STATE OF MICHIGAN

IN THE CIRCUIT COURT FOR THE COUNTY OF LEELANAU

GLEN LAKE-CRYSTAL RIVER WATERSHED RIPARIANS, an unincorporated association, CRYSTAL RIVER OUTFITTERS, LLC, JOY M. TAYLOR DAVID AND PEGGY MARKS, husband and wife DAVID AND JOYCE STOCKMAN, husband and wife BOB JONES, William and Vicki Anderson, husband and wife and JAMES KUHN,

Plaintiffs,

v

File No. 01-5653-CE
HON. PHILIP E. RODGERS, JR.

GLEN LAKE ASSOCIATION,

Defendant,

and

LEELANAU COUNTY,

Necessary Defendant.
_____/

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Attorney for Plaintiffs

Louis A. Smith (P20687)
Attorney for Defendant

Ruth E. Mason (P26432)
Attorney Necessary Defendant

DECISION AND ORDER

Introduction and Historical Background

This case arises from the Plaintiffs' Verified Complaint and Petition for Modification of, or Departure from, Inland Lake Level Order. The complaint alleges jurisdiction and venue under the Inland Lake Level Act ("ILLA"), being part 307 of the Natural Resources and Environmental

Protection Act ("NREPA"), Michigan Environmental Protection Act ("MEPA") and the Law of Riparian Rights and Public Trust Doctrine.

The complaint is divided into four counts. In Count I, Plaintiffs' petition to modify or depart from a 1945 Inland Lake Level Order which itself was modified by the Court in 1954. Count II alleges a violation of Inland Lake Level Order and is essentially a contempt claim. Count III is a MEPA claim, and Count IV alleges violations of common law riparian rights. The waterways at issue are Glen Lake and the Crystal River. Both are found within Leelanau County and are of excellent water quality. While the evidence, briefs and arguments focus on Glen Lake and the Crystal River, the watershed also includes Little Glen Lake and Fisher Lake. Each element of this watershed is treasured by members of the public and those private individuals fortunate enough to have land adjacent to them. Glen Lake is fed by precipitation, snow runoff and ground water infiltration. The Crystal River runs from Glen Lake to Lake Michigan. With the exception of precipitation and snow runoff and some ground water infiltration, the vast majority of the river's water comes directly from the outlet at Glen Lake. A large portion of the Crystal River runs through, and is part of, the Sleeping Bear Dunes National Lakeshore.

Both Glen Lake and the Crystal River typically enjoy excellent water quality, are biologically diverse and stunning in appearance. Both the lake and river are widely used by members of the public. With respect to the river itself, its location within the Sleeping Bear Dune National Lakeshore makes it a national attraction and, not surprisingly, its varied uses include all those naturally associated with a high quality, fresh water resource. They would include canoeing, kayaking, tubing, fishing and swimming. Public trails also provide opportunities for hiking, photography and other recreational, educational and nature-related activities.

The relationship between Glen Lake and the Crystal River is one created by nature and modified by man. As the lake began to see the development of seasonal and permanent homes, it was quickly determined that high water levels in the lake were the cause of substantial spring erosion damage from the winter ice pack. In 1944, the Board of Supervisors of Leelanau County filed a petition in the Leelanau County Circuit Court requesting that the Court determine the natural height and level for Glen Lake under the provisions of Public Act 194 of 1939, MSA 8.102. This statute is the precursor to the current Inland Lake Level Act, MCL 324.30701.

Apparently by consent, the Court entered an Order on July 23, 1945 establishing the natural height of the lake at 596.75 feet above sea level. The Court established a natural maximum height of 596.92 feet and a natural minimum height of 596.25 feet. To determine compliance with the Order, the Court directed the county surveyor to monitor Glen Lake's water levels and required the Glen Lake Association to reduce the lake level if it exceeded 596.75 feet. This would be accomplished by the operation of the dam at the outlet from Glen Lake into the Crystal River. No direction was provided with regard to the operation of the dam if Glen Lake should drop below its natural height of 596.75 feet. Although the historical record is somewhat incomplete, the available data from the county surveyor would indicate that the Glen Lake Improvement Association (predecessor to the current Glen Lake Association) not only took responsibility for the construction and operation of the dam but became almost immediately responsible for monitoring and controlling the flow of water over it and into the Crystal River.

