Our Youth—
A Sometimes Neglected Coastal Resource

by David Greene,
Sea Grant Specialist in East Aurora

If you were asked to identify your most valuable coastal assets, what would your answer be? Would it be your marina facility? your home? your land? or your right of access to the water? Would you think to answer the young people of your community?

Many of the decisions people are forced to make on a day-to-day, year-to-year basis directly affect the maintenance of the coastal waters and the resources derived from them. Correct decisions often depend upon experience and knowledge, often hard earned.

Just as we protect our coastal resources for future generations through direct action, we can protect our youth “resource” through involvement and education. We can give them a head start into the process of proper decision-making that will assure the conservation of coastal resources in generations to come.

How can this be done? There are as many ways to teach youth as there are resources to protect, but probably the most effective method of education is direct involvement in the problem. Having young people work beside you when you make decisions will help these future decision-makers take the appropriate steps when it comes their turn.

Direct Youth Involvement

In many counties the Cooperative Extension office — through 4-H — conducts a County Government Internship program. Here young people get the opportunity to sit in on governmental decisions as they happen. County Government Day involves visiting with legislators and executives in their offices to familiarize youth with the “goings on” of local government. Many counties also take youth groups to Albany to visit the state government.

Members of your community can establish an “internship” program. If you’re a county legislator, a planner or marina operator, when you attend a meeting to discuss factors affecting your coastal property, take a young person along who might just have to make similar decisions in 10 years.

In many counties throughout the state, the Federation of Sportmen’s Clubs has for many years recognized their youth as future stewards of the environment. This has been reflected by their active participation in conservation education. At the conservation building at the Oppenheim Zoo in southern Niagara County, for example, young people have gone one step farther. The youth themselves, through a club organized at a local high school, have painted, updated, completely refurbished and maintained the conservation education building. This direct involvement has led to a spirited enthusiasm for the environment. One cannot help but think that this will carry over to their future decisions.

Natural Resource Inventories

One way to involve young people in coastal decisions is to encourage them to conduct a Natural Resource Inventory. Such an inventory not only accounts for the natural resources of an area, but also provides experience in interpreting and understanding natural phenomena. In Westchester and Suffolk counties, youth have already been involved in field work for an inventory. In Westchester, one class is working on an inventory with Cooperative Extension and a local school teacher. In Suffolk County, an open space inventory is the result of cooperation between Sea Grant and the Town of Riverhead. In both cases, youth gained knowledge and experience that will help them make decisions in the future. In addition, the inventory of resources serves as an

continued on page 8
Art Knorr: A Voice for the Marine Trades

by Michael F. Veillette, Director, Great State, in Brockport

When one first enters the small, quiet office of Knorr Advertising, Inc. in Syracuse, it belies just how much activity is actually going on. Moreover, it's difficult to perceive even the minimum of the many outside forces that impinge on marine or boating affairs of any sort.

But when you meet and talk with the firm's namesake, it's quite another matter.

Because in addition to running a successful advertising business, Art Knorr is, by his own admission, "up to my ears in marine trade affairs!"

Art has been the executive secretary for the Central New York Marine Trades Association for the past 17 years, and has also served in a similar capacity with the Empire State Marine Trades Association (ESMTA) since 1974. Moreover, as part of his leadership duties with ESMTA, he carries out the role of a registered lobbyist at the state capitol and serves as a member of the state's Coastal Management Advisory Committee. One thing's certain — Art Knorr, as spokesman for marine operators and marine product dealers in the state, keeps a busy beat.

But it is the ESMTA that one finds Art most eager to stop and talk about. The tone of the conversation is always exciting and very positive.

"In just five years, the Empire State Association has achieved some very significant goals that benefit the marine trades industry in New York. Perhaps, the most important accomplishment, however, revolves around the fact that, for the first time, the marine product and service industry can raise a single, unified voice on matters of real concern," says Art.

A look at the organizational structure and growth rate of the ESMTA bears witness that the association is a true reflection of marine trades interests across the state. Since its fledgling years in 1974 and 1975, when regional groups from the Syracuse, Rochester, Buffalo and Albany areas voted unanimously for enrollment, the ESMTA has grown to a membership of over 230 businesses.

