-shirts, books, models and other such merchandise will be available for sale. Let your friends know about the tour. Since all of our tours are for "members in good standing, only", people may join at the parking lot that day. Tax deductible yearly dues that include all tours, newsletters and general meeting at The Hillsboro Club are: \$25.00 for individuals, \$35.00 for a family, \$50.00 for a business or organization membership and \$500.00 for a life membership.

As you climb the tower, consider that for nearly 30 years this lighthouse was lite with kerosene and wick, requiring three keepers to climb the 175 steps with full oil cans each day to preform that duty.

This U.S. Coast Guard station is less than 3 acres in size, but big in the hearts of the VIP officers for their R & R time with their families. It is a beautiful, peaceful place, and away from the public. HLPS agreement with the Coast Guard is for only four tours per year.



Girl Scout Troop 870, from Sunrise, FL on May 7



An Uninvited Guest at the tour, May 7

MEET YOUR HLPS BOARD of DIRECTORS

Fifth in a series, compiled by Martha Casselberry

Stephen Attis is HLPS vice president. What a busy man! He is a BellSouth Service Technician and coordinator for BellSouth's employees in the Member Assistance Program. If that isn't enough to keep one man busy, Stephen is also founder and president of Vone Research, Inc., a non profit corporation comprised totally of volunteers.

These folks devote their time to increase public awareness of Florida's maritime history and oceanic resources. They work in conjunction with governmental and other like-minded agencies to provide research, conservation, preservation and hands-on education with respect to our oceanic, historical and archaeological resources.

Here are a few of Vone Research's accomplishments:

They located one of the missing anchors from the S.S. Copenhagen, a British steamship that crashed on her maiden voyage onto a reef just three miles south of the Hillsboro Inlet in 1900 to become a total loss, a reason to build a lighthouse here. Along with members of the Marine Archaeological Council, Vone returned the anchor to the wreck, placing it near the plaque that marks this wreckage as an Underwater Archaeological Preserve.

Another anchor, possibly from the Gil Blas, Broward's most historical shipwreck (1835), was found many years ago and had been exposed to weather for many years. Vone has a program called "Touching History" that involves High School students learning to preserve marine history. The volunteer students in this project were from Pompano Beach High. The anchor, at least 170 years old, was preserved using electrolysis. To accomplish this task the students constructed a wood and fiberglass electrolysis tank big enough to hold the very large anchor. The anchor was kept and treated in this tank at Pompano Beach High School for over a year throughout the preservation process.

Another "Touching History" project involved volunteer students from Pine Crest School. Vone Research had found reef damage just north of the Hillsboro Inlet. The damage was suffered during the Inlet dredging project when a steel cable dragged over numerous reef systems. With permits obtained from the State of Florida, Vone Research and Pine Crest students helped repair some of the damage using underwater cement to "glue" broken coral back in place.

Both the Pompano Beach and Pine Crest students together with Vone Research were invited by the State of Florida to compare the artifacts found on the anchor with known artifacts from the Gil Blas housed in the State archives.

The "Touching History" projects will leave a lasting impression on these young adults who someday may carry on with the vast unexplored undersea world. Stephen Attis' childhood hero was Jacques Cousteau. We are proud of Stephen's accomplishments and I think maybe Mr. Cousteau would be, too.



Stephen Attis at the podium recently during the dedication of the Hillsboro Inlet Park in Pompano Beach. He spoke about the restoration of the anchor that now rests at that site.

HURRICANE FORCES

By Dr. Ray McAllister, Professor Emeritus, Dept. of Ocean Engineering, FAU and Board Member of HLPS

We all hate the thought of a hurricane hitting Florida, but consider this, without the moisture deposited over a ten year span, Florida would be a semi-arid wasteland! We are heavily dependant upon the rain from hurricanes and tropical storms, both direct hits and near misses. So there are good things resulting from our annual scrimmage with summer storms. Now what should we know about them?

Envision a great rotating mass of air moving toward you from the sea. As it approaches the coast from directly offshore, the eye of the storm, which has rising air in it, hence no winds along the ground, is coming ashore somewhere to your right. You face the storm. The right front quadrant of the hurricane which you are in is called the dangerous quadrant, and for good reasons. The winds in this quadrant, as the eye passes over the shoreline, are blowing directly toward the beach at a velocity of, say, 100 MPH. At the same time the storm is moving forward at say 20 MPH. On the right front of the storm, winds of 100 plus the 20 MPH forward motion give over-the-ground winds of 120 MPH.

