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Economic Impact and Needs
of Wisconsin's Great Lakes Boaters

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WISCONSIN

COASTAL MANAGEMENT

IMPACTS OF RECREATION IN THE COASTAL ZONE:

ECONOMIC IMPACT AND NEEDS OF
WISCONSIN'S GREAT LAKES
BOATERS

1975

July, 1976

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This report is one of five studies which comprise the IMPACTS OF RECREATION IN THE COASTAL ZONE. The remaining four deal with the demand and supply of recreation in the Coastal Zone, economic impacts of recreation, large recreational home developments, and policy issues and recommendations. Each of the first four reports is designed to provide documentation and support for the policy recommendations which are published in the fifth report.

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ABSTRACT

Wisconsin's Coastal Zone offers a multitude of opportunities for recreation. This report focuses on Great Lakes boating and fishing since they are activities with the greatest dependency on the Great Lakes.

The major objective of the study is to identify the dependency between Great Lakes boaters and the economy of the coastal communities. The report also identifies the socioeconomic profile of the Great Lakes ramp users and marina users, and summarizes the preferences and needs of boaters for facilities and services.

The users of the boating facilities in the Coastal Zone show a definite preference for boating on the large body of water. Wisconsin's Great Lakes boaters spend, on the average, 42 days boating during the season. Approximately 80 percent of their boating is on the Great Lakes.

The increased popularity of Great Lakes boating is a result of increasing regional incomes, decreasing maintenance costs of boats due to changing materials and improvements in design. These changes have also made it easier to trailer, launch and use boats. The increased sports catch on Lake Michigan, which is a result of the fish management policies of Michigan and Wisconsin, has also been responsible for the increased interest in boating on the Great Lakes. Over 80 percent of the recreational boaters surveyed during the 1975 season list fishing as the primary purpose of their boating.

Wisconsin's Great Lakes boaters spent approximately \$12.7 million during the 1975 boating season. Seventy-three percent of this spending (\$9.3 million) occurred directly in the coastal communities. This estimate does not include the spending by the fishermen using charter fishing services, and boaters using private launch facilities. The cost of the boat and annual maintenance expenditures are also not included in this figure. Of the total direct spending of \$12.7 million, boaters using public ramps accounted for \$6.6 million and the marina users accounted for \$6.1 million. The primary beneficiaries of the daily spending by boaters were restaurants, food stores, service stations, sporting goods stores and overnight lodging establishments.

The majority of the boaters surveyed expressed the need for more and better launching facilities and an increase in the number of marina slips currently available in the Coastal Zone. The launch facilities located in Lower Lake Michigan, Green Bay and Sturgeon Bay are already operating at or near capacity. The situation is worse for marinas. During the 1975 season there were 1,031 boaters on marina waiting lists. Specific recommendations for state policy are being formulated and will be published in the POLICY ISSUES AND RECOMMENDATIONS report.

ACKNOWLEDGEMENTS

Any type of survey effort to be successful requires either large sums of money or a great deal of time and effort donated by many people. The Great Lakes Boater Surveys benefitted from the latter. University of Wisconsin County Extension agents, county and local officials, Coastal Zone regional administrators and numerous people in the University system contributed to the design and implementation of the surveys. In a team effort such as this, it is impossible to give all the credit that is due. There is, however, a group of people who must be identified individually in terms of their contribution to this study.

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TABLE OF CONTENTS

Abstract	i
Acknowledgements	ii
Table of Contents	iii
List of Tables	v
Introduction	1
Organization of the Report.	3
PART I: Economic Impact of Great Lakes Boaters.	5
A. Economic Impact of Ramp Users	5
Spending by Great Lakes Boat Ramp Users	5
Who Benefits From the Spending by Ramp Users?	8
B. Economic Impact of Marina Users	10
Spending by Great Lakes Marina Users.	10
Who Benefits From the Spending by Marina Users?	11
PART II: Facility Needs and Preferences of Great Lakes Boaters.	14
Marina Users.	15
APPENDICES	
Appendix I: Great Lakes Boat Ramp User Survey	17
Socioeconomic Profile of the Great Lakes Boater	19
Major Purpose of Boating and the Trip	
Characteristics	22
Total Boating Days Per Season by Great Lakes	
Boaters	23
Boat Characteristics and Boat-related Costs	24
Average Spending of Boater Parties.	25
Appendix II: Great Lakes Marina User Survey	28
Socioeconomic Profile of the Marina User.	29
Boat Characteristics and Boating-related	
Spending Among Marina Users.	31
Marina User Suggestions and Complaints.	35
Appendix III: Great Lakes Marina Characteristics.	37
Average Size of Marinas and Distribution of	
Slip Lengths.	38

TABLE OF CONTENTS

	<u>Page</u>
Slip Rental Fees.	39
Number on Waiting Lists and Expansion Plans	39
Profitability of the Marina Operation	40
Problems of Operation Identified by Marina Managers .	40
Appendix IV: Boat Launch Fee Schedules of Coastal Communities. .	43

LIST OF TABLES

<u>Table No.</u>		<u>Page</u>
1	Economic Impact of Great Lakes Ramp Users on Coastal Economies.	6
2	Economic Impact of Great Lakes Marina Users on Coastal Economies.	12
3	Service and Facility Needs and Preferences	16

APPENDIX I

I-1	Socioeconomic Profile of the Great Lakes Boater.	20
I-2	Major Purpose of Boating.	22
I-3	Trip Characteristics	23
I-4	Total Boating Days per Season and Percent of Boating on the Great Lakes	23
I-5	Type of Boat Owned by Ramp Users	24
I-6	Boat and Related Costs	25
I-7	Average Spending of Boating Parties.	26

APPENDIX II

II-1	Socioeconomic Characteristics of Marina Users.	30
II-2	Type of Boat Owned by Marina Users	32
II-3	Length of Boats Owned by Marina Users.	32
II-4	Average Annual Boat-related Expenditures	33
II-5	Average Daily Expenditures of Marina Users	34

APPENDIX III

III-1	Profitability of Marina Operation.	40
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IMPACTS OF RECREATION IN THE COASTAL ZONE:
ECONOMIC IMPACT AND NEEDS OF WISCONSIN'S GREAT LAKES
BOATERS

INTRODUCTION

Wisconsin's Coastal Zone offers a multitude of opportunities for recreation. The scenic quality of the coastline, the local, state and national recreation areas, and the availability of numerous support services such as restaurants and overnight lodging facilities make Wisconsin's Coastal Zone a prime recreation ground for Wisconsin residents as well as large numbers of tourists from neighboring states.

Among the many recreational opportunities offered throughout the Coastal Zone we have singled out Great Lakes boating and fishing as the activities with the greatest dependency on the lakes. The recreationists engaged in boating and sport fishing have an impact on the water and on coastal land use decisions. They also have a significant impact on the economy of the coastal communities.

The major objective of this report is to identify the mutual dependency between Great Lakes boaters and the economy of the coastal communities. These boaters depend on the facilities provided by the coastal communities. The coastal communities, in turn, depend on the economic benefits derived from this group of recreationists.

Recreational boating is one of the fastest growing activities among midwestern families. The percent of families participating in this activity increases by about 5.5 percent per year. The Great Lakes Basin Commission studies estimate a doubling of registered boats in the Basin between 1968 and 2020.

The increased popularity of boating can be explained with reference to many factors. Among the more important factors are the increase in regional incomes, decreasing maintenance costs due to changing materials and improvements in boat design. Lighter weight engines and overall improvements in design have made it easier to trailer, launch and use boats.

The increase in popularity of Great Lakes boating is also closely related to fish management policies. The effectiveness of lamprey control on Lake Michigan resulted in the improvement in trout fishing. The introduction of salmon into Lake Michigan by Michigan and Wisconsin Departments of Natural Resources, as well as the return of the trout, considerably increased the sports catch on Lake Michigan. Given that 83 percent of the recreational boaters surveyed during the 1975 boating season list fishing as the major purpose of their boating, it is not surprising that boating activity on the Great Lakes has increased considerably as a result of improvements in the fishing picture.

Wisconsin's Great Lakes boaters spend, on the average, 42 days boating during the season. Approximately 80 percent of their boating is on the Great Lakes. Thus, although there is some degree of substitution between boating on the Great Lakes and boating on inland waters, the users of the facilities on the Great Lakes shoreline show a definite preference toward boating on the large body of water. In a lot of cases the specific fishing interest affects the preference for the Great Lakes. Also, the higher level of investment in the boat and equipment necessary for use on the Great Lakes introduces a greater tendency to use the larger body of water for which the equipment is designed.

The majority of boaters like to boat close to home. Since 43 percent of Wisconsin's population lives in the 15 coastal counties, facility needs will be or are most pressing in parts of this coastal area. When one facility gets too crowded, there is a spillover effect up and down the coast. This means not only a less satisfying experience for the boater but, also, it results in additional cars with trailers on coastal highways, especially on crowded weekend days. It also results in increased gasoline usage, and wear and tear on the highways.

The launch facilities located in Lower Lake Michigan, Green Bay and Sturgeon Bay are already operating at or near capacity. The situation is worse for marinas. During the 1975 boating season there were 1,031 boaters on marina waiting lists. Since these slips were not available, these boaters have joined those already on the road, pulling their trailers, adding to the traffic volume and using gasoline in the process.

The current situation produces mostly mild inconveniences to boaters. However, as the number of boaters increase, the crowding and related problems will intensify and cause the satisfaction of the participants to decline and safety and other problems to increase.

There is a need for more and improved launching facilities and an increase in the number of marina slips currently available in the Coastal Zone. In terms of the objective of providing public access to the greatest number of users, one has to rank the development of new launch sites (or the expansion of existing sites) as the first priority in coastal recreational development. The launch sites along the Great Lakes shores have wide appeal to different age and income groups.

The boaters surveyed during the 1975 boating season express the need for more launch facilities and improved services at existing sites. As a group they are willing and able to pay for services received. There is, however, some confusion on the legality of charging launch fees in those instances where state aids have been accepted for the development of the launch facility. The policy of the Department of Natural Resources is stated in Chapter NR 1.32 (6) as follows:

"State boating laws (section 30.77, Wis. Stats.) authorize local units of government to charge reasonable fees for the use of access sites. Reasonable fees shall be deemed to be

those currently charged for daily entrance to state parks and forest areas and shall be stipulated prior to the granting of state aids. Fees shall not be increased without approval of the Department."