"At first, we were actually a federation of the regional associations. We wanted to avoid competing for members with our regional affiliates, so we required operators to enlist locally if they wanted to belong. But, it became obvious that many operators wanted to take part in ESMTA and its benefits but could not join a regional association. We solved this by changing our by-laws to allow individual memberships, so we now enroll members from every corner of the state, including the New York City/Long Island area."

And what are some of the benefits for members? "To start, ESMTA offers the operator a voice and watchdog in Albany on relevant tax, labor and regulatory matters. This is done through my lobbying efforts. Next, a communication mechanism — that is, our newsletter Watermark — gives our members a quick 'feel' for what's happening on the statewide level, that is, the legislature."

The litany of other ESMTA special programs that Art can recite is impressive. Under his direction, ESMTA now offers a business liability insurance plan, "tailmade" for marine businesses, "beams Art — and a group health and life insurance plan. Art has also helped formulate a special credit card program for ESMTA members. "Now our operators can take advantage of a special low group rate when dealing with major bank credit card sales," states Art.

While it appears obvious that he could write a book about the virtues of ESMTA, a conversation with Art reveals much more. He holds strong conviction concerning the future role marine businesses need to play in industry matters. According to Art, "the true business operator must realize that the destiny of his way of making a living is shaped by many outside forces. Operator love got to be convinced that unless they 'give a damn' by participating in issues that affect their enterprises, their businesses will not be as productive as they could be and may even fail."

He feels that the more marina operators are willing and able to work toward common goals and make their views known, the better they'll be able to influence decisions in Albany and Washington. In his recent experience involving the state boat registration rate hike proposals and talk in Albany that dealer registration may be in the wind are clear signals that the marine trades must be continually active in asserting its viewpoint, and not just reacting to individual crises," declares Art.

Education impresses Art as playing a crucial role in the future viability of the marine trades industry. "The operator has got to keep 'up to snuff' on the best practices, facilities and equipment being used in the business. This is where Sea Grant can serve as a most valuable source of information. It has the expertise and resources to help solve problems on a regional basis. It also helps develop their own problem-solving approaches." Last but not least, says Art, ESMTA offers a wide variety of programs, a marine facilities and maintenance program held by the Marine Technicians Grant, and a selling skills workshop.

All indications are that Art Knorr is here to stay. Art, who, along with the marine businesswoman is heard "loud and clear" at the state level, and that operators can take advantage of benefits never before available to marine businesses. "One operator, says Art, "mentions that Art also helped the concerns by contacting him directly as follows: Art Knorr, "Executive Secretary, ESMTA, 409 Empire Blvd., So. Salina St., Syracuse, N.Y. 13202, phone: 315-472-5431."

Tips for Commercial Fishermen:

Marine Insurance

by John Scott, Sea Grant Specialist in Stony Brook

Insurance rates are not regulated by state insurance authorities. The rate is determined by the insurance company, which considers its own loss and industry experience in arriving at premium costs. In nearly all cases, insurance rates offered by competing carriers.

Most marine insurance plans generally include two basic protections: (1) hull insurance and (2) protection against loss of income. Not only is it commendable.

Hull insurance protects the vessel owner and others against loss of physical property in the case of collisions. This type of insurance covers the vessel in the event of a collision, no matter who is at fault.

Protection and indemnity (P&I) insurance protects against loss of income for the losses of others. Many vessel owners require breach of warranty coverage. Breach of warranty coverage protects against loss of income for the losses of others.

Marine insurance concerns:

The insurance problems facing vessel owners are many.

Insurance policies are not sketched out for certain fishing industry members.

Better vessels and operators are penalized for the bad behavior of poorly maintained and operated vessels.

Coverage is becoming more limited.

Additional coverages are required to qualify for some loan programs.

Solutions to Insurance Problems

As the fishing industry expands, both nationally and locally, insurance costs will become more available. To some extent, there has already been growth in marine insurance program availability through increased carriers and interested independent agents. Fishermen have formed marine insurance cooperatives in Alaska and have established procedures to combat high insurance costs in New England.

A National Council of Fishing Vessel Safety and Insurance has been established to deal with many matters relating to fishing safety and insurance.

Marine operators are sure to have coverage for lendings required and general personal protection for loss of property and injury to others.

One way of assuring this is to have full and regular communication with your agent and underwriter. Make the agent completely familiar with your operation, equipment, and contracts. The agent should be fully advised of all developments throughout the year. Importance can be expanded when good communications exist between you and your agent.