Glen Lake is large and supports a diversity of natural uses. Not surprisingly, there are equally diverse opinions regarding how its lake level should be maintained to maximize those uses. Some individuals who live adjacent to the lake prefer to keep the water at higher levels. Others would like to see it appreciably reduced. Following an initial period of management under the 1945 Court Order, Glen Lake riparians Christopher Parnall and Irma Parnall sued the Glen Lake Improvement Association on July 20, 1953. It was their claim that the Association had been maintaining the lake at a level higher than the Court ordered natural height of 596.75 feet. This lawsuit lead to a July 27, 1954 Consent Decree in which the Association, through a supervisory committee, agreed to maintain the lake level at the Court ordered 596.75 feet. To ensure compliance, the Association was required to take weekly readings of the lake level and to file quarterly reports of those readings with the Court. The dam used to control the lake level was not a particularly sophisticated piece of equipment. It had two sets of control boards and the reports advised the Court of the number of boards placed or removed to control the lake level.

In this early history of determining the natural height for Glen Lake, there is no indication in the record before the Court that findings were made or orders entered that considered the impact of the lake's level on the downstream flow requirements of the Crystal River. Nor is there any indication in the record of a consideration of management principles to be implemented in times of

low water. Quite to the contrary, the entire focus in the 1945 and 1954 Orders was on the regulation of high lake levels within Glen Lake. Nevertheless, the historical record presented to this Court would indicate a significant history of cooperation between the Glen Lake Association and Crystal River riparians. For many years, the lake level committee included Crystal River riparians. The substantial bank of data created by those who managed the lake level evidenced a history of sharing water from the lake with the river in times of low water. Further, the entire expense of managing the lake level was borne entirely by private individuals. No government funds were used to pay for the original dam and its equipment, its repairs over the years or the recent repairs and improvements which, in part, generated this lawsuit.

Since the Glen Lake Association owns the dam, it exclusively managed it through its water level committee. The water level committee is composed of volunteers who are willing to make time available for the regular readings and analyze any response to a change in weather conditions. Obviously, rain does not fall at uniform times and in uniform amounts. Temperature and wind conditions also vary widely. Further, the tools to manage the lake level were, until recently, crude. The dam had three boards on each of its two sides. Lake level was determined by removing one or more of these three boards from each side of the dam. Clearly, as boards were removed, the lake level was reduced and flow increased into the Crystal River. Conversely, as boards were replaced, the lake level was increased and flow into the river reduced.

As the water level committee developed expertise and a data base and as members of the committee came and went, it ultimately codified its decision making procedures in the 1983 Regulations for Maintaining the Water Level of Glen Lake. As previously noted, these regulations reflected a clear understanding of the relationship between the lake and the river and a balanced management approach toward the lake level to maintain flow into the river during times of reduced water. Indeed, the 1983 Regulations specifically provide for departures from the natural lake level as ordered by the Court when weather or environmental considerations so dictate.

As lake management moved into the 1990s, two significant events occurred to lay the foundation for this lawsuit. There were periods of significant low precipitation and the dam was reconstructed. Although there were years of normal precipitation, there were also abnormal years. An additional set of boards was also added to the dam. While these boards were not always in place,

the use of these boards in dry periods caused a substantial reduction in flow through the river. Riparian property owners and members of the public began to complain about the dam's management and the effects of low water on the river. Concern regarding the dam's management policies reached its zenith in 2001 when the dam was substantially replaced with one constructed to provide far more management control than its predecessor. When construction errors caused the dam to completely or nearly shut off flow to the Crystal River on two separate occasions in 2001, this suit was filed.

The nature of the dam's design provides both the benefit of greater management control over the volume of water allowed into the river and a potential detriment in the ability to hold back more water than could previously be accomplished by the use of four boards on each side of the old dam. While the Court congratulates the Glen Lake Association for its initiative and use of private funds to improve this significant management tool, it did so without notification to or approval of the Court and its construction may have caused violations of the 1954 Lake Level Order.[1]

Jurisdiction

While this case was pending, the Court of Appeals published its decision in *Yee v Shiawassee County Bd of Comm'rs*, 251Mich App 379; 651 NW2d 756 (2002). The Court invited the parties to a meeting to discuss any potential jurisdictional issues. It was clear that there could be no arguable jurisdictional issue if Leelanau County was joined as a Necessary Plaintiff. The Court has never received notice that the Leelanau County Commissioners considered such an option. Leelanau County remains a Defendant. The Glen Lake Association filed a motion to dismiss for lack of jurisdiction and brief in support. The Plaintiffs filed their brief in opposition. The Court has reviewed each carefully and for reasons that will now be described, dismisses the motion and finds that subject matter jurisdiction clearly exists.

