

CITY OF DULUTH

OFFICE OF PLANNING AND DEVELOPMENT

MEMORANDUM

April 20, 2005

To: City Council
From: Administration, Planning Department
Re: Slip 2 & Living Water Garden

History

The area known as Bayfront, between Railroad Street and the Harbor, between 5th Avenue West and Cutler-Magner Company, has been location of various proposed projects over the years. The last planning effort to encompass this area was in 2001, when URS Corporation was retained by the City of Duluth to review and analyze various proposals put forth by civic groups, non-profits and public agencies.

Included was a proposal from Bayfront Visions Group to construct a "Living Water Garden" to (from January 2001 Feasibility Study) "use native plant species, ponds and aeration structures to treat stormwater in an interactive, aesthetically pleasing and educational setting."

On October 28, 2002, the City Council approved resolution 02-0655, "resolved, that the living water garden and grant securement portion of the Bayfront Master Plan, a copy of which is on file in the office of the city clerk as Public Document No. 02-1028-17, is hereby adopted as the city's plan to generally guide the future development of the 25 acre Bayfront site. Further Resolved, that the city administration is encouraged to seek funding for the implementation of this plan, including the investigation of contaminated sites, the planning of Lakewalk and public access improvements, the expansion of the Bayfront Festival Park and the improvement of seawall and slip faces to accommodate marine vessel usage."

On March 28, 2005, the City Council approved resolution 05-021, "resolved, that the City Council desires to consider the requested expansion of the living water garden and requests that the administration review the expanded area proposal for the living water garden along the east side of slip 2 and provide the council with a report of the effects of the proposed expansion on current and potential future development of Bayfront by April 20, 2005."

A scaleable site map of the area from 5th Ave. W. to Cutler-Magner Company is presently being developed that will detail ownership, areas subject to covenants and location of realigned ROWs to provide an accurate base on which to base future Bayfront planning.

URS Plan

The "March Consensus Plan" from the approved URS document, (following page) is very general in its level of detail. This drawing is the only graphic in the plan that delineates the proposed uses and their locations. The text of the plan is more specific, including:

Goals

- Provide economic development, employment and taxes
- Improve public access to bay
- Improve environmental quality of site and bay
- Contribute to quality of life in region

Recommendations

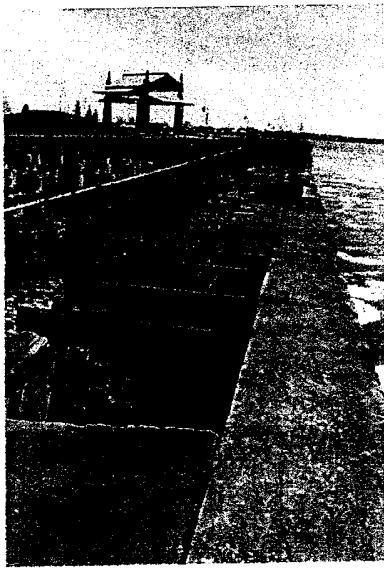
- Improve pedestrian connections, to Canal Park, across I35 on 5th Ave. W., to DECC, connect to Munger Trail, new pedestrian bridge west of Depot and good public access to water's edge.
- Relocate Playfront.
- Create 2 acre recreation area for ice skating, informal play and to maintain view of bay from downtown.
- Dedicate a portion of the site east of slip 2 to hospitality and retail development.
- Perform a detailed study of the feasibility of improving and enlarging slip 2 for transient and charter boat use, a boat basin and public water access.
- Locate visitor center on west side of slip 2.
- Provide space at the end of slip 2 on Railroad Street for the development of a demonstration Living Water Garden (1.5 acres).
- Future plans should consider LaFarge Cement in present location as well as possibility of its relocation.
- Perform detailed study of the feasibility of improving slip 3 for additional transient and charter boat use and public water access.
- Provide a site on the 9th Ave. pier for development of conservatory.
- Remediate site and issue RFP for remainder of 9th Ave. pier.



Existing Condition

This report focuses on slip 2 in the context of URS recommendations, additional proposed uses and the council request. An underwater engineering analysis of the walls will be necessary to inform detailed design for any facilities involving the slip and immediate edges, but with the new base map (to be completed within the next month) schematic design to explore the fit of various proposed uses can begin.

Both sides of the slip contain hazardous areas. The slip faces show some deterioration but the structures to the landward side of the face represent the greatest hazardous condition along much of the length of both sides. The accompanying photographs illustrate these conditions.



East Side



East Side



West Side

These conditions represent need for major capital investment before public use and activity near these edges would be appropriate.