Marine insurance to many people is very complicated, dubious in its potential and insurance agent or broker is used to plan your insurance needs. The expense of their advice can easily be recouped in savings over the insured period.

Editor's Note: To receive more information on marine insurance, contact Marine and Fishing, Inc. or subscribe to the National Council of Fishing Vessel Safety and Insurance for the latest developments. Buffalo, N.Y. 14201. President: National Council of Fishing Vessel Safety and Insurance, 1 Tuna Lane, San Diego, CA 92101.
New York's Great Lake Ports

by Donald F. Squires
Director, New York State Geol. Institute in Albany

Ports, like ships and those who go down to sea in them, are romantic and raise our curiosity. Because ships and the activities in the harbor appeal to us, we sometimes equate a busy port with a bustling economy. But what about the oft heard cry "if we could just bring the ships back," by local officials seeking to revive the sagging economy of their port cities? It sounds good, but is it true?

Ports, ships, waterborne commerce — all are components in the continual flux of local, regional, national and international, economic and political circumstances. Our industrial society is now dependent on the flow of oil which moves by fleets of supertankers — but the circumstances are always changing. For example, a change in the international scene which results in a Presidential reallocation of beef import quotas may result in a new fleet of refrigerated container ships to carry grass-fed Australian beef halfway around the world to the fastfood hamburger stands across our nation.

The St. Lawrence Seaway, which celebrated the 20th anniversary of its first ship passage earlier this year, was a major change. But how did it change waterborne commerce on the Great Lakes and New York ports? What can we project for the future? What impact will our new energy-consciousness have on our ports and their commerce?

New York State has many ports on its marine, Hudson River and Great Lakes coasts, but all are dwarfed by the Port of New York, the nation's busiest. Small harbors serve as shipping or receiving points for bulk cargoes, still most efficiently shipped by water, or for raw materials for local industry, Petroleum, constituting nearly half of the nation's waterborne commerce, is the major component of commerce in New York's ports. Other major commod-ities carried by vessels include ores, cement, sand and gravel. The relative size of some New York ports is shown in the following table.

New York's Great Lakes ports continued on page 6

Winter Navigation: A Lesson for the St. Lawrence River

by Stephen D. Brown
Sea Grant Specialist

Editor's note: Sea Grant Specialist Stephen D. Brown recently visited the St. Mary's River in Michigan to learn the consequences of winter navigation and their implication for residents of the St. Lawrence River. Here are his observations.

Two Great Rivers

The St. Lawrence and St. Mary's Rivers have more similarities than differences. Both are conduits within the Great Lake systems: the St. Mary's connects Lake Superior to Lake Huron; and the St. Lawrence connects Lake Ontario and the Atlantic Ocean. Both rivers are transportation corridors for Great Lakes shipping in the northern part of their respective states — New York and Michigan. Both are international borders, surrounded by a rural setting, dependent on tourism. Both have enjoyed the traditionally symbiotic relationship between tourism and Great Lakes shipping which, in the case of Massena, N.Y. and Sault Ste. Marie, Mich., have created a major tourist attraction without significantly diminishing the natural resources. In fact, Sault Ste. Marie has capitalized on this by adding a visitor's center, a tour boat which goes through the locks, a museum and lock-viewing areas.

The two rivers do have differences. Compared to the St. Lawrence River, the St. Mary's is shorter and less developed, has different physiographic features, and winter navigation.

Impact of Winter Navigation on the St. Mary's River

Winter navigation on the St. Mary's River came about because Congress in 1970 authorized the Secretary of the Army to conduct a Survey Study and a Demonstration Program on the Great Lakes-St. Lawrence Seaway system. The study was to determine the feasibility of extending the navigation season while the demonstration was to test practical shipping and engineering technologies.

In 1972 the Demonstration Program extended the navigation season on the St. Mary's River. To accommodate the extended season, the locks and the river itself were modified; ice breaking assistance and escort services were set up; air bubble systems installed in tight turns; ice boom installations; plans for islander transportation implemented; and shore protection measures established.

While technical modifications have altered life along the river, especially in the narrow channels, their impacts are only beginning to be defined. Changes in the ice cover and waves created by ship transits have caused dock damage, erosion, and in the opinion of many residents, a general decline in the quality of the river's natural resources. These changes are especially noticeable in narrow channels, but an attempt to assess their impact is difficult because information on the river prior to winter navigation is lacking.

