

OFFICE OF THE MAYOR

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Dear Mayor:

It has come to my attention that the Great Lakes and St. Lawrence Cities Initiative (GLSLCI) is urging cities to approve a resolution that urges the Great Lakes Governors and Premiers to reject my city's Application for a Lake Michigan Diversion with Return Flow. Because of that, I want to provide some key facts about Waukesha, Wisconsin's plan and to refute some of the inaccuracies that have been perpetuated by opponents. I hope you will review this letter before considering the draft resolution.

Decisions on drinking water are among the most critical of those that are made by any community. They must be based on thorough, long-term planning. In our case, the conclusion that Lake Michigan is our only reasonable water supply alternative is the result of a decade of exhaustive study of the alternatives by the city, analysis by a panel of 32 experts for regional planners, five years of review by the Wisconsin Department of Natural Resources (DNR) and more than 100 public meetings.

Waukesha's proposal is to borrow 1/100,000,000th of 1% of Great Lakes water. We will then return the same volume to the Great Lakes via a tributary. There will be no loss of water volume in the lakes and no harm to the Great Lakes.

Waukesha is applying under the terms of the Great Lakes Compact. The Compact allows communities in counties that straddle the Great Lakes Basin to use Great Lakes water, but only if they have no reasonable alternative and return the water after use and treatment. ("No reasonable alternative" is the Compact standard. It is not, as some claim, that Great Lakes water can only be used as the "last resort.")

The DNR, after its review of over 3,000 pages of materials and extensive public input, which resulted in 22 additional technical memorandums providing additional detail, has determined that Waukesha meets the Compact requirements.

No precedent for diversions to faraway places

In testimony to the DNR last summer, GLSLCI staff said, "Mayors do not want to see this diversion become the foot in the door through which Great Lakes water is taken away and sold to many regions of this country, or even abroad."

In fact, a legal use of Great Lakes water for Waukesha is in no way a precedent or "foot in the door" for water to be illegally pumped beyond straddling counties. Under the Compact, 99% of the population of the United States outside of the Basin is ineligible to even apply for Great Lakes water. The authors of the Compact understood that providing limited exceptions for adjacent communities would not open the door for long-distance diversions. And, by requiring return flow, they ensured that the limited exceptions would not harm the Great Lakes.

Waukesha's Application does not require a choice between safe drinking water for our families and strong protection of the Great Lakes. The Compact ensures that both needs can be met.



The straddling counties provision in the Compact allows states to meet local public health or environmental issues in a very limited area. Without that provision, the agreement that created the Compact, and its protection of the Great Lakes, would not have been passed by all the Great Lakes states. It is essential that the provision now be implemented in good faith and on the basis of an objective, scientific review, and not on politics or media campaigns by special interest groups. The approval of the Waukesha Application will validate the Compact agreement and its protections.

Waukesha's precedent is limited by its unique circumstances, including the fact that it is actually located in the Great Lakes groundwater Basin (despite being outside the surface water Basin) and currently using Great Lakes groundwater resources. Switching to Great Lakes surface water will allow for Great Lakes groundwater restoration.

Waukesha has no reasonable alternative

The draft resolution by GLSLCI questions Waukesha's need for Great Lakes water. The recharge of our deep groundwater supply, in the most populous parts of Wisconsin and Illinois, is limited due to a unique rock formation. With limited recharge, the numerous communities using the aquifer over many years have caused it to be severely depleted. Also, naturally-occurring contaminants – including the carcinogen radium - are above federal health standards. Waukesha is under a court order to come into compliance with federal Safe Drinking Water Act requirements to protect public health.

Our need for Great Lakes water has been questioned by a group calling itself the Compact Implementation Coalition (CIC). It claims that the deep aquifer would provide sufficient water if Waukesha served a smaller service area than required by state law. In reviewing that claim, the DNR found that Waukesha's deep aquifer wells could not provide enough water, even for CIC's hypothetically smaller service area.

Actual well capacities are less than CIC assumed in its flawed alternative. The DNR review also notes that the CIC alternative failed to consider that reverse osmosis treatment of deep groundwater wastes 10% to 20% of the water supply, requiring greater aquifer pumping and causing significant harm to the environment from further drawdowns and from wastewater discharge impacts. The faulty CIC alternative would also fail to meet radium regulations under all water system operating conditions, thereby failing to meet a requirement of Waukesha's radium consent order. A water supply and treatment approach similar to the CIC alternative had previously been considered by the city's consultants and was eliminated from further consideration because it is not a viable alternative.

CIC's water supply alternative was developed without consulting with experts on Waukesha's water system and without consideration of Waukesha's entire Application. In addition, no independent technical peer review was done on the CIC proposal before this alternative was made public. In contrast, the Waukesha Application was reviewed by DNR over five years. Also, the independent Southeastern Wisconsin Regional Planning Commission, after more than five years of study, came to the conclusion that Lake Michigan was the best water supply for Waukesha and the environment.