The daily fees charged at various launch sites are compatible with the policy of the Department of Natural Resources, as stated above. This policy would, however, necessitate charging much lower rates for season passes than currently considered reasonable by most coastal communities. The City of Racine, for example, is hesitant about accepting state aids for the development and expansion of its access facilities due to the limitations which will be placed on the City's ability to institute the fee schedules which are considered essential for maintaining a high quality launch facility.

A majority of the boater demands for supervision at launch sites, as well as increased services at or near launch sites, can be met by local governments by hiring launch attendants and investing in improvements of the facilities and services at the launch site provided that the costs can be recovered through user fees. Policies relating to fees charged by local governments for the use of access sites need to be re-evaluated and clarified by the Department of Natural Resources.

As for the development of harbor and other facilities, funds from two sources can be increased to aid local units of government in providing the costly facilities for the use of the Great Lakes boaters. Most Wisconsin boaters would be willing to pay increased registration fees for this purpose. Segregating a larger part of the motor fuel tax and placing the receipts in a conservation and development fund which is to be used for assisting local units of government in the development and maintenance of harbor and other boating facilities is also a desirable solution to some of the facility-related problems of Wisconsin's Great Lakes boaters.

Organization of the Report

The economic impact and needs of Wisconsin's Great Lakes boaters are summarized in Parts I and II of this report. The information is mostly based on three surveys conducted during the 1975 boating season in most coastal cities on Lake Michigan and Lake Superior.

The results of the surveys are discussed in detail in Appendices I-III. Appendix I presents and discusses regional summaries of the information from the Great Lakes Ramp User Survey. The socioeconomic profile of the boater is identified in this section, boat characteristics and boat-related spending are discussed, and boater expenditures are analyzed.

Appendix II deals with the results of the Great Lakes Marina User Survey. Once again, the socioeconomic characteristics of the user, boat and boating-related information, and daily expenditures of boaters are analyzed in this section of the report.

Appendix III focuses on the information derived from interviews with coastal marina operators. Physical characteristics of the marinas, excess demands and expansion plans, and special problems of operators are presented in this section.

Finally, Appendix IV presents information on the launch fee schedules of various coastal communities. This information is included in the report in direct response to requests from local officials of coastal communities which do not currently have launch fees.

Most of the information presented in this report is summarized by region. Site and community specific information is available upon request. In most cases, the detailed information for each community has already been made available to U.S. County Extension personnel and local officials to be used in informational programs and for planning purposes.

PART I

ECONOMIC IMPACT OF GREAT LAKES BOATERS

Wisconsin's Great Lakes boaters spent approximately \$12.7 million during the 1975 boating season, with 73 percent of this spending (\$9.3 million) occurring directly in the coastal communities. This spending would account for approximately 1,300 jobs, most of them in the coastal communities and counties. The primary beneficiaries of the daily spending by boaters were restaurants, service stations, sporting goods stores and overnight lodging establishments.

The total spending by Wisconsin's Great Lakes boaters is arrived at by adding the spending of marina users and ramp users. The \$12.7 million total admittedly understates the economic impact of this group of recreationists because the spending by an unknown number of boaters who used private launch facilities is not included in the estimates. Also, the spending by boaters using charter fishing services is not included in this total.

The information used in estimating the economic impact of Great Lakes boaters was primarily generated through three surveys conducted during the 1975 boating season. Great Lakes ramp and marina users were surveyed to determine the socioeconomic characteristics, spending and needs of these two groups of boaters. The marina operators' survey was designed to provide information on the availability of permanent docking facilities, excess demand and expansion plans.

The survey information is discussed in detail in the three appendices at the end of this report. Most of the data are summarized by three regions--Lower Lake Michigan, Upper Lake Michigan and Lake Superior. The survey results for each community have been made available to local officials and county Extension personnel.

A. ECONOMIC IMPACT OF RAMP USERS

Spending by Great Lakes Boat Ramp Users:

The information used in estimating the total spending by Great Lakes ramp users is presented on Table 1. For each of the sixteen coastal cities listed on Table 1, Column 1 shows the average spending by boating parties per trip. This information comes from the Great Lakes Ramp User Survey, Summer, 1975.

The average spending of boater parties varies considerably depending mainly on the origin composition of the boaters using the launch facilities and the average length of the trip. The average spending by boater parties is low in the coastal cities where most of the boaters live in the city and where very few tourists use the boating facilities. Oconto, Marinette, and Ashland all fall into this group of coastal cities.

Table 1: Economic Impact of Great Lakes Ramp Users on Coastal Economies

Coastal City	(1) Average Spending Per party Per Trip*	(2) Average % Spent in Coastal City*	(3) Number of Boating Parties	(4) Total Spending in Coastal Community	(5) Total Spending by Ramp Users
Ashland	\$ 11.28	96.6%	697(a)	\$ 7,597.30	\$ 7,862.16
Bayfield	166.61	50.1%	1,500(b)	125,205.00	249,915.00
Superior	104.44	75.3%	793(c)	62,361.52	82,820.92
Marinette	17.75	98.0%	572(d)	9,947.08	10,153.00
Oconto	9.55	91.2%	208(e)	1,811.68	1,986.40
Green Bay	35.73	58.5%	2,418(f)	50,536.20	86,395.14
Sturgeon Bay	94.98	77.0%	17,145	1,253,813.80	1,628,432.10
Kewaunee	27.38	64.5%	3,533	62,392.78	96,733.54
Algoma	64.80	69.7%	3,533	159,550.28	228,938.40
Two Rivers	32.06	78.3%	14,888	373,688.80	477,309.28
Manitowoc	32.47	66.5%	8,431	182,025.29	273,754.57
Sheboygan	24.37	72.0%	17,000	298,350.00	414,290.00
Port Washington	24.09	63.0%	12,000	182,160.00	289,080.00
Milwaukee	32.63	84.0%	42,085	1,153,549.80	1,373,233.50
Racine	37.13	71.5%	18,811	499,393.48	698,452.43
Kenosha	24.68	78.8%	27,532	535,497.40	679,489.76
ALL COASTAL CITIES			171,146	\$4,957,880.41	\$6,598,846.20

*Great Lakes Ramp User Survey, Summer 1975

(a) Estimate based on 15 launchings per weekend day, 5 launchings per weekday and 60-day season.

(b) Estimate based on 25 launchings per day, 60-day season.

(c) Estimate based on 23 launchings per weekend day, 5 launchings per weekday and 60-day season.

(d) Estimate based on 12 launchings per weekend day, 4 launchings per weekday and 91-day season.

(e) Estimate based on 3 launchings per weekend day, 2 launchings per weekday and 91-day season.

(f) Estimate based on 43 launchings per weekend day, 20 launchings per weekday and 91-day season.

On the other hand, the coastal cities which attract relatively large numbers of out-of-town boaters who are on extended trips or long summer vacations benefit from higher average spending by boaters. Algoma and Sturgeon Bay on Lake Michigan, Bayfield and Superior on Lake Superior fall into this group of coastal cities.

The spending by boaters using the facilities located in the remaining eleven cities is between the two extremes, varying from \$24 to \$37 per party per trip.

Column 2 shows the percentage of total boater spending which occurred in the coastal community. This information is also from the Great Lakes Ramp User Survey.

The total number of boating parties (launchings) is presented on Column 3 of Table 1. This information was provided by county and city officials and University of Wisconsin-Extension county personnel. The base information was relatively easy to obtain in the coastal cities which charge launch fees. The launch records of Sturgeon Bay, Port Washington, Milwaukee, Racine and Kenosha provided the number of single launch tickets purchased. In these cases, the use of the ramps by season pass holders was estimated by multiplying the number of season passes by the average number of Great Lakes boating days during the season obtained from the survey.

In the case of Kewaunee, Manitowoc, and Sheboygan counties, where there are no launch fees, the estimated numbers of launchings were provided by city and county sources.

In the remaining areas, the number of launches per weekday and per weekend day obtained from the survey were used to estimate the total number of launches based on a two- or three-month season. The details for each of these areas are given in the footnotes to table 1.

Boater spending in the coastal communities is presented on Column 4 of Table 1. The total spending by boaters in a coastal community is arrived at by multiplying the information in the first three columns. In other words, the average total spending per party multiplied by the percent of total spent in the coastal community multiplied by the number of boating parties yields the spending of ramp users in each coastal community.

The total spending by Great Lakes ramp users is shown on Column 5 of Table 1. The total spending figure is arrived at by multiplying the average spending per party with the number of boating parties (i.e. Column 1 x Column 3).

It must be emphasized that the total spending by ramp users in the coastal communities, as well as in the coastal area, refers to direct spending. Indirect (or multiplier) effects of boater expenditures are not included in these figures. If indirect effects of boater spending on income of coastal communities were considered, the

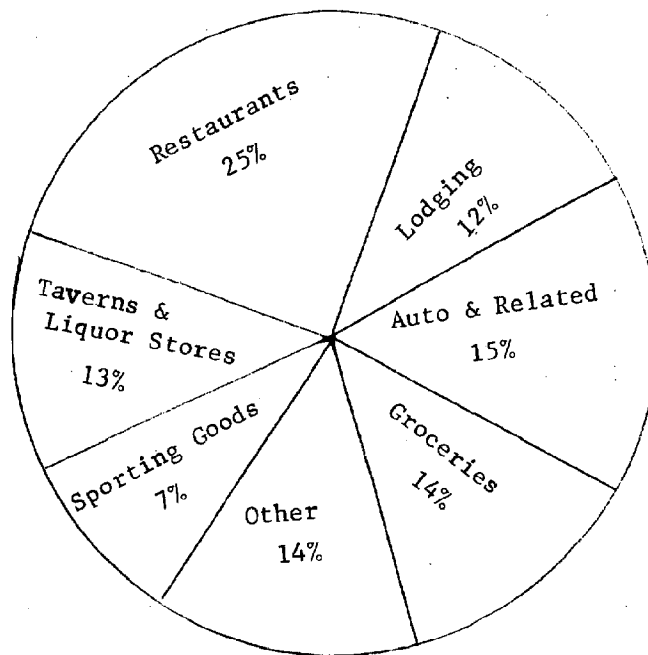
final effects on income would be approximately double the total spending figure presented on Table 1.^{1/}

The \$6.6 million spent by Great Lakes boat ramp users is not evenly distributed among the 16 coastal cities listed on Table 1. The spending by boaters using the Milwaukee boating facilities accounts for over 20 percent of the total spending by Great Lakes ramp users. Sturgeon Bay boaters account for about 25 percent, and Racine and Kenosha boaters each claim approximately 10 percent of the total spending by ramp users.