Effect of Navigation on Economy

The economic conditions along the river also are changing. People who work in winter navigation support functions have brought money into the economy. About 25 Coast Guard personnel have been added to the stations at St. Ignace and Sault Ste. Marie. In addition, a few people have been hired to work at the locks. The introduction of more people into the area, except for the initial housing problems, has been beneficial.

However, winter navigation appears to have been a drain on certain segments of the St. Mary's River economy. The cost of owning a home or doing business along the river is increasing. One resort owner in Kaber, for example, indicated his business was deteriorating because the area's fishery had declined. According to this person, the herring are not running where they were, the perch population has almost disappeared, and northern pike spawning areas have shifted. More...
were a significant factor in the development of commerce in this nation. But in recent years they have been by-passed due to: 1) the westward shift of grain production and their associated milling industries; 2) demographic shift in population and market locations; 3) an aging industrial base and New York City's environmental concerns, energy distribution, etc.

While these factors have affected all New York's ports, including New York City, some Great Lakes facilities have been particularly affected. Buffalo, once the greatest port on the Great Lakes, is plagued by weather and fluctuating automobile markets. Its port now exists itself largely by-passed as ships move through the Welland Canal to Rochester and Oswego. But highway development and rapid trucking to-and-from the Great Lakes make these ports uncompetitive.

Aside from Buffalo, the smaller ports along Lake Ontario have held their own. While their commerce has slowly grown over the last decade, most of their growth has been in the production of petroleum products. They are the only products moving through Sachets Harbor; over 86 percent of Oswego's commerce is composed of petroleum products, for its oil-fired steam-electric generating plant. Ogdensburg's traffic is 78 percent petroleum products. Aside from oil, Oswego receives cement, aluminum, and cocoa beans for local use; Ogdensburg's commerce is diverse; while Rochester receives cement, lime, and petroleum products, its port commerce being dominated by cement.

These figures for waterborne commerce reveal New York's dependence on oil not only for energy, but for port traffic as well. They show, in the absence of diversified commerce, the competitive impact of the Port of New York on the region.

Let's look at these points in greater detail: Petroleum products don't account for a high proportion of Seaway commerce. For example, in 1977, gasoline, fuel oil, lubricating oils and greases, and other petroleum products made up for little more than 4 percent of the Montreal-March Seaway commerce. But 80 percent of this constituted nearly 20 percent of New York's total commerce. In this same survey, agricultural and mine products accounted for 82 percent of Seaway traffic, the remainder being manufactured and miscellaneous including the petroleum.

It is this latter portion of the commerce which port developers find most greedly. For while general cargoes comprise a small proportion of total commerce, they produce a large part of port revenues and generate substantial direct community interest. For over the last decade, these cargoes have been moving in containers. These large standardized boxes (8' x 8' x 16' or larger) permit vessels to be loaded quickly, making 24-hour port time and shipping efficiency by as much as 25 percent, lower pilferage and damaged, and permit shipment of perishable materials like fresh fruits and vegetables in controlled atmosphere.

A little ago, the future of Great Lakes shipping was thought to be in the container trade. This has not materialized, but it is moving. Vessels can make the Port of New York, load and unload, and be ready for the next day's transportation. This, one reason for which the Seaway is so important for mariners, and their communities. Before winter navigation comes to a close, the Lawrence River may be the last time it takes a vessel to steam to the St. Lawrence and the Seaway. A container going from New York City to Buffalo is only an overnight truck trip — but five days

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**New Materials from New York Sea Grant**

Are Floating Tire Breakwaters for You? This new slide-tape program by Assistant Program Leader Bruce DeYoung explores the pros and cons of floating tire breakwaters (FTBs) to protect coastal harbors and marinas from nature's forces, namely wind and waves. A newly designed device which uses automated technology is said to be a relatively inexpensive, effective way to reduce damage caused by wind-generated waves.

The purpose of this slide-tape program is to help coastal businesses and communities understand how floating tire breakwaters can be used to protect marinas and other facilities from wave damage. It provides practical information on planning a breakwater, the limitations of breakwater design, obtaining permits, and how to get more information.