[1]With the concurrence of the parties, the Court did not take evidence relating to potential contempt for violations of the existing Order. This issue was deferred without prejudice to reassert it later.

The determination of jurisdiction involves applying the procedural history of this case to the actual holding of the Court of Appeals in *Yee* and in *Wortelboer v Benzie County*, 212 Mich App 20; 537 NW2d 603 (1995). *Yee* stands for the proposition that inland lake levels can only be established by the County Board of Supervisors seeking Court-established lake levels pursuant to the comprehensive statutory scheme outlined in the Inland Lake Level Act. *Yee* additionally states, at footnote 38, that "once such determination has been made, however, circuit court jurisdiction over a lake's level continues." MCL 324.30707(5); see also *Anson v Barry County Drain Comm'r*, 210 Mich App 322, 325-326; 533 NW2d 19 (1995).

In *Wortelboer*, the Court of Appeals recognized that the ILLA provides the Circuit Court with continuing jurisdiction and "may provide for departure from the normal level as necessary to accomplish the purposes of this part." The appropriate procedural remedy to address the previously established lake level said the *Wortelboer* Court is "to petition the court for reconsideration of the lake level." In *Wortelboer*, the Board of Supervisors passed a 1979 resolution instructing the Benzie County Supervisor to initiate a proceeding to establish a legal summer and winter level for Crystal Lake. The levels were established by Court order and controlled by a dam. Thereafter, in 1990, abutting property owners on an outlet stream from Crystal Lake sued the County alleging that alteration of the lake level so as to establish two lake levels was contrary to the ILLA and that alteration of the lake levels violated their common law riparian rights and the MEPA. The Court found that plaintiffs had standing to challenge alteration of the lake levels but did not have a private cause of action under the ILLA. Under the ILLA, *Wortelboer* held that the proper remedy for the owners of property abutting the outlet stream, in connection with their claim that alteration of the lake levels caused damage to the property through erosion, was "to petition the Circuit Court for reconsideration of the lake levels." The Court further found that a Circuit Court could determine that lake levels "should vary seasonally."

Count I of this complaint is a petition to modify or depart from the Inland Lake Level Order of 1945, as modified by the 1954 Order. This is the precise remedy directed by the Court of Appeals for consideration of lake levels previously established by Court order. It is a procedural remedy fully consistent with both *Wortelboer* and *Yee*. In *Yee*, plaintiffs were asking the Court to establish a legal lake level without petitioning the County Board of Commissioners to do so in accordance with part

3.07 of the NREPA. Since the Plaintiffs here seek to revisit an existing Court determination of legal lake levels, the Court's continuing jurisdiction over a level it has previously established is recognized by both *Wortelboer, Yee* and the ILLA itself.

Parties' Stipulation

Following an initial hearing on a request for injunctive relief, the Court engaged in a series of conferences and settlement discussions with the parties in an attempt to resolve issues or at least narrow them for trial. Although significant issues remained for resolution, substantial agreement was reached.

Not surprisingly, the long history of a balanced management approach was recognized and agreed to be codified within a modified lake level order. Almost uniformly, Glen Lake and Crystal River Riparians are environmentally sophisticated individuals who understand the relationship of the lake and river to each other and the watershed within which they are found. Counsel, then, were able to agree to the entry of a modified lake level order for Glen Lake that would facilitate improved management of the water level to the ecological benefit of Big Glen Lake, Little Glen Lake, Fisher Lake and the Crystal River. All of this was agreed to in the presence of a new dam with improved control mechanisms.

Years of lake level management identified a clear water level pattern. The management response was beneficial to both the lake and the river and consistent with nature. The oldest recognized problem on Glen Lake was ice and erosion damage caused by high water levels in the winter. Accordingly, the water level was maintained below the natural height after Labor Day by allowing the lake level to gradually be drawn down. This together with normal fall precipitation caused adequate flows to move through the river. In the spring, the ice and snow would melt and normal spring precipitation plus ground water infiltration would recharge the lake to a point well above the natural height directed by the modified Court Order. Consistent with summer weather patterns, this excess water would be drawn off the lake and together with normal precipitation and some ground water infiltration typically provided adequate flows from Glen Lake into the Crystal River to maintain the river in an ecologically healthy fashion.

The rub comes in periods of low water. High summer temperatures, wind and low precipitation rapidly deplete water resources through evaporation. The challenge, then, is to find a set of management algorithms that maintain Glen Lake's health but still allow it to be drawn below its legal level to provide the minimum flows necessary to maintain a healthy river, i.e., a formula that shares the pain of low water and minimizes the environmental consequences to both the lake and the river.