Since the force exerted by the wind goes up as the square of the wind speed, doubling the wind velocity quadruples the danger to structures, trees, etc. in the path of the storm. A 120 MPH wind has 44 percent more energy than a 100 MPH wind.

In the left front quadrant of the storm, to your right as you stand watching it approach, the 100 MPH winds are diminished by 20 MPH, since they are blowing out to sea on that side of the eye, and the forward motion of the storm decreases them to 100 minus 20 or 80 MPH. Furthermore, the winds are coming from the land and have decreased by friction with the rough land. Often a storm which is devastating to objects in the right front quadrant has gentle enough winds, in the left front quadrant, that people drive out in the storm and watch the waves along the shore. A few miles away houses are being destroyed, boats sunk, and people killed.

In a very real sense your fate in a hurricane depends heavily on where you are with respect to the eye; whether a high or low pressure area is over you at the time of the storm and, as we will see below, even whether it hits on a high or low tide. Verily, you are in the lap of the gods!

A high spring tide in Southeast Florida may be 1 or 2 feet higher than a normal high tide. If the 11 foot storm surge occurs at a spring high, it will be up to 5 feet higher than at spring low.

As the hurricane discussed above approaches, the first winds you feel blow parallel to the coast, then more nearly directly at the coast, then switch to parallel again but blowing in the opposite direction. Probably 75 percent of the people in the Southeastern US have never experienced a significant hurricane and have been lulled into complacency by the passage of several which missed us. But when one puts us in its right front quadrant, watch out! Believe the National Hurricane Service bulletins. If they miss, you may have been inconvenienced, but are alive and in possession of all your property. If they are correct and you did not evacuate or take proper precautions, you may not need your shattered dwelling. You may be dead.

If you are trapped by rising water, which may occur in several places along coastal roads in several states, go to a well constructed high rise building and try to get to one of the upper floors. This is called vertical evacuation and is preferable to staying at ground level, but not nearly as good as going west, away from the coast, to a well constructed home or shelter.

Editor's note: Digest this information and review it before each hurricane, especially those that may slam into S. Florida from the Atlantic side. Also see the air brush painting by William T. Hunt (below). This work of art won "Best In Show" on the opening day of the two-month-long showing of *Images of Hillsboro Inlet Lighthouse* held at the Fort Lauderdale Historical Society's New River Inn on June 22, 2003. Mr. Hunt's striking picture has the "eye of the storm" directly above Hillsboro Lighthouse.



"Eye of the Storm" by Bill Hunt

SEA TURTLES STILL TIED TO THE LAND By Dr. Ray McAllister

Turtle nesting season runs roughly from March till mid-summer. These antediluvian beasts, little changed, like the sharks, for 100 million years, are still tied to the land where they must return to nest. When the young go to sea they effectively disappear for a year or so, "the lost year." Even when a foot long or so, little is known of most sea turtles until they return again to familiar coastlines to lay their eggs well above the reach of the waves.

Of the 6 commonly known species (some scientists say there are 8 species), the Loggerhead is the most common on our beaches. Next are the Hawksbill and Green Sea Turtles followed by the rare Leatherback. The Ridleys (two species) are very rare on US beaches. That is in spite of an attempt to move freshly laid eggs to a beach on Padre Island, Texas, where they hoped to start a new nesting site. The one site in Mexico, where they came ashore by the thousands, almost caused the demise of the species because of egg hunters.

In our area, nesting starts in the middle spring and will continue through July and August. The procedure is somewhat as follows:

In the late evening, after 11:00 p.m. or so, a female turtle, probably a Loggerhead, swims in to the Hillsboro Inlet Lighthouse sand beach, moving slowly out of the water. Salt-secreting glands that help her get rid of excess salt consumed with her marine diet weep large tears from the corners of her eyes. Contrary to popular legend, she is not crying with the pain of the whole process, although it cannot be great fun for the turtle. either. She laboriously grinds her way up the beach face to a position high on the berm, often at the edge of the beach vegetation. Here the tired turtle, having dragged several hundred pounds of flesh up the beach on its carapace, leaving double tracks like a bulldozer, starts digging a nest. Using the hind flippers, one at a time, she digs an amazingly deep and steep walled hole, perhaps 15-18 inches deep, throwing the sand to the side. During her crawl and preparation of the nest, loud noises, lights, lightening, etc. will cause the turtle to return to sea. Thus there are laws against molesting or harassing the nesting turtles and stiff fines will be levied on people are found disturbing the turtle or nest. to interrupt her. Lowering her tail into her carefully





Once the turtle has started to lay eggs, it is difficult dug nest, she begins to lay rubbery, Ping-Pong-ball sized eggs from the ovipositor, which lies on the base of her tail.