Who Benefits From the Spending by Ramp Users?

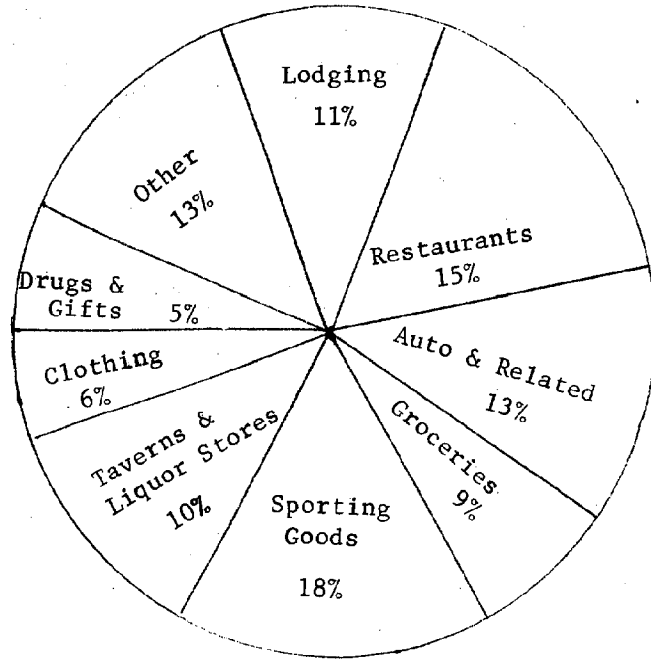
Eleven expenditure categories were identified on the questionnaire so as to provide information on the distribution of the economic benefits within the coastal communities. The breakdown of boater spending is available for each coastal community. This information is aggregated by region to provide a summary view which identifies the major beneficiaries of the spending by boater parties using coastal facilities.

LAKE SUPERIOR

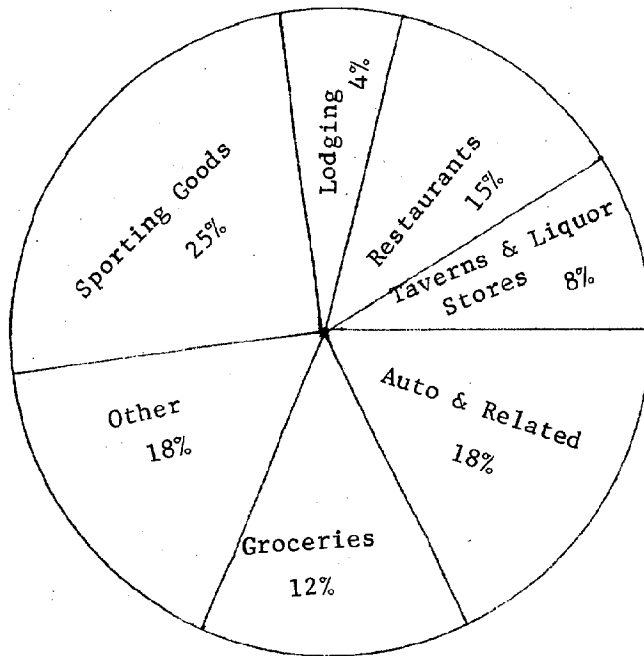


^{1/} There are very few multiplier estimates for the recreation sector of the county and community economy. A study by Professor W. A. Strand (Recreation and the Local Economy, An Input-Output Model of a Recreation-Oriented Economy, U.W. Sea Grant College Technical Report, WIS-CS-71-204, 1970) estimated the recreation spending multiplier to be 2.16 for Door County.

UPPER LAKE MICHIGAN



LOWER LAKE MICHIGAN



There are three significant differences among regions in the distribution of the boater dollar within the coastal community. The spending on lodging, sporting goods and restaurant meals are the three spending categories where considerable differences are observed among regions.

The Lake Superior and Upper Lake Michigan boaters spend a relatively greater percentage of their dollars on lodging (12% and 11%, respectively), while the comparable figure for Lower Lake Michigan boaters is only 4 percent. The main reason behind this difference is differing average lengths of trip found among boaters using the facilities in the various coastal areas. In the Lower Lake Michigan region we find 87 percent of the boaters to be day-users who live in the community or within driving distance. The corresponding figures for Upper Lake Michigan and Lake Superior are 75 percent and 56 percent, respectively. The average length of the trip varies from 1.4 days in the Lower Lake Michigan region to 2.1 days in the Lake Superior area and accounts for the differences in spending on overnight lodging.

The percentage of spending on restaurants and grocery store purchases is relatively higher in the Lake Superior region. Once again, the regional differences can be explained on the basis of differing average trip lengths.

The share of sporting goods purchases in the boater dollar is considerably higher among Lake Michigan boaters (18-25% of total) as compared to Lake Superior boaters who only allocate 7 percent of their total dollars to purchases in this category.

Despite these differences, the spending on lodging, restaurants and sporting goods accounts for 44 percent of total spending in each of the three regions.

Three other major beneficiaries of boater spending are service stations, taverns and liquor stores. Out of each dollar spent by boaters, 13 to 18 cents go for auto-related items. The share of taverns and liquor store purchases varies between 8 to 13 percent of total spending.

B. ECONOMIC IMPACT OF MARINA USERS^{2/}

Spending By Great Lakes Marina Users:

Great Lakes marina users spent over \$6 million dollars in the Coastal Zone during the 1975 boating season. Approximately 72 percent of this spending occurred directly in the coastal communities in which the marinas are located.

2/ See Appendix II for a detailed discussion of the Great Lakes Marina User Survey, Summer 1975.

The information used in estimating the spending of marina users is presented on Table 2. Column 1 shows the average spending per party per day. This information comes from the Marina Users Survey, Summer 1975. Regional spending averages are used for the communities where the number of responses were not sufficiently large to field dependable averages.

The average marina user party spends between \$33 and \$34 per day. Approximately 72 percent of this spending is in the coastal community. Boaters using the marina facilities in Kenosha and Door County spend \$45 and \$41 per day, respectively. On the other hand, Green Bay marina users spend \$21 per day.

The percentage of total spending which occurs within the coastal community (Column 2, Table 2) varies from region to region. In the Lake Superior area, 85 percent of the spending by marina users occurs in the coastal community where the marina is located. In the Lower Lake Michigan region, 77 percent of the spending is in the coastal community. And the Upper Lake Michigan marina users spend 67 percent of their dollars in the coastal communities where the marinas are located.

The average number of days of boating by marina users also differs among regions (Column 3, Table 2). The Lake Superior boaters spend approximately 45 days on the lake, whereas the Upper Lake Michigan marina users boat 50 days during the boating season. The average number of boating days is the highest for the Lower Lake Michigan area, where marina users reported boating about 60 days during the season.

The number of marina slips in each of the 27 coastal communities is presented on Column 4. The Lake Michigan marinas provide 84 percent of the 3,132 marina slips in the Coastal Zone. The availability of slips is almost evenly divided between Upper and Lower Lake Michigan.

Column 5 shows the total spending by marina users in the coastal community. This figure is arrived at by multiplying the information on the first four columns of Table 2. The total spending by marina users in the coastal area is presented on Column 6 and is the product of the figures represented on Columns 1, 3, and 4.

Who Benefits From the Spending by Marina Users?

Spending on food and beverages takes up 60 percent of total spending by marina users in each of the three regions. The largest single beneficiary of marina user spending is the restaurant. Between 22 and 30 cents of each dollar is spent in restaurants. Food store purchases account for another 17 to 20 cents of the boater dollar.

Taverns and liquor stores receive 11 cents of each dollar spent by Lake Superior boaters. The corresponding figures are 17 cents in Lower Lake Michigan and over 20 cents in Upper Lake Michigan.

- (A) Lower Lake Michigan Regional Average
- (B) Upper Lake Michigan Regional Average
- (C) Lake Superior Regional Average
- (D) Door County Average

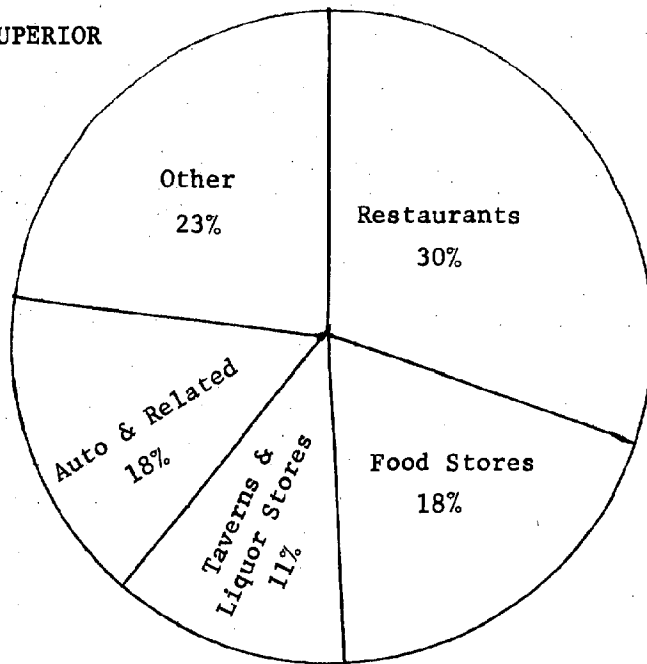
*Figures from Appendix R9
Recreational Boating, Great Lakes Basin Framework Study, 1975