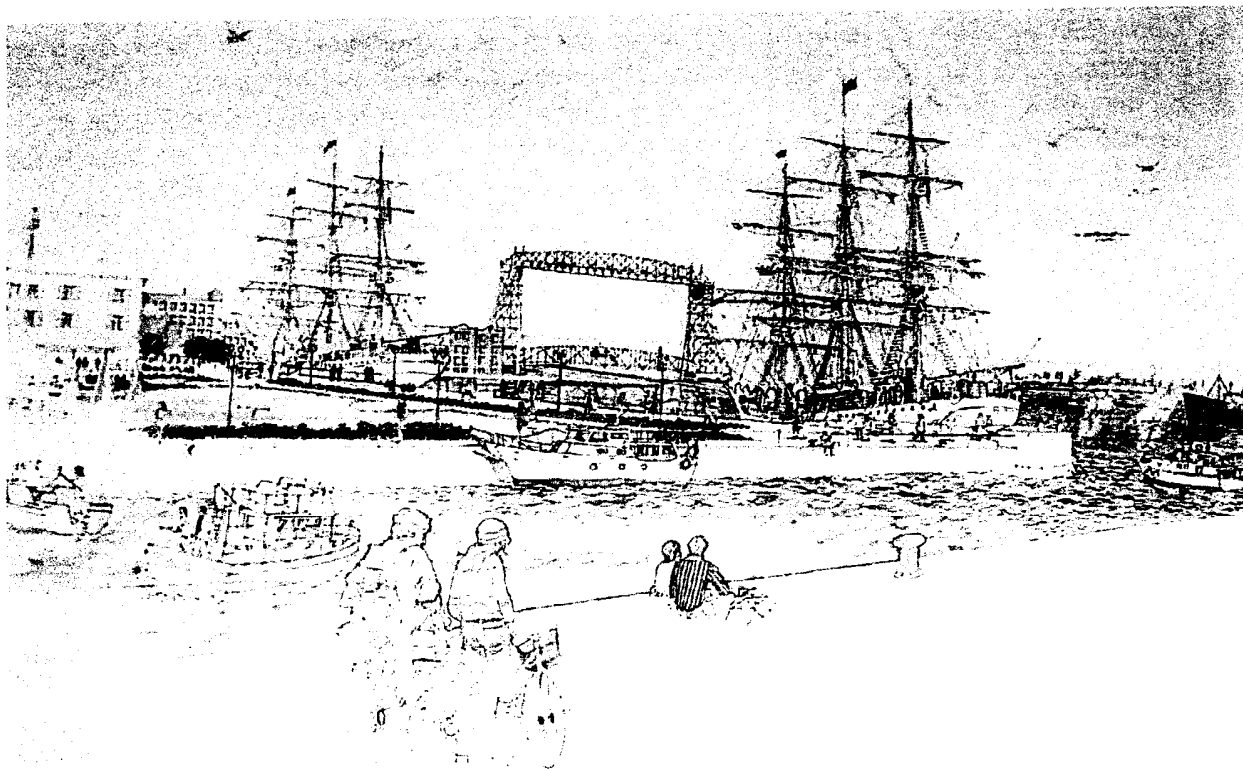
Sweetwater Alliance Proposal

Sweetwater Alliance, the organization currently proposing to build the Living Water Garden, is requesting more land for this project in addition to the 1.5 acres illustrated and described in the URS plan. The current request is not quantified in size. The illustration provided in their March 14, 2005 communication shows an expanded garden at the head of the slip and extending along the entire length of the east side of slip 2 to the bay, a total area of perhaps 5-6 acres. General issues with the proposed Living Water Garden and the expanded site requested include:

- Consistent with the February 28, 2005 memo and presentation to council updating Bayfront planning, a site base map is being generated to quantify dimensions, ownership and covenants on the overall site. This is the first step in re-visiting Bayfront planning under the current council and administration. To make new commitments of land in isolation from this charge to develop a new overall plan, would seriously compromise the opportunity to present contemporary thinking on the future of the entire Bayfront site.
- The land at the head of slip 2 represents the only possible off-street link between the undeveloped areas of 8th Avenue pier and 9th Avenue pier (about 25 acres) and what has been developed thus far at Bayfront Park. This is an important connection to maintain so that the development of the area can be done as a system rather than disconnected individual parcels.
- Slip 2 is about 900' long. Although in need of significant repair, the edges represent a valuable interface between public recreation lands and water uses dependent on deep draft and immediate access to a maintained channel. These conditions could not be replicated anywhere in the lower harbor. Allowing a use on the east side of the slip that could occur elsewhere, which does not require a deep draft water interface, and would preclude the possible future use of the slip for deep water uses, would not be a prudent use of an existing public resource.
- It is disingenuous to describe this project as treating storm water. The proposal is to use a lift station to pump water out of the slip to be circulated through the garden. Water quality in Superior Bay would not be measurably improved and the education value of such an arrangement would be hypothetical rather than based on tangible results.
- At current level of available resources, dependence on City crews or contractors to install and remove the submersible pumping system each season, to dredge the ponds as necessary and maintain the plant life required to provide this demonstration garden is not realistic. If this facility is not maintained, it would become an unattractive feature and an embarrassment to the City.
- Sweetwater Alliance operates in isolation from the Regional Stormwater Protection Team and the city's Stormwater Education Program. This project is not being proposed as part of or contributing to a larger stormwater strategy in the Duluth-Superior area.