Relying on the deep groundwater, as CIC proposed, is not sustainable. New groundwater modeling two months ago showed that projections of moderate regional water use, developed by regional planners, would lead to an <u>additional</u> groundwater drawdown of 200 feet or more over the next 50 years. This groundwater aquifer is already drawn down hundreds of feet and is one of only two state-designated groundwater management areas, indicating severe depletion.

If Waukesha would rely on existing wells, as CIC proposes, the city would need to develop additional shallow aquifer wells to supplement the deep aquifer supply. The DNR has determined that it is not a reasonable alternative, due to the extensive harm to wetlands that would result. CIC is also opposed the siting of new shallow wells due to these adverse environmental impacts. Without more shallow wells, the city would be without an adequate long-term water supply.

Another critical fact not considered by CIC is that water quality in the shallow aquifer is much more vulnerable to contamination in such an urbanized area and it is more corrosive than Great Lakes water.

Despite the known errors in its alternative, CIC has failed to revise its claims or make corrections after the DNR review. CIC's claims are not based on science, but on its political campaign to oppose any use of Great Lakes water by communities in straddling counties, no matter how limited. The CIC claims may be extensively repeated by people who want to believe them, but that does not make the claims true. It also does not make them a sound basis for drinking water supply planning.

Conservation won't solve the problem

The DNR also determined that water conservation cannot prevent the need for a Lake Michigan water supply for Waukesha. Waukesha is a leader in water conservation, including the adoption of a daytime sprinkling ban, conservation rates that go up with increased use, toilet rebates, public education, industrial incentives and outreach, and more. Waukesha is ahead of schedule on its goal to achieve 10% measurable water savings in compliance with Wisconsin Compact implementation rules.

Service area reflects sound planning

Wisconsin has required wastewater service areas for more than 30 years to implement effective planning, reduce duplication of infrastructure and to avoid unnecessary transfers of water to other watersheds. When it adopted the Compact as state law, it included a requirement for water supply service areas to be created for the same reasons.

In keeping with the Compact's requirements to maximize the return of Great Lakes Basin water and to minimize the return of out-of-Basin water, Wisconsin's law requires that the new water supply areas be consistent with the historical wastewater service areas. For that reason, Waukesha's service area, as determined under the law by independent regional planners, includes <u>portions</u> of four other communities.

Waukesha already serves customers beyond city limits, and the creation of a state-approved service area definitely sets the limits of where Waukesha can provide drinking water.

CIC has claimed this service area is intended to create new development. The fact is, the majority of the service area is already developed. Another 15% is protected as environmental corridors, natural areas preserved to help meet regional water quality goals. Only 15% of the service area is available for development. Population growth is expected to be only 0.5% per year until build-out in about 2050.

The GLSLCI testimony to the DNR claimed that, "The additional communities that are part of the service area have indicated that they do not need new sources of water now or in the foreseeable future." This is untrue. In fact, all four communities adopted resolutions supporting their inclusion in the water service area. Portions of these communities are already served by Waukesha because of contaminated private wells.

Any new area getting city water is required to comply with city water conservation requirements through a binding legal agreement.

Improvements to a Lake Michigan tributary and fishery

At the suggestion of DNR water staff, Waukesha will return the withdrawn water via the Root River, a tributary to Lake Michigan. Because the Waukesha wastewater facility includes advanced treatment processes (dual media filtration and ultraviolet light disinfection), Waukesha's return flow to the Root River in Franklin will be high quality water. The flow will actually improve the water quality of the Root River for parameters such as phosphorus and total suspended solids because the return flow water quality is better than that of the river. The DNR has proposed stricter permit limits for Waukesha's discharge than existing wastewater discharges to the Root River, to other area rivers, or directly to Lake Michigan.

Waukesha does not have combined sewers (sewers that carry both wastewater and storm water) and the wastewater treatment plant design ensures that there is no risk of untreated or partially treated water being discharged to the Root River or Lake Michigan.

Low flow conditions are common on the Root River. Waukesha's return flow will improve flow during dry periods to allow for fish movement. That increased flow will benefit the Root River Steelhead Facility, a DNR egg collection facility, by allowing fish to reach it. That will help meet Great Lakes fish stocking quotas, creating more fishing opportunities along the Root River and offshore in Lake Michigan. In 2015, even Indiana used the Root River facility as a source of Chinook salmon eggs because of the record low numbers of fish returning to Lake Michigan tributaries.

Facts are available

Mayors and other city officials understand better than ever the need to make drinking water decisions that are based on a detailed analysis of the facts. It is hard to imagine a water supply proposal that has gotten more thorough research and analysis by regulators and other officials than ours. You can find extensive information at www.WaukeshaApplication.com. I hope you will consider these facts, and the cooperation that led to the adoption of the Compact, before taking a position on our Application and the Wisconsin DNR review. The Compact requires decisions by the Great Lakes Governors to be made on objective, scientific reviews.

If you have any additional questions, please do not hesitate to contact my staff or me.

Sincerely,

Shawn Reilly MAYOR, Waukesha

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cc: GLSLCI staff

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