**Lon C. Ruedisili, Wis. Recreational Labor Facilities Along Lake Michigan, U.W.-Parkside, Kenosha

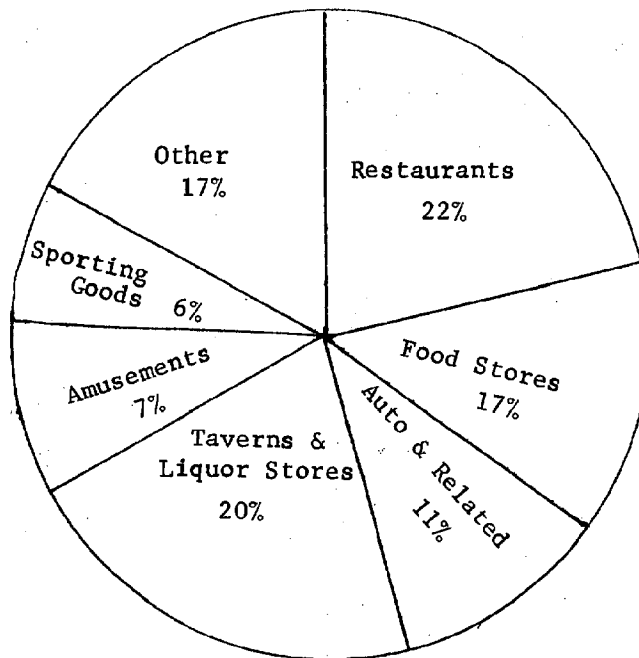
Table 2. Economic Impact of Great Lakes Marina Users on Coastal Economies

Coastal City	(1) Ave. Spending Per Party Per Day	(2) Ave. Percent Spent in Coastal City	(3) Ave. No. of Days Boating Per Season	(4) Number of Slips	(5) Total Spending in Coastal City	(6) Total Spending by Marina Users
Kenosha	\$ 44.50	54.3%	55	242**	\$ 321,616.18	\$ 592,295.00
Racine	34.61 (A)	77.3% (A)	59.80 (A)	224*	358,321.60	463,608.32
South Milwaukee	33.44	82.3%	63.25	88*	153,176.32	186,127.04
Milwaukee	33.44	82.3%	63.25	805*	1,401,215.20	1,702,639.40
Port Washington	34.61 (A)	77.3% (A)	59.80 (A)	35*	55,987.75	72,438.80
Sheboygan	33.26 (B)	67.0% (B)	49.60 (B)	61	67,409.88	100,631.09
Manitowoc	33.26 (B)	67.0% (B)	49.60 (B)	36*	39,782.88	59,338.84
Two Rivers	33.26 (B)	67.0% (B)	49.60 (B)	98*	108,297.84	161,699.62
Kewaunee	33.26 (B)	67.0% (B)	49.60 (B)	43	47,518.44	70,936.67
Algoma	33.26 (B)	67.0% (B)	49.60 (B)	74	81,775.92	122,077.06
Sturgeon Bay	40.77 (D)	59.1% (D)	55.75 (D)	280	376,042.80	636,417.60
Bailey's Harbor	40.77 (D)	59.1% (D)	55.75 (D)	46	61,778.46	104,554.32
Rowley's Bay	40.77 (D)	59.1% (D)	55.75 (D)	11	14,733.11	25,002.12
Gill's Rock	40.77 (D)	59.1% (D)	55.75 (D)	4	5,372.04	9,091.68
Ellison Bay	40.77 (D)	59.1% (D)	55.75 (D)	74	99,382.74	168,196.08
Sister Bay	40.77 (D)	59.1% (D)	55.75 (D)	40*	53,720.40	90,916.80
Ephraim	40.77 (D)	59.1% (D)	55.75 (D)	91	122,213.91	206,835.72
Fish Creek	40.77 (D)	59.1% (D)	55.75 (D)	112	150,417.12	254,567.04
Egg Harbor	40.77 (D)	59.1% (D)	55.75 (D)	58*	77,894.58	131,829.36
Green Bay	20.82	75.4%	41.74	145	94,960.50	126,007.90
Oconto	20.82	75.4%	41.74	53	34,709.70	46,058.06
Marinette	33.26 (B)	67.0% (B)	49.60 (B)	25	27,627.00	41,242.25
Bayfield	34.20 (C)	85.2% (C)	44.50 (C)	247	320,181.16	375,909.30
La Pointe	34.20 (C)	85.2% (C)	44.50 (C)	120	155,553.60	182,628.00
Cornucopia	34.20 (C)	85.2% (C)	44.50 (C)	40*	51,851.20	60,876.00
Port Wing	34.20 (C)	85.2% (C)	44.50 (C)	40*	51,851.20	60,876.00
Saxon Harbor	34.20 (C)	85.2% (C)	44.50 (C)	40	51,851.20	60,876.00
ALL COASTAL CITIES					\$4,385,242.73	\$6,113,676.07

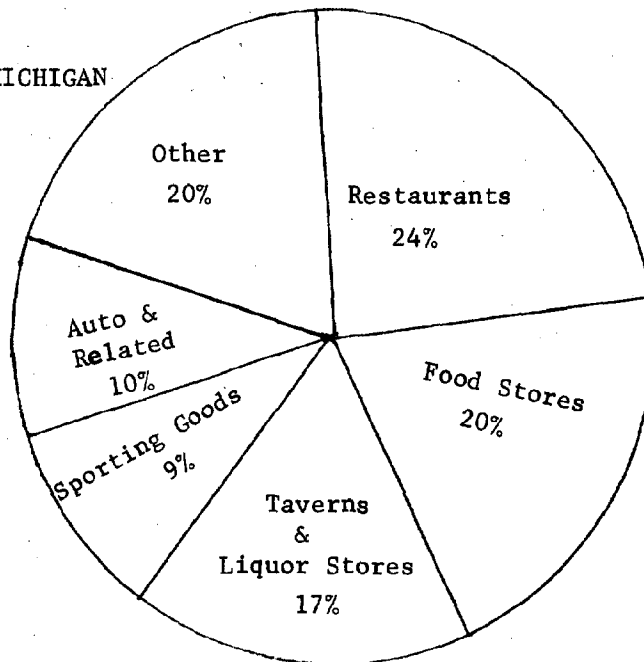
LAKE SUPERIOR



UPPER LAKE MICHIGAN



LOWER LAKE MICHIGAN



Lake Superior marina users spend a relatively larger percentage of their dollars on auto and related items (18% vs. about 10% for Lake Michigan). This difference in the spending on transportation is the result of the differences in the residence of marina users. Over half of the Lake Superior marina users are Minnesota residents.

PART II

FACILITY NEEDS AND PREFERENCES OF GREAT LAKES BOATERS

Great Lakes boaters surveyed during the summer of 1975, and especially those boating on Lake Michigan, overwhelmingly expressed a need for more and improved launching facilities. The major complaint of most ramp users is the long wait for launching and the long wait for pulling out of the water, especially during weekends and holidays. Another major complaint of ramp users is the limited number of facilities and services at or near the boat launch site. The number and condition of rest rooms was a frequently mentioned complaint, along with need for gasoline availability, weather information, food and refreshments.

A large number of the boaters surveyed found parking facilities inadequate, especially on weekends. A frequently expressed complaint dealt with the difficulty of maneuvering the car and trailer in crowded parking lots provided for boater use.

There were two other items mentioned by boaters using most of the launch sites on the Great Lakes. First, the need for temporary overnight docking facilities was often emphasized by writing it in as a most desirable improvement at the launch site. Secondly, boaters requested ramp assistance and supervision to ensure some degree of order, especially on days when ramp usage is high. Such assistance and supervision are especially critical during the different types of fishing seasons when ramp use is very high and during times when new boaters are attempting to launch, delaying the rest of the users.

The questionnaire provided the boaters with an opportunity for identifying the facilities and services they considered essential or important at or near the launch site. The results, tabulated on Table 3, provide a summary view of the preferences and needs of Great Lakes ramp users for facilities and services. Only 42 percent of the boaters rated the existing launch facilities as adequate. The remaining 58 percent felt that improvements were needed to enhance their recreational boating experience.

Among the facilities and services considered essential by the majority of boaters are auto and trailer parking (83% consider it essential), toilets (63% consider it essential), and weather and navigational information (64% consider it essential). The availability of launching equipment was also considered essential by a majority of the boaters although the ramp users' boats are not large enough to require this type of equipment. Most probably, the respondents confused launching equipment with more launching facilities (i.e., more lanes, help, etc.).

Also, over a third of the boaters surveyed consider the availability of gas and fishing information at or near the launch area essential services.

Forty-three percent of the ramp users say that they are willing to pay \$2 or more per launching at a launch site which provides adequate facilities and services.

These results are available by launch facility and have been made available to coastal communities to serve as an indicator of boater preferences and needs. They can also be used as a guide to what the boater will purchase at or around the launch site.

Marina Users:

Marina users' complaints and suggestions vary from area to area. There were, however, a number of suggestions repeated by marina users in most Great Lakes communities surveyed. Improved facilities and services was one of the suggestions repeated throughout the three regions. They also expressed the need for more docks, more and cleaner toilets and showers, repair services, boating supplies, food and pumpouts.

The Lake Michigan marina users emphasized the need for additional public marinas and/or additional slips. Stricter supervision of boaters and fishermen was often suggested by marina users in Bayfield, Door and Milwaukee counties. These results are tabulated in detail in Appendix III.

Table 3. Service and Facility Needs and Preferences

	Essential	Important	Not Important	N.A.
	Percent			
Launching Equipment	55.2	17.0	27.2	.6
Overnight Docking Space	15.9	28.5	55.2	.3
Wkly/Mo. Dockage Rental	14.5	22.1	63.0	.4
Boat Waste Pump	19.4	24.9	55.2	.4
Gas	39.8	31.0	28.9	.2
Storage	6.7	14.7	78.2	.4
Boat Repair/Services	14.9	30.5	54.0	.6
Toilets	62.7	26.6	10.3	.3
Hose and Water	20.3	28.4	50.9	.4
Electrical Hookups	10.9	19.8	68.7	.6
Fishing Information	34.7	39.3	25.6	.4
Navig./Weather Information	64.2	23.1	12.6	.1
Fish Clearning, Storage	18.8	25.9	54.9	.4
Boating & Fishing Supplies	16.5	39.1	44.0	.4
Food & Refreshments	18.6	40.4	40.6	.4
Auto & Trailer Parking	82.8	10.7	6.3	.2

A P P E N D I X I

GREAT LAKES BOAT RAMP

USER SURVEY

SUMMER, 1975

GREAT LAKES BOAT RAMP USER SURVEY

The Great Lakes Boat Ramp User Survey was conducted during July and August, 1975 for the purposes of determining the socioeconomic profile of the Great Lakes boaters, their needs and economic impact in coastal communities. A mailback questionnaire was handed out to boaters as they pulled out of the lake. The survey distributors varied from county to county. Where possible, launch site attendants were asked to hand out surveys on designated days. In areas where the launch sites are unmanned, either the county Extension offices employed students to hand out surveys or students from U.W.-Green Bay assumed this task as a part of a class project dealing with the boater surveys. Thus, there was some variation in the type (and, possibly, attitudes) of the persons administering the survey at different sites.