Although the Corps of Engineers is currently trying to solve these ice problem for harbors, the Corps is not responsible for ice transportation disruptions. For example, ferry service for the 450 residents of Sandy Hook, New Jersey is not available because a broken ice occasionally jams the ferry crossing. When a jam occurs, ferry service stops until ice breaks up and stranded until Coast Guard vessels clear the ice way. Because of these disruptions, residents are often penalized for missing work or school. In addition, the reliability of emergency health care worries many residents.

In the case of Lime Island, a 1,600-foot floating airboat is used to transport residents. Since the advent of winter navigation, air boats have often become a frightening experience. According to a two-volume log book kept by residents, islanders were stranded for several weeks on the island when the boat broke down. The only available alternative has not been found.

Implications for the St. Lawrence

Winter navigation may or may not be in the nation's best interest but it is essential for many of the communities and their communities. Before winter navigation comes to an end, the Lawrence River may be the last time it takes a vessel to steam to the St. Lawrence's example. Without adequate study by local public, citizens, and the government, the National Oceanic and Atmospheric Administration may echo the experience of the St. Mary's River.

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**WANT MORE**

Additional information is available from New York Sea Grant. Please check the publications which interest you and send to your nearest Sea Grant Extension office. Single copies of the following publications are free:

- Detroit Yacht Grant in New York, 1979, 4 pp.

For the following publications, make checks payable to Cornell University:
- Changing New York City's Waterfront: A Citizen's Guide, S. Lopez, 1979, 12 pp., $0.00
- St. Lawrence County: Tourism Fact Book, L. Parks and S. Brown, 1979, 34 pp., $1.00
- Are Floating Tire Breakwaters for You? B. DeYoung, 1979, a slide-tape program, 745 minutes long with audible pulses, 33 slides mounted, $21.50.
- Tasty Dishes from Minced Fish, R. C. Baker and J. M. Darlerr, 1979, 21 pp., $0.75.
- A Study of Virobsis at a Long Island Shellfish Hatchery, Sea Grant Reprint Series, Louis Leibowitz, 20 pp., $1.00.
- Distribution of Surficial Sediments and Eelgrass in New York's South Shore Bays: An Assessment from the Literature, Marine Sciences Research Center, R. P. Runk, 1979, 28 pp., $4.00.*
- General information on Sea Grant
- Aquaculture, Fisheries, Seafood
- Oceanography, Limnology, Foundation

* Make checks payable to: The Stony Brook Foundation
UPDATE

Bruce DeYoung has assumed the role of assistant program leader for Sea Grant specialists located in New York City, Nassau and Suffolk counties. He will be stationed in a newly-opened Sea Grant office at Cornell’s Horticultural Research Laboratory in Riverhead. Specialties with commercial fishing responsibilities will be housed there also, forming a technical team in that commodity area.

DeYoung holds an undergraduate degree in geology from Augustana College and M.S. in oceanography from Oregon State. Previous employment included positions in maritime commerce, coastal planning and marine education in Clatsop County, Oregon. A Sea Grant specialist in Fredonia since 1976, he attained national recognition for educational programming conducted to enable coastal business and communities enhance wave protection using floating breakwaters built of tires. He also worked with county agents and agricultural leaders to stimulate the use of drainage tile by coastal property owners having unstable, water-saturated bluffs.

Our Youth, continued from page 1

awakening for them to the environment that exists in their county.

Youth development is not solely a service project like youth cleaning up a stream bank or shoreline park. While such services are needed, they don’t give youth any opportunity for decision making. A better program might be to give youth the responsibility for establishing a clean-up program involving an entire community.

Our youth are a resource to be protected just as our shorelines need protection from erosion. Involving youth in decisions can lead to a brighter tomorrow for our coastal communities.

Ports, continued from page 6

by sea. Transit delays for expensive manufactured cargoes cost a manufacturer or purchaser money. So long as fuel and other shipping costs from the Port of New York remain low, increasing general cargoes from Lake Ontario ports will be difficult. But the picture is not bleak. If the flow of oil dries up, will our ports be affected?

Given the fact that for each gallon of fuel oil, waterborne commerce now provides 600 ton miles compared to 200 for trains, 58 for trucks and 4 for aircraft, we think not.

COASTLINES, published bi-monthly, is available free of charge to New York residents on written request to the editor.