After having arduously deposited perhaps 100 or more eggs, she begins refilling the hole with her flippers, all semi-blind, since she still faces up beach and cannot see what she instinctively does. When the hole is filled, the turtle heaves her huge bulk around, smoothing the area with her flippers until the exact location of the nest is hidden within a large disturbed circle. Presumably this makes it hard for the raccoon or other predator to find the nest. Then she laboriously plows her tired way back down the beach to the supporting seawater, where she changes from a marine creature ill-prepared for her time out of water, to a creature well-equipped for marine life.

As the sun rises the next morning, rangers will be rolling along the public beach in off-road vehicles looking for fresh tracks and the nests at the upper end of each "bulldozer like" track. If our turtle's nest had been close to the water, nature has provided that salt water contact, in a storm, will destroy the eggs, so that those turtles which nest too close to the shoreline do not have surviving progeny to carry on their line. Sometimes rangers dig up such nests and take the eggs to a hatchery area where they are incubated. Better to have a few dumb turtle (those nesting too close to the water) survive, than to have these endangered species wiped out by mans' sea walls, beach parties, street lights, boat traffic and pollution. Our turtle nested high on the berm and the eggs will most likely survive to hatching time.

Our baby turtles will face many more dangers before they return to the sea, grow to adulthood, and return to Hillsboro Inlet Lighthouse to continue their cycle of life. In the next Big Diamond issue I'll tell you about these dangers, the role of our science museums, park & recreation departments, and even large corporations such as Arvida working to educate the public, protecting turtles and their nests. Think about signing up for one of next year's protected turtle walks to view this amazing and dramatic event for yourself.





Broward County Girls Take Honors at Florida History Fair

Each year students from elementary grades through high school may enter the Florida History Fair competition. The National Theme this year was "Communication in History: The Key to Understanding".

State awards were held on Saturday, May 7th at Tallahassee's Leon High School for this year's county winners in the three age categories. Every year that there is a county winner who has used a lighthouse theme, the Florida Lighthouse Association has presented **"The Lighthouse Heritage Award"**, a Savings Bond and a copy of Tom Taylor's book, *Florida Lighthouse Trail*. Courtney Randolph and Katherine Foster, seventh graders at American Heritage School in Plantation, were Broward County winners and titled their Junior Group Exhibit, "Florida Lighthouses: Communicating Safety and Peril". Courtney and Katherine each received a \$50 Savings Bond and the lighthouse book was also presented to their school library. This year there was also an elementary school winning lighthouse entry from Pensacola. The awards were presented by Barbara Revell of FLA who said she was impressed by the State History Fair Awards Ceremony, the bright young faces, hardworking teachers and dedicated parents who attended. She reports that the 2006 theme for the History Fair will be **"Taking a Stand in History"** and asks us to encourage our area youth to participate in the History Fair as well as encourage them to research about lighthouses and their keepers.



Above: Courtney Randolph and Katherine Foster in Tallahassee

At right: Their winning exhibit



NEW MEMBERS & RENEWALS SINCE H.L.P.S.'S APRIL '05 NEWSLETTER - HLPS-file/05-July 05-NL/New & Renewals Since April 05 wpd ----

Abrams, Mike & Roseann Aceto, Ana Amato, Carmine & Jeanne Ammann, Susan Anderson, Margaret Bacchus, Ralph & Monica Bender, Donnell & Janet Bennett, Nancy Brent, Bonnie & Tad Yoder Bernasky, Mary Brill, Jack & Rosemary Brown, Randy Burns, Dr.& Mrs. John Butler, Susan Casey, Patricia Clark, Brian & Deanne Clifton, Russell Crosby, Lillian Daher, John & Joy Dailey, Jack & Beth Daisley, Suzanne Kay Dennis, Jamie & Beryl Dimare, Kimberli