Survey forms were handed out at each site on four randomly selected days--two weekdays and two weekend days. In case of rain, surveys were distributed on the day following the randomly selected day. Holidays and special events were avoided so as not to bias results. The average return rate was 30 percent, with 916 completed questionnaires.

Survey forms were distributed at the following 23 launch sites:

1. Kenosha
2. Racine
3. Milwaukee I - McKinley
4. Milwaukee II - So. Shore
5. Port Washington
6. Sheboygan I - Yacht Club
7. Sheboygan II - Old Toolhouse
8. Two Rivers
9. Manitowoc
10. Kewaunee
11. Algoma
12. Sturgeon Bay
13. Green Bay I - Yacht Club
14. Green Bay II - Main Street
15. Oconto
16. Marinette I - Little River
17. Marinette II - Red Arrow
18. Saxon Harbor
19. Ashland
20. Bayfield I - Port Industries
21. Bayfield II - Apostle Is. Marina
22. Cornucopia
23. Superior - Barker's Island

The sites along Lake Superior did not yield sufficiently high numbers of returns per site to allow meaningful analysis on a site-by-site basis. On Lake Michigan, only Oconto and Marinette sites presented the

same problem, mainly due to the small number of boaters using the public ramps.

The survey has two shortcomings. First, some communities did not keep records on how many surveys were handed out during the four survey days. Thus, a return rate cannot be established for these survey sites. Secondly, there appears to be a bias in the returns in favor of the local users of ramps. In other words, we feel that the boaters who have a stake in seeing improvements in the ramps which they use most frequently tended to have a higher response rate as compared to nonresidents of the coastal community and/or county.

If, in fact, the local return rate is higher than the return rate of nonresidents, this can be expected to result in the understatement of the impact of boater spending on the income and employment of the coastal economies.

SOCIOECONOMIC PROFILE OF THE GREAT LAKES BOATER

The average Great Lakes ramp user is 45 years old, with a family of approximately four persons, including himself. He is married and is either in a professional, sales or service occupation, or is engaged in skilled or semi-skilled labor. Three out of four boaters are in the \$10,000 to \$25,000 income group and a majority of boaters live in the same city or the same county where the ramp is located.

AGE: Boating appears to be a 'lifetime sport' as evidenced by the relatively even distribution of boaters between 25 and 64 years of age. Only four percent of the Great Lakes boaters are under 25 and only two percent of them are over 65 years of age; the great majority of the boaters are between 25 and 64, with about 75 percent between 25 and 54 years of age. The relatively large investment in the boat and the necessary annual spending on maintenance and other boat-related expenses effectively rules out Great Lakes boating for the under 25 age group.

There are no significant differences in age distribution of boaters among the three Great Lakes regions (see Table I-1).

FAMILY CHARACTERISTICS: Approximately three out of four are married with a family of about four persons (counting the boater). Once again, there is very little variation in the family characteristics of boaters between the three Great Lakes regions.

OCCUPATION OF BOATERS: The largest concentration of occupations is found in the professional/managerial category in all three regions. The Lake Superior region shows the largest concentration of boaters in this category, with 40 percent of the sample engaged in a professional or managerial occupation. The corresponding percentages in Upper and Lower Lake Michigan are 23 and 22 percent, respectively.

Table I-1. Socioeconomic Profile of the Great Lakes Boater

	Lake Superior N=50	Upper Lake Michigan N=447	Lower Lake Michigan N=419	Total Sample N=916
FAMILY SIZE	3.94 people	4.09 people	3.81 people	3.94 people
<u>Age</u>				
24 yrs. or less	2%	4%	5%	4%
25-34 years	20	22	24	23
35-44 years	36	33	29	31
45-54 years	22	21	26	23
55-64 years	14	13	12	12
65+ years	4	3	2	2
N.A.	2	4	2	5
<u>OCCUPATION</u>				
Professional/managerial	40%	23%	22%	23%
Clerical	6	1	1	1
Sales/Service	22	18	18	18
Skilled labor	6	15	15	14
Semiskilled labor	6	15	24	18
Unskilled labor	8	9	9	9
Farmer	-	1	-	-
N.I.L.F.	4	8	4	6
N.A.	8	8	7	10
<u>OCCUPATION (SPOUSE)</u>				
Professional/managerial	10%	7%	8%	8%
Clerical	8	11	8	10
Sales/Service	4	5	5	5
Skilled labor	-	1	1	1
Semi-skilled labor	2	1	3	2
Unskilled labor	-	4	3	4
Housewife	48	49	45	47
N.I.L.F.	4	1	1	1
N.A.	24	21	26	23
<u>FAMILY INCOME</u>				
\$5,000 or less	4%	1%	1%	1%
\$5,000 - \$9,999	20	9	5	8
10,000 - 14,999	16	31	26	28
15,000 - 24,999	36	41	48	44
25,000 and over	20	11	18	14
N.A.	4	7	2	5
<u>RESIDENCE</u>				
Same region as ramp	46%	72%	78%	(92%
Other Wisconsin	16	21	17	(6
Cut-of-State	38	5	3	2
N.A.	-	2	2	2

The next highest concentration of occupations is in sales and service type of jobs. Twenty-two percent of Lake Superior boaters and 18 percent of the remaining boaters are engaged in sales or service occupations.

Skilled laborers account for 15 percent of the Lake Michigan boaters and 6 percent of the Lake Superior boaters. Semi-skilled laborers constitute 24 percent of the Lower Lake Michigan boaters, while the corresponding percentages are 15 percent in the Upper Lake Michigan area and 6 percent in the Lake Superior region.

Unskilled laborers constitute a surprising 9 percent of the sample. Farmers, who have a poor showing in any type of recreational survey, once again account for less than 1 percent of the total sample.

OCCUPATION OF SPOUSE: Twenty-three percent of the Great Lakes boaters are not married. Another 47 percent of the boaters report their spouses' occupation as housewife. The remaining 30 percent of the boaters have working spouses, with 8 percent engaged in professional/managerial occupations and 10 percent engaged in clerical work. Sales and service jobs account for another 5 percent of the working spouses and 4 percent of the working women are in the unskilled labor category.

FAMILY INCOME: The Great Lakes ramp users, unlike the marina users, are relatively evenly distributed over the different income groups. In the total sample, nine percent of the boaters have a family income of less than \$10,000. In the Lake Superior region, the boaters with less than \$10,000 family income make up 24 percent of the regional sample.

Another 28 percent of the total sample report a family income between \$10,000 and \$15,000 per year. The largest concentration of boaters, however, is found in the \$15,000 to \$25,000 income category. The boater families in this group constitute 36 percent of the Lake Superior boaters, 41 percent of the Upper Lake Michigan boaters and 48 percent of the Lower Lake Michigan boaters.

The boaters with a family income of over \$25,000 per year make up 14 percent of the total sample, 20 percent of the Lake Superior boaters, 11 percent of the Upper Lake Michigan boaters and 18 percent of the Lower Lake Michigan boaters.

RESIDENCE: In the Lake Michigan regions, three out of four boaters live in the same region as the ramp they use, while about 18 percent of the boaters come from other Wisconsin counties and about 4 percent are residents of other states.

The residence distribution of Lake Superior boaters shows differences from that of Lake Michigan boaters. The boaters from within the region account for only 46 percent of the boaters while out-of-staters make up 38 percent of the regional sample in the Lake Superior area.

MAJOR PURPOSE OF BOATING AND THE TRIP CHARACTERISTICS

The overwhelming majority of the Great Lakes boaters list the major purpose of their boating as fishing. Approximately 82 percent of the Upper Lake Michigan boaters and 88 percent of the Lower Lake Michigan boaters have fishing as the major purpose of their boating activity. In the Lake Michigan regions, cruising is the second major purpose reported, while sailing is ranked third. Approximately 3 percent of the Upper Lake Michigan boaters list water skiing as their major activity while boating.

In the Lake Superior region, fishing is still ranked number one with 58 percent of the regional sample reporting this to be the major purpose of their boating activity. Sailing, however, is ranked second in this region with 20 percent and cruising is ranked third with 12 percent. Despite the cold water temperatures, 2 percent of the boaters list water skiing as the major purpose of their boating activity.

Table I-2. Major Purpose of Boating

	Lake Superior	Upper Lake Michigan	Lower Lake Michigan	Total Sample
Cruising	12.0%	11.6%	6.9%	9.5%
Fishing	58.0	81.7	87.8	83.2
Water Skiing	2.0	2.9	0.5	1.7
Sailing	20.0	1.8	3.6	3.6
Combination of above	8.0	2.0	1.2	2.0
Total	100.0	100.0	100.0	100.0

The average boating trip lasts 1.67 days. The trip length is approximately two days in the Lake Superior and Upper Lake Michigan regions, with a larger percentage of boaters staying overnight or longer in the community or in the region. In the Lower Lake Michigan area, 87 percent of the boaters are on a one-day trip and the remaining 13 percent stay overnight or longer in the community or in the regions (table I-3). The percent of boaters staying overnight or longer increases to 25 percent in the Upper Lake Michigan region and to 44 percent in the Lake Superior area.

Table I-3. Trip Characteristics

	Lake Superior N=50	Upper Lake Michigan N=447	Lower Lake Michigan N=419	Total Sample N=916
Average length of trip-	2.1 days	1.9 days	1.4 days	1.67 days
Day Users	56%	75%	87%	79%
Staying in community where ramp is located	34%	22%	11%	18%
Staying elsewhere	10%	3%	2%	3%
Total	100%	100%	100%	100%

TOTAL BOATING DAYS PER SEASON BY GREAT LAKES BOATERS

The average Great Lakes ramp user reports boating 42.3 days during the boating season. The Lake Superior boaters have the lowest average number of boating days--40 days per season, while the Lower Lake Michigan boaters report about 44 days of boating during the season.