While the parties did agree to a modified lake level order which will include a set of regulation algorithms, they did not agree upon the precise regulations that would dictate when gates are to be raised or lowered in response to measured conditions within the watershed. The parameters of this dispute are set forth in the Stipulated Order where the issues agreed upon and those remaining for trial are described.

In creating these new regulations, the Court is aware that a lake level and river flow may not be managed with precision. Similarly, the natural factors that inhibit precise control indicate that any focused effort to maintain a fixed legal lake level year around would be neither successful nor consistent with 50 years of management history. Given the number of variables that effect the lake's level, it seems that the lake is at the legal level on any given date more by accident than by design. This is true despite the best efforts of intelligent, experienced and well-intended members of the water level committee.

What the Court seeks to accomplish through the implementation of a modified lake level order, with regulation algorithms, is to provide greater guidance to the water level committee as it makes its monitoring decisions and make the entire process of lake level management dynamic rather than static. In other words, through a mechanism of periodic technical review, the impact of the algorithms on the lake and the river may be monitored and the parties can return to the Court for fine tuning. These are precious resources locally, nationally and internationally. They have been managed very well, for the most part, in the past. Changing weather conditions may well dictate that greater attention needs to be paid to the relationship between the lake and the river in the future and a relatively precise formula for the sharing of low water developed now so that environmental consequences of low water may be minimized in the future.

With the parties' stipulation in hand, the Court proceeded to conduct a bench trial in May 2002 wherein it received a substantial number of exhibits, heard the testimony of experts and other interested parties as well as the oral arguments of counsel. The matter was taken under advisement so that the Court could issue this Decision and Order.

Factual Findings and Legal Conclusions

As previously noted, Crystal River arises at the outlet from Glen Lake and travels to Lake Michigan. Both lie within the same watershed and have been managed pursuant to Court Order since 1949. The physical relationship between the two is quite stark. Glen Lake is of substantial size and volume. The Crystal River stream channel is much smaller. As will be discussed in greater detail ahead, the effect of retaining or releasing water into Glen Lake has a disproportionate effect on flows through the river.[2]

The effects of low water on the river were discussed by a number of experts. Not surprisingly, they include damage to the fish population and rooted aquatic plant communities as well as loss of primary productivity in the river. Additional impacts are felt by the river's mussel and clam population, its communities of benthic insects and a deleterious impact on other aquatic plants and animal communities. There are also harmful increases in water temperature. Naturally, reductions in flow also impair navigability which impacts the recreational public, including but not limited to visitors to the national lakeshore. Riparian owners along the river are also impacted by reduced navigability, impacts on the river's biology as well as the loss of scenic and property values.

Recognizing a long tradition of balancing the needs of the lake and the river and mitigating the harm associated with erosion from high water on Glen Lake, the Court finds it is necessary to institute a modified lake level order with regulation algorithms that will provide a more precise mechanism for managing the lake level and sharing the environmental burden of drought.

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[2]For example, Roger Wallace, an expert in hydrology, testified that if the river experienced the rare event of 60 consecutive days with a flow of 24cfs and was brought to 30 cfs, the added flow from the lake of 6 cfs for 60 days would approximate a decline in the lake of .12 feet or 1.44 inches. Clearly, significant health can be given to the river with a modest impact on the lake.

A key finding by this Court is that the Crystal River is not merely a tool used to maintain Glen Lake's water level. Rather, it is a viable part of the watershed, and, the management of Glen Lake's water level must be done so as to minimize environmental consequences to both the lake and the river.

This Court has continuing jurisdiction to enforce and modify its 1945 and 1954 Lake Level Orders for Glen Lake. See, *Yee, Wortelboer, supra*, and MCL 324.30707(5). Individuals aggrieved by this Court's Lake Level Orders may file petitions to modify them and this Court has continuing authority to revisit the Orders from time to time. However, persons who feel aggrieved by this Court's lake level Orders must understand that they have not and will not be issued in a vacuum. The focus of this Court's efforts are environmental and recreational. The Court is not motivated to maximize income to commercial canoe liveries or minimize the length of docks. There are a number of well-established criteria that must play a role in the determination of a lake level and in any subsequent determinations to modify it. These factors would certainly include a consideration of past lake level records and the normal seasonal fluctuations of lake level. In this process, ordinary high and low water marks have been determined and evaluated. Both the lake and the river have been the subject of substantial development. It is important in determining the levels of each that a consideration be given to septic tanks, drain fields, sea walls, docks and other physical features.