Desjean, Robert & Cathie Enskow, Byron & Joan Farmer, Bill Fassoles, John & Sue Feltus, Ruth Firth, Louise Fleagle, Btian & Suzy Foglesong, John & Kim Ford, Nancy Foss, Alice Frauenknecht, Becky Furey, Tina Girl Scout Troop #870 Goodman, Ed & Senia Grotke, Richard & Linda Hamilton, Phil & Susanne Healy, Pat Hohman, James & Audrey Jones, Ronald & Cindy Kennedy, John Kingston, Dan & Susan Kirbert, John & Ellen Lilly, Robert

VOLUNTEER HELPERS H.L.P.S.

Newsletter Mailing: Laurie Kunkel,, Hib & Martha Casselberry, Leslie Denote

May 9th Lighthouse Tour: U.S. Coast Guard ANT, Ft.Lauderdale MK2 Wilson George, FA Karl Mulleady, BM3 Randall Mobley <u>Coast Guard Auxiliary:</u> #37 Ed Duda, David Friend, Joan Rauert Liz Clark, and from #36 Jerry Edelman, and from #34 Guenther Noder, Scott Cleary, Marie Motz. <u>HLPS helpers at Lighthouse :</u> Stephen Attis, Paul Bradley, Jack Burrie, Hib Casselberry, Dan Dodge, Mike & Joyce Hager, Art Makenian, Dr. Ray McAllister, David Shing, <u>HLPS atCheck-in booth:</u> Martha Casselberry, Lourie Kunkel; and Leslie Denote. Sands Harbor for tables, chairs; and the use of their dock. <u>At the Lighthouse:</u> Table, chairs, iced-tea, lemonade, & Box Lunches for the workers by the Hillsboro Club. Lippincott, John & Mary Jane Madox, Jane Martin, Donald & Cynthia McBride, Nancy McCaul, Ben & Sandra McClelland, Loretta McLaughlin, Bernard, Jr. Milshaw, Richard Moccia, Ralph & Roberta Moore, Tammy Mulcahy, Scott & Fran Mulka, Mike & Frances Murphy, John & Claire Murphy, Vikki Norman, Graham, Marcia, Wm. O'Connell, Bob & Terry Peck, Linda Pfarr, William & Carole Redd, Carol Reed, Suzie Rehwald, Katherine Rettstadt, Rich

Richman, Richard Robb, Barbara Sabourin, Virginia Salisbury, John & Dori Schiff, Dr. Jon Siegel, William & Sandra Skerry, William & Monica Smith, David A. Smith, Voncile M. Steppy, David Thompson, George Villa, Harvey & Alyce Vivenzio, Thomas & Joyce Walz, Denise Wilder, Martha Winchell, Larry & Eileen Wilson, Mr. & Mrs. Frank Wilson, Max & Betty Winter, Frances Zadel, Ed * = Business Membership ** = LIFE MEMBERS

DONATIONS

Commemorative Paving Bricks: In the last newsletter, we failed to list the following people because the newsletter had to go to the printer in mid-March: Larry & Skeeter Aschinger, Jack & Beth Dailey, Bill Farmer, John & Sue Fassoles (2), Linda Giles, Mike & Joyce Hager, Whitney & Mary Hager, Cliff & Pat Hope, Walter LaPrade, Brian Ligon, Paul & Mary Luttenauer, Carmen McGarry, Robert McNab (6), Robert Melli, Ronald Skirdlant, Bradley & Jami Snow, The Stone family, Sunderlin family, Dr. Charles Tracey, Mary Whitmer (2), Larry & Annette Yarbrough. No more orders for bricks taken until further notice.

Photographs of our Lighthouse Station:

Bill Hunt, Scott Martin, and David Shing Marker Signs for our tours at Station: Deerfield Builders Supply (Edward H. Dietrich & Rick Hawkins)



3rd Keeper's Cottage as it looked 7/1/05, by Scott Martin

Hillsboro Lighthouse Preservation Society, Inc. Post Office Box 6062 Pompano Beach, Florida 33060 Phone: 954-942-2102 Website: www.HillsboroLighthouse.org E-mail: Info@HillsboroLighthouse.org Martha Casselberry, Newsletter Editor



FIRST CLASS MAIL

If there is a red mark around your expiration date, please send in your renewal payment.