The Great Lakes ramp users do most of their boating on the Great Lakes. The Lake Superior ramp users report that 76 percent of their boating is on the Great Lakes, while the Lake Michigan ramp users do 80 percent of their boating on the Great Lakes. Thus, a majority of the Great Lakes ramp users are equipped for and prefer to boat on the Great Lakes.

Table I-4. Total Boating Days per Season and Percent of Boating on the Great Lakes

	Lake Superior N=50	Upper Lake Michigan N=447	Lower Lake Michigan N=419	Total Sample N=916
Total boating days per season	40 days	41 days	43.9 days	42.3 days
Percent of boating on the Great Lakes	76%	80%	79%	79%
Total boating days on the Great Lakes per season	30.4 days	32.8 days	34.7 days	33.4 days

BOAT CHARACTERISTICS AND BOAT-RELATED COSTS

An overwhelming majority (94%) of the trailered boats using Lake Michigan ramps are between 17 and 22 feet. In the Lake Superior area, 78 percent of the trailered boats are in the 16-22 foot length category, while another 20 percent are over 22 feet.

Table I-5 shows the type of boat owned by ramp users. Once again, the Upper and Lower Lake Michigan regions' boaters are quite similar in the distribution of their boat types, while the Lake Superior boaters differ from their counterparts on Lake Michigan.

Approximately 70 percent of the boats using Lake Michigan ramps are outboards while only 42 percent of the boats using the Lake Superior ramps are outboards. Inboards/outboards account for about a quarter of the boats in all regions. The difference in the type of boats owned by boaters on the two lakes is accounted for by inboards (10%) and sailboats (22%) in the Lake Superior region. Trailered inboards and sailboats constitute a much smaller percentage of trailered boats using Lake Michigan ramps.

Table I-5. Type of Boat Owned by Ramp Users

	Lake Superior N=50	Upper Lake Michigan N=447	Lower Lake Michigan N=419	Total Sample N=916
Inboard	10%	2.7%	3.1%	3.3%
Outboard	42	68.9	70.6	68.2
Inboard/outboard	26	26.0	22.2	24.2
Sailboat	22	2.0	4.1	4.0
Other	-	0.4	-	0.2
Total	100	100.0	100.0	100.0

The average cost of the boat and trailer and the annual boat-related spending by the boaters are shown on Table I-6 by region. The average cost of the boat and trailer is \$4,360 for the total sample. Lake Superior boat and trailer costs are above average, which is consistent with the relatively larger sized boats reported in that region, as well as the relatively higher number of inboards owned by the Lake Superior boaters.

The annual boat-related costs average \$530 for the total sample. The Lake Superior boaters have the lowest annual boat-related spending which is almost totally a result of the relatively lower amounts spent on gas and oil as compared to the Lake Michigan boaters. The

reason for this difference in spending on gas and oil is accounted for by the relatively larger percentage of sailboats in the Lake Superior regional sample.

Table I-6. Boat and Related Costs

	Lake Superior N=50	Upper Lake Michigan N=447	Lower Lake Michigan N=419	Total Sample N=916
Cost of Boat and Trailer	\$4,763	\$4,188	\$4,498	\$4,360
<u>Annual Spending</u>				
Insurance	\$ 61.54	\$ 73.53	\$ 77.76	\$ 74.99
Repairs/maintenance	72.30	69.30	75.57	72.47
Gas and Oil	151.50	197.90	195.90	194.70
Equipment	141.90	136.40	151.20	144.10
Launching Fees and docking	71.72	26.72	57.85	43.74
Total	\$498.96	\$503.85	\$558.28	\$530.00

The major part of the approximately \$50 difference in the annual boat-related spending between Upper and Lower Lake Michigan boaters is accounted for by launching and docking fees, which are either non-existent or lower in the Upper Lake Michigan region.

AVERAGE SPENDING OF BOATER PARTIES

The average spending of boater parties per trip is shown on Table I-7 by region for eleven expenditure categories. The average boating party, while on their 1.67 days trip, spends \$41.19 on a variety of goods and services. The highest spending per boating party is in the Lake Superior area (\$71), followed by Upper Lake Michigan boaters (\$45) and Lower Lake Michigan boater parties (\$33). The differences among the boater parties in the three regions is largely explained by the differences in the average length of their trips which follow the same order.

The percentage distribution of the boater spending in the three regions allows comparisons of where the boater dollar goes. There are a number of differences among the regions. For example, 11-12 cents of every dollar spent by Lake Superior and Upper Lake Michigan boaters goes for lodging, while only 4 cents of the Lower Lake Michigan boaters' dollar is spent on lodging. The difference is a function of the differing lengths of stay among the boaters of the three regions. Also, 10 cents more is spent on restaurant purchases by Lake Superior boaters than their Lake Michigan counterparts, which is again a function of the length of stay.

Table I-7. Average Spending of Boating Parties

	Lake Superior N=50	Upper Lake Michigan N=447	Lower Lake Michigan N=419	Total Sample N=916
Lodging	\$ 8.63 12.2%	\$ 5.17 11.4%	\$ 1.30 3.9%	\$ 3.70 9.0%
Restaurants	17.67 24.9	6.82 15.1	5.11 15.4	6.62 16.1
Auto Related	10.73 15.1	5.72 12.7	6.02 18.1	6.13 14.9
Groceries	10.18 14.3	3.93 8.7	3.99 12.0	4.30 10.4
Clothing	1.79 2.5	2.63 5.8	1.02 3.1	1.84 4.5
Sporting Goods	4.73 6.7	8.29 18.3	8.31 25.0	8.11 19.7
Drugs and Gifts	1.42 2.0	2.28 5.0	0.46 1.4	1.39 3.4
Taverns	6.00 8.5	3.25 7.2	1.32 4.0	2.50 6.1
Liquor	3.08 4.3	1.28 2.8	1.46 4.4	1.46 3.5
Hardware	0.38 0.5	0.52 1.2	0.23 0.7	0.38 0.9
Other	6.38 9.0	5.30 11.7	4.00 12.0	4.76 11.5
Total	\$70.99 100.0%	\$45.19 100.0%	\$33.22 100.0%	\$41.19 100.0%
Percent of spending in the community where ramp is located	69%	68%	76%	

On the other hand, the Lake Michigan boaters spend 18-25 cents out of every dollar on sporting goods purchases while the corresponding amount for Lake Superior boaters is only 7 cents per dollar.

Another difference in spending by boaters of the three regions is in clothing, drugs and gift purchases. The Upper Lake Michigan boaters spend relatively more on these items than their counterparts in the other regions. This difference is most probably explained by the ready availability of clothing and gift items in the multitude of tourist centers scattered over the Upper Lake Michigan region.

Finally, the percent of total boater spending which occurs in the community where the ramp is located is important for determining the economic impact of boaters on Great Lakes cities. The percentages reported at the bottom of Table I-7 show that the Lower Lake Michigan boaters do 76 percent of their spending in the community where the ramp is located, while the Upper Lake Michigan and Lake Superior boaters leave about 68 percent of their dollars in the community where they boat.

A P P E N D I X I I

GREAT LAKES MARINA USER SURVEY

SUMMER, 1975

GREAT LAKES MARINA USER SURVEY

The Great Lakes Marina User Survey was conducted during August, 1975 for the purpose of determining the socioeconomic profile, needs and spending of this group of boaters using the coastal facilities. Survey forms were given to all marina operators on or with access to the Great Lakes to be distributed to patrons at the first opportunity. Cost, time and other considerations (mainly the difficulty of obtaining names and addresses of marina patrons) prohibited a direct mail survey.

The overall response rate was approximately 10 percent and 204 usable returns were received from this mail-back survey. The information from the marina user questionnaires is summarized by region so as to avoid biases resulting from small numbers of observations at the county or community levels.

SOCIOECONOMIC PROFILE OF THE MARINA USER

The average marina user in the survey is in his mid-forties, married, with a family of approximately 3.5 people (including himself). Approximately half of the respondents are in the professional/managerial occupations. At least two out of three marina users surveyed have a family income in excess of \$20,000 a year. The major socioeconomic characteristics of the marina users appear on Table II-1 and are discussed below:

Age and Family Characteristics: The average age of the marina user in the Lake Superior region is 43 years old, while his counterparts in the Upper and Lower Lake Michigan regions are 47 and 45 years old, respectively. The average family size of the marina users show a small variance from region to region. The average family size of the Lake Superior marina user is 3.17 persons, while the Upper Lake Michigan marina users have a family of 3.66 persons.

Occupation: The professional and managerial occupations show the largest concentration of marina users in all three regions. Fifty-five percent of respondents in the Lake Superior region are in the professional/managerial occupations, while 43 percent of the respondents in both Upper and Lower Lake Michigan regions are in this category.

In the Lake Superior region, the second largest group (14%) is 'not in the labor force'--most probably retired persons, followed by self-employed and sales and service occupations (11% each).

In the Upper Lake Michigan region, sales and service workers and skilled laborers make up the second and third largest occupational groups (22% and 13%, respectively). The same ranking of occupations is also true of the Lower Lake Michigan marina users, with 27 percent engaged in sales and service occupations and 8 percent engaged in some form of skilled labor.

Table II-1. Socioeconomic Characteristics of Marina Users

	Lake Superior N=29	Upper Lake Michigan N=109	Lower Lake Michigan N=66
Average age of boat owner	43	47	45
Average family size	3.17 persons	3.84 persons	3.66 persons
<u>Occupation of boat owner:</u>			
Professional/managerial	55%	43%	43%
Clerical/Kindred	-	1	-
Sales and Service	11	22	27
Skilled labor	-	13	8
Semi-skilled	-	3	2
Unskilled	7	3	3
Self-employed	11	4	5
N.I.L.F.	14	9	2
N.A.	3	2	10
<u>Family Income:</u>			
\$ 5,000 and under	4%	1%	-%
5,000 - 9,999	10	3	-
10,000 - 14,999	4	13	9
15,000 - 19,999	17	18	11
20,000 - 24,999	31	18	17
25,000 and over	34	42	54
N.A.	-	5	9

Family Income: Fully 65 percent of the Lake Superior marina users are in the \$20,000 and higher income categories, while only 18 percent make less than \$15,000 a year. In the Upper Lake Michigan region, 60 percent of the respondents are in the \$20,000 and higher income category, while 17 percent make less than \$15,000 a year. Among Lower Lake Michigan marina users, 71 percent make more than \$20,000 a year and only 9 percent are in the \$10-15,000 income bracket.