Other Uses Being Researched

Since the core area of Bayfront was first acquired by a private organization for public benefit in 1977, the connection between people and harbor activity has been a driving principle. Described as downtown's "front door" on the water, this area was envisioned as a destination for events, park use and boating activity - large and small, local and from away, water taxi to Barker's Island, fishing charters, tug and pilot boat docking and similar uses for residents and visitors. This drawing looking east across slip 2 before the stage was built illustrates these intended activities.



In 1976, the year before this industrial site was purchased for public use, Duluth was included in Great Lakes ports for a bicentennial visit of the Norwegian training vessel *Christian Radich*, a full-rigged ship. During the one week stay in Duluth, the vessel had twice the visitation than the previous week in Chicago. Duluth is the window on the water for millions of people who do not have their own great lake. That visit in front of the DECC could not be repeated today because of Homeland Security rules which have diverted cruise ships calling on Duluth to berth at the Port Authority, not the most welcoming face of the city for visitors. The east face of slip 2 would be an ideal place to welcome cruise ship passengers to Duluth. This area should be developed for berthing a variety of visiting vessels, private, commercial and governmental. This represents a

revenue source and a major enhancement to waterfront character in this highly visible location. Significant capital expenditure would be required, but the fundamentals are already in place. It is not within the scope of this report to relate the full status of boating and ship use in the context of Bayfront Park, however the following is a sample of this subject:

Cruise Ships

Slip 2 was the home to vessels in scheduled passenger service as recently as 1966. The current market is expanding into a new dimension of smaller cruise ships. The Duluth Seaway Port Authority (DSPA) and Visit Duluth (VD) are both members of the Great Lakes Cruising Coalition (GLCC) and industry trade group promoting the Great Lakes. A few items from a recent annual Seatrade Cruise convention:

- From passenger surveys, Mackinaw Island is the only Great Lakes destination that ranks higher than Duluth, even with present limited facilities.
- AAA, the largest booking agent for cruises in the U.S., has a very high concentration of members in the midwest, who regularly express interest in Great Lakes cruises.
- Analysis of internal Lake Superior cruise routings utilize Duluth as start and finish location because of available air service, repair and fuel, channel depth, hotel capacity, land-side attractions and existing community promotion as a port.
- As the industry recovers from a post 9/11 downturn, the growth segment is in smaller vessels, providing a more intimate experience and in new areas of operation.
- Analysis is being done on the viability of Roll On-Roll Off (RO/RO) vessel service between Duluth and Thunder Bay for trailers, containers and day passengers.

Port Authority staff have reviewed the concept of slip 2 as a cruise ship terminal and have expressed their support. At high alert levels of homeland security, the use would be limited, but in these cases, the port is essentially closed. This use and potential market deserves detailed analysis.

Small Boat Basin

Relocation of the charter fishing fleet, a public launch ramp and space for visiting private boats are uses that are being examined in an expanded basin at the head of slip 2. The intention is to excavate an expanded basin to the west, east or perhaps both directions to create a configuration suitable for recreational boats in the 20' to 50' range. The Department of Natural Resources has expressed interest in this location for their Lake Superior access program for a ramp and associated parking and the city is exploring the federal Boating Infrastructure Grant Program, designed to support facilities for nontrailerable boats over 26'.

Alternatives for Living Water Garden

Treatment of storm water and related public education are valuable activities to pursue. Private organizations working on behalf of water quality should be supported. However, the current Living Water Garden proposal falls short of water quality improvement. The demonstration and educational values may be present, but the proposed facility should not be a limitation in planning for uses singularly appropriate to Bayfront. Possible alternatives to explore:

21st Avenue West Slip

If the main purpose of such a project is treatment of storm water, the large shallows between the WLSSD plant and Rice's Point is a location to consider. Here is the discharge of Miller Creek, one of the most impacted watersheds in the region, and these waters