The lake and the river have been the subject of extensive government study. Government surveys and reports have been provided to the Court as well as studies of the watershed's hydrology. Although the national lakeshore and the federal government were not parties to this action, they did submit reports that are relevant to this Court's decision and those reports have been considered.

There is a clearly established relationship between the lake and the river. The river provides upstream drainage from the lake and the stream has its own downstream flow requirements and impacts on downstream riparians. Property owners generally understand this relationship and historically managed the lake level with respect for it. Property owners on the lake and the river have well-recognized riparian rights which include but are not limited to recreational use of the surface waters, fishing and protection of wildlife habitat.

Consistent with the ILLA, the Court considered these factors as they were offered through the testimony and evidence received at the trial. MCL 324.30707(4). Having reviewed this

evidence, the Court finds that the ILLA and *Wortelboer* contemplate that more than one lake level may be established. MCL 324.30701(H). In fact, the ILLA does not set a maximum or minimum number of levels for a lake and provides that lake levels may vary seasonally. MCL 324.30707(5). While the 1945 and 1954 Lake Level Orders have established 596.75 feet as the natural level of Glen Lake, management of this level has indeed recognized seasonal fluctuations and, for most of its history, a balanced management approach between the lake and river. Conversely, the notion that maximizing benefit to Glen Lake riparians can occur without a consideration of the downstream consequences on the Crystal River is not consistent with the ILLA, existing Lake Level Orders or the substantial history of water level management by the Glen Lake Association.

Accordingly, to accomplish all those purposes set forth in MCL 324.30707(4), the Court finds that the history of managing Glen Lake's water level on a seasonal basis and in response to changing conditions has been and continues to be a sound approach. Consistent with the enhanced technology associated with the improved dam and the greater recognition of the relationship between the lake and the river, the Court adopts the Crystal River Management and Implementation Plan ("Plan") with the Order Modifying 1945 and 1954 Glen Lake Level Orders that is being entered concurrently with this Decision and Order.[3]

In adopting this Plan, it is the Court's goal, consistent with state statutes and appellate precedent, to maximize the natural resources of this state while preserving and protecting property around the lake and the river and to do so in the interest of public health, safety and welfare. Although management of high water has not proven to be as challenging as the management of low water conditions, the Plan addresses both.[4]

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[3]During the trial, the parties stipulated that where the regulation algorithm had the lake level greater than .75 but less than .90, the management committee had the discretion to maintain R at 1.85 or greater. Further, the Glen Lake Association agreed to install a devise on the dam to mark adjustments and measure flow per unit of adjustment.

[4]The Court has received and reviewed the alternative Glen Lake Level Control Algorithm and adopts that submitted by Plaintiffs as it is more sophisticated, should produce more technical data and is more likely to provide the effective, dynamic management tool this Court finds to be essential to the long term maintenance of a healthy lake level and river flow.

Due to the parties' agreement that a modified Lake Level Order needs to be implemented and that regulation algorithms are appropriate and the Court's finding that its continuing jurisdiction is clear and that the ILLA and appellate precedent sensibly recognize the variables that affect a lake level necessarily contemplate the potential for different levels that respect different seasons and changing environmental conditions, this Court is not making findings other than on Count I of the Plaintiffs' complaint. It believes that complete relief can be provided to the parties without a consideration of MEPA, common law riparian rights or claims of contempt for violation of the current Lake Level Order. The Court believes that this relief may be fully implemented through the Plan which it hereby adopts with its modified Lake Level Order. This Court further contemplates that this Plan shall be implemented on a dynamic basis and looks forward to adjusting its elements as further information regarding the hydrology and biology of the watershed become available. The Court also looks forward to further input from the federal authorities responsible for managing the national lakeshore.

The Court and the parties agree that the Association's water level committee shall have sole authority and responsibility to manipulate the gates of the dam in accordance with the Plan, the modified Lake Level Order, the terms of this Decision and the continuing supervisory jurisdiction of the Court.

A matter of significant public interest was presented in this litigation, so no costs will be taxed. This is a final order and closes the case. The Court does retain jurisdiction under MCL 324.30707(5) to enforce its orders and implement the Plan consistent with applicable law.

IT IS SO ORDERED.

HONORABLE PHILIP E. RODGERS, JR.
Circuit Court Judge

Dated: 4/30/03