Approximately one-third of the marina users have a working spouse. Thirty-eight percent of the Lake Superior marina users, 35 percent of the Upper Lake Michigan marina users and 32 percent of the Lower Lake Michigan marina users' spouses are in the labor force. Furthermore, approximately half of the working spouses are in the professional/managerial occupations. Hence, the relatively high family income of the marina users is to some extent a result of two working adults in the household.

Residence:

Lake Superior - Twenty-one percent of the respondents live in Bayfield or surrounding towns. Another 12 percent came from surrounding northern and western Wisconsin counties. Milwaukee and Ozaukee County residents accounted for 6 percent of respondents. The major out-of-state markets for Wisconsin's Lake Superior marinas are in Minnesota. The Twin Cities market accounted for 44 percent of the marina users in the survey, while Duluth and Rochester, Minnesota accounted for 7 percent each of the total marina users who responded in the survey.

Upper Lake Michigan - The residents of the Upper Lake Michigan counties accounted for 63.4 percent of the marina users responding to the survey. Among these counties, Brown County residents constituted the largest percentage of the total, with 50.5 percent of the 109 responses coming from Brown County residents. Waukesha and Milwaukee County residents, together, accounted for 12.8 percent of the responses, while other Wisconsin residents constituted 11 percent of the total. Residents of the Chicago area were 12.8 percent of the total.

Lower Lake Michigan - Milwaukee County residents constituted 63.7 percent of the marina users responding to the survey. Other lower Lake Michigan counties yielded 7.5 percent of the responses and Waukesha County residents returned another 9 percent of the total responses. Residents of the Chicago area constituted 18.2 percent of the total responses. The residence of 1.5 percent of the respondents was not ascertained.

The one conclusion that can be drawn from the information on the residence of Great Lakes marina users is on the major out-of-state markets for the different regions. The above summarized information suggests that the major out-of-state markets for the Lake Superior marinas are in Minnesota. On the other hand, the major out-of-state markets for the Lake Michigan marinas are in the Chicago area. Furthermore, proximity also plays an important role in determining the demand for slips by Wisconsin residents. The counties surrounding the city where the marina is located produce a greater percentage of the users than counties which are farther away.

BOAT CHARACTERISTICS AND BOATING-RELATED SPENDING AMONG
MARINA USERS

Two-thirds of the Lake Superior marina users listed the primary purpose of their boating as sailing, while only 28 percent cited cruising as the primary purpose of their boating, and only 7 percent went boating for the purpose of fishing. The picture is reversed for the Lake Michigan marina users. The majority of Upper Lake Michigan and Lower Lake Michigan marina users cited cruising as the primary purpose of their boating (62% and 58%, respectively). The sailors were second with 29 percent of marina users in Upper Lake Michigan and 20 percent

of marina users in Lower Lake Michigan. Once again, fishing was third with 9 percent of Upper Lake Michigan marina users and 17 percent of Lower Lake Michigan marina users citing fishing as the primary purpose of their boating.

Outboards are the least popular type of boats among the marina users in all three regions (table II-2). Sailboats were the dominant type of boat owned among the respondents from the Lake Superior region (65%). The dominant type of boat owned by Lake Michigan marina users was an inboard. Fully half of the Lower Lake Michigan and 37 percent of the Upper Lake Michigan marina users own inboards. Sailboats are the second most popular type of boat, followed by inboard/outboards.

Table II-2. Type of Boat Owned by Marina Users

	Lake Superior N=29	Upper Lake Michigan N=109	Lower Lake Michigan N=66
Inboard	14%	37%	50%
Inboard/Outboard	14	24	21
Outboard	7	9	2
Sailboat	65	29	24
Other	-	1	3
Total	100	100	100

The majority of the Lake Superior marina users own boats that are 23-30 feet. Only 21 percent of the Lake Superior boats are over 30 feet. Upper Lake Michigan marina users' boats are relatively evenly distributed over the different length categories as compared to the other regions. Approximately 40 percent of the Upper Lake Michigan boats are in the 23-30 foot category and 32 percent are over 30 feet (table II-3). The Upper Lake Michigan marina users have the largest concentration of boats in the 16-22 foot category among the three regions, possibly due to the greater number of small boat harbors on the baysside of the Door County Peninsula.

Table II-3. Length of Boats Owned by Marina Users

	Lake Superior N=29	Upper Lake Michigan N=109	Lower Lake Michigan N=66
Less than 15 feet	3.5%	- %	1.5%
16-22 feet	14.0	28.4	12.1
23-30 feet	61.5	39.5	36.4
31-38 feet	14.0	22.0	47.0
39+ feet	7.0	10.1	3.0
Total	100.0	100.0	100.0

The boats owned by the Lower Lake Michigan users are concentrated in the 31-38 foot length category (47%), followed by the 23-30 footers (36.4%).

Compared to public and private ramp users, marina users have a much greater investment in their boats and spend a great deal more on boat-related items every year. The average cost of the boats among the Lake Superior marina users is \$22,140. The average cost of the Upper Lake Michigan marina user's boat is \$15,880 and the Lower Lake Michigan user spent an average of \$22,932 on his boat.

The average annual boat-related expenditures, once again, underscore the high income-nature of this particular type of boating. The docking fees, operating, maintenance and insurance costs amount to a sizable expenditure (table II-4) which is beyond the means of the average household. The differences among the three regions are partly a function of the differences in the size and type of boats and partly a function of the differences in the docking and slip rental fees.

Table II-4. Average Annual Boat-Related Expenditures

	Lake Superior N=29	Upper Lake Michigan N=109	Lower Lake Michigan N=66
Insurance	\$ 205	\$ 239	\$ 236
Repairs/maintenance	256	332	392
Gas/oil	322	310	423
Equipment	311	287	411
Launching/dockage	329	337	557
Total	\$1,423	\$1,505	\$2,019

THE BOATING PARTY, BOATING DAYS AND AVERAGE DAILY SPENDING OF MARINA USERS

The average size of the boating party is identical for all three regions--approximately 3.5 persons. The Lake Superior marina user boats, on the average, 45 days per season, while his counterparts in Upper Lake Michigan boat 50 days per season. The Lower Lake Michigan marina users spend an average of 60 days on the lake during the boating season.

The average daily expenditures of the marina users differ very little from region to region (table II-5). The average marina user spends between \$33 and \$34 per day, per party. There are, however, differences in the distribution of the dollars over the eleven items

which constitute the total daily spending of boaters. For example, a relatively greater percentage of the daily spending of Lake Superior marina users is taken up by auto-related items, possibly due to the greater distances traveled to get to the marinas. Taverns receive 11 cents of every dollar spent by marina users in Upper Lake Michigan while the taverns' share of the marina users' dollar is only 4 cents in the other two regions. Over 12 cents of the dollar spent by the Lower Lake Michigan marina users go to liquor purchases, whereas the same item takes 7 and 9 cents, respectively, of the dollar spent by the Lake Superior and Upper Lake Michigan marina users.

Table II-5. Average Daily Expenditures of Marina Users

	Lake Superior N=29		Upper Lake Michigan N=109		Lower Lake Michigan N=66	
Lodging	\$ 2.34	6.8%	\$ 1.29	4.0%	\$ 0.68	2.0%
Restaurants	10.31	30.1	7.37	22.1	8.31	24.0
Auto-related	6.10	17.8	3.50	10.5	3.34	9.6
Amusements	1.34	4.0	2.44	7.3	1.44	4.1
Food Stores	6.14	18.0	5.68	17.1	6.78	19.5
Clothing-related	1.79	5.2	1.39	4.2	1.99	5.7
Sporting Goods	0.52	1.5	1.85	5.6	3.08	8.9
Drugs and Gifts	1.00	3.0	1.00	3.0	0.75	2.2
Taverns	1.45	4.2	3.74	11.2	1.42	4.1
Liquor	2.28	6.7	3.07	9.2	4.29	12.4
Other	0.93	2.7	1.93	5.8	2.60	7.5
Total	\$34.20	100.0%	\$33.26	100.0%	\$34.68	100.0%
Percent of Total Spending in Great Lakes Community						
	85%		67%		77%	

The Lake Superior marina users spend a relatively larger percentage on restaurant purchases (30 cents of each dollar versus 22 and 24 cents in the other regions). The Upper Lake Michigan marina users spend relatively larger percentages of each dollar on amusements, as compared to the other two regions. Finally, there is a difference in the share of sporting goods purchases as a percentage of each dollar spent by the marina users in different regions. Only 1.5 cents of the Lake Superior marina users' dollar is spent on sporting goods, whereas the same item takes 5.6 cents and 8.9 cents, respectively of each dollar spent by the Upper Lake Michigan and Lower Lake Michigan users.

MARINA USER SUGGESTIONS AND COMPLAINTS

Marina user complaints and suggestions vary from area to area. The major suggestions and complaints are tabulated below by county or county groupings. The percent of respondents making the same or similar suggestions is identified next to each item listed.

A number of suggestions were repeated by marina users in almost every Great Lakes community surveyed. Improved facilities and services was one of the suggestions repeated throughout all three regions. The marina users requested more docks, toilets, showers, repair service, boating supplies, food and pumpouts.

In all Lake Michigan communities, the marina users requested additional public marinas and/or additional slips. A large number of Upper Lake Michigan marina users cited the adequacy of boating facilities offered in numerous communities in the state of Michigan.

Stricter supervision of boaters and fishermen was suggested by marina users in the Bayfield area, Door and Milwaukee counties.

All major responses are tabulated below:

BAYFIELD AREA

- Additional breakwater to protect against northeast winds. . . .(50%)
- Improved facilities and services (docks, toilets, showers, repair service, boating supplies, food, pumpouts, etc.) . .(35%)
- Additional parking (15%)
- Tennis courts, golf courses nearby. (12%)
- Overnight docking facilities at Apostle Islands (12%)
- Stricter supervision of boating and fishing (12%)

MANITOWOC AND KEWAUNEE COUNTIES

- Improved facilities and services (docks, toilets, showers, repair service, boating supplies, food, pumpouts, etc.) . .(71%)
- Additional public marinas, slips (29%)

DOOR COUNTY

- Improved facilities and services (docks, toilets, showers, repair service, boating supplies, food, pumpouts, etc.) . .(76%)
- Additional public marinas, slips* (36%)
- Stricter supervision of boating and fishing (16%)
- Improved weather information (6%)
- Additional parking (6%)

* Numerous references to public facilities in Michigan.

BROWN AND OCONTO COUNTIES

- Improved facilities and services (docks, toilets, showers, repair service, boating supplies, food, pumpouts, etc.) .(83%)
- Additional public marinas, slips*(64%)
- Clean up the water(11%)

* Numerous references to public facilities in Michigan.

MILWAUKEE COUNTY

- Improved facilities and services (docks, toilets, showers, repair service, boating supplies, food, pumpouts, etc.) .(62%)
- Additional public marinas, slips(33%)
- Stricter supervision of boaters and security(29%)
- Improved weather information(7%)
- Clean up the water(7%)

RACINE AND KENOSHA COUNTIES

- Additional public marinas, slips(79%)
- Improved facilities and services (docks, toilets, showers, repair services, boating supplies, food, pumpouts, etc.) .(55%)
- Lights and horn at Kenosha Harbor entrance(27%)
- Improved weather information(7%)

A P P E N D I X I I I

G R E A T L A K E S

M A R I N A C H A R A C T E R I S T I C S

GREAT LAKES MARINAS

During the summer of 1975, fifty-six Great Lakes marinas were surveyed to determine the physical characteristics, rates, profitability and problems of these enterprises. The marina owner survey was undertaken for three purposes: (1) to determine the number of slips rented--to feed into economic impact analysis; (2) to determine pricing and other business practices employed by marinas--to be used in Extension programing for marina owners, and (3) to determine expansion plans--to be used as an indicator of the degree to which excess demand will be met in the next few years.

The marina information from the survey is aggregated by regions. The number of marinas surveyed in each region is as follows:

Lake Superior (LS) - 3 marinas with 367 slips

Upper Lake Michigan (ULM) - 39 marinas with 1,287 slips

Lower Lake Michigan (LLM) - 14 marinas with 1,088 slips
(1,332 GLBS)

Average Size of Marinas and Distribution of Slip Lengths:

The largest marinas were found on Lake Superior, with an average of 119 slips. Lower Lake Michigan marinas averaged 78 slips and Upper Lake Michigan communities have the smallest marinas of all three regions, with an average of 32 slips per marina surveyed.

The distribution of the slips by length in the three regions more or less corresponds to the distribution of the length of boats owned by marina users. For example, 72 percent of the slips in Lake Superior marinas are between 23 and 30 feet. The major concentration of Lake Superior boats is also in the same length category.

On the other hand, Lower Lake Michigan boats are concentrated in the over 30 feet category. The slip lengths in Lower Lake Michigan are also concentrated in the over 30 feet category.

Finally, the relatively even distribution of the boats owned by marina users in Upper Lake Michigan over the various length categories is more or less matched by the distribution of the length of slips in the Upper Lake Michigan marinas.

Thus, there appears to be no problem as far as the basic physical characteristics of marinas and the demand for various slip lengths in any of the three coastal regions.

Percent of Slips Rented (1972-1975):

The percent of slips rented over the past four seasons averaged 80 percent of the total slips in the Lake Superior region. Slip

rentals averaged between 90 to 100 percent of total slips in the Lower Lake Michigan counties. And, over the last four seasons, 95 to 100 percent of the slips were rented by marinas in the Upper Lake Michigan region. During the summer of 1975, all marinas surveyed were operating at full capacity.

Slip Rental Fees:

The majority of marina slips are rented by the season. Some marinas only quote annual rates (Kenosha), while others have monthly and daily rates in addition to the seasonal rate. Slip rental fee schedules vary from place to place due to differences in minimum and maximum rates for different size boats. In order to ensure comparability, all rates were converted to per-foot basis. In reality, a straight per-foot basis is rarely used in quoting slip rental rates. It is, however, useful to simplify the widely divergent rate schedules to get a feel for the relative cost of this particular service in the three Great Lakes regions.

In the Lake Superior marinas, seasonal rates average \$8 per foot. The seasonal rates average \$8.28 per foot in Upper Lake Michigan Marinas, while the average seasonal rates in Lower Lake Michigan marinas is \$10.88.

Number on Waiting Lists and Expansion Plans:

In the Lake Superior region, none of the three marinas surveyed had people on waiting lists. Thus, from the demand viewpoint, the current rates appear to be market clearing prices. The Lake Michigan coast, however, presents a different picture. There were 215 boaters on the marina waiting lists during the summer of 1975 in the Upper Lake Michigan region. The majority of these boaters (146) were on the waiting lists of Brown and Door county marinas. The relatively low seasonal slip rates, especially in Brown county marinas, need to be re-evaluated in the light of this excess demand.

The Lower Lake Michigan marinas indicated 816 boaters on their waiting lists, with the majority (450) in Milwaukee and a sizable number of boaters (300) waiting for slips in Kenosha. Although Lower Lake Michigan marinas have the highest slip rental fees among the three regions, the rates should, nevertheless, be re-evaluated on the basis of the current demand information.

Marinas in all three regions have plans to expand the number of slips offered. In a lot of cases, however, the expansion plans are not definite but subject to approval by county or city governing bodies. One private marina in the Lake Superior region cited plans to expand its facilities by 88 slips in the next few years. In Upper Lake Michigan, marina managers cited plans for expansion totaling 317 slips. And in the Lower Lake Michigan region, marina managers reported 1,885 new slips being planned for the near future.

Profitability of the Marina Operation:

A question on the profitability of the marina operation was included in the survey so as to serve as an indicator of the attractiveness of this enterprise to new investors. The results are tabulated below:

Table III-1. Profitability of Marina Operation

	Lake Superior Marinas N=3	Upper Lake Michigan Marinas N=39	Lower Lake Michigan Marinas N=14
Very profitable	-	5.3%	-
Profitable	66%	47.4%	50.0%
Not very profitable	33%	26.3%	35.7%
Losing money	-	18.4%	14.3%

According to the responses to this very general question on probability, it appears that very few managers consider the marina operation to be 'very profitable', while 16 percent of all the marina owner/managers surveyed report losing money on the operation. There are, however, a sizable number of marinas which are considered 'profitable' by their owners and/or managers and marinas which show some level of profit constitute 84 percent of our sample.

Over three out of four marinas surveyed have full-time managers. At first glance, it appears that full-time managers for the remaining 25 percent may improve the profit picture considerably.

Problems of Operation Identified by Marina Managers:

The problems of the marina operation identified by marina managers are, in a lot of cases, specific to the area where the marina is located. There are, however, some problems which are cited by a large number of marina managers all over the Great Lakes coasts. For example, difficulty of securing operating and expansion capital, the lack of state assistance to marinas, difficulty of obtaining qualified help, weather and the short season are often cited as problems of operating marinas. There is not much that can be done about the weather and the limited boating season in Wisconsin. There are, however, a number of minor and major assistance programs that can be developed at the state level to induce additional private investment into this segment of the recreation-tourism industry. These recommendations will be detailed in the Policy Report to the Coastal Zone Coordinating and Advisory Council.

The problems of operation identified by the marina managers are organized by county and presented below:

BAYFIELD, LAPOINT

Lack of appreciation by city
Short season
Resistance to paying marina rates
Permits and environmental regulations

MARINETTE

Loss of 25 docks due to high water

OCONTO

Gas scare
Weather
The economy

BROWN

Lack of operating capital
Lack of qualified help
Vandalism
Weather
Winter damage

DOOR

Ice damage
Lack of capital
Short season
Limited space
Lack of state help
Lack of qualified help
High taxes
Government bureaucracy
No showers, water, electricity
Not enough parking
Litter

KEWAUNEE

Garbage disposal
Illegal parkers
Lack of qualified help
Lack of expansion capital

MANITOWOC

Management and organization
Lack of manufacturers service
Lack of qualified help

SHEBOYGAN

Lack of qualified help

MILWAUKEE

Not enough charters
High winter storage costs
Not enough parking
Boater traffic problems
Water surges
Lack of cooperation from City Harbor Commission
Vandalism
Shifting sand
Lack of water dockage

RACINE

Lack of adequate docking space
Lack of qualified help
Lack of expansion capital
Getting ports
Theft and vandalism
Lack of state help
Water level
Army Corps of Engineers

KENOSHA

Lack of adequate space
Storm and water damage
Vandalism
Lack of expansion capital
No state help for marinas

A P P E N D I X IV

BOAT LAUNCH FEE SCHEDULES OF COASTAL
COMMUNITIES



BOAT LAUNCH FEE SCHEDULES OF COASTAL COMMUNITIES

Six coastal communities are currently charging fees at municipal or county launch facilities on the Great Lakes. The fees charged during 1975 at boat launch facilities in Kenosha, Kewaunee, Racine, Milwaukee, Port Washington and Sturgeon Bay are listed below. The remaining coastal communities and counties operate their Great Lakes boat launch sites without user fees.

KENOSHA

Single launching (county residents)	\$ 2.00
Single launching (nonresidents)	\$ 3.00
Season pass (resident)	\$15.00
Season pass (nonresident)	\$25.00

KEWAUNEE

Single launching (city residents)	\$ 1.00
Single launching (nonresidents)	\$ 1.00
Season pass (city residents)	\$10.00
Season pass (nonresidents)	\$20.00
Senior citizen pass (city residents only)	No charge

RACINE

Single launching (daily)	\$ 1.00
Weekends and holidays	\$ 2.00
Season pass (city residents)	\$15.00
Season pass (nonresidents)	\$35.00
Senior citizen pass	\$ 7.50

MILWAUKEE

	<u>McKinley</u>	<u>So. Shore</u>
Single launching	\$ 2.50	\$ 1.50
Season pass	\$40.00	\$20.00

PORT WASHINGTON

Single launching (resident)	\$ 1.50
Single launching (nonresident)	\$ 2.50
Season pass (resident)	\$12.50
Season pass (nonresident)	\$25.00
Senior citizen pass	\$ 5.00

STURGEON BAY

Single launching	\$ 1.00
Season pass	\$20.00
Resident pass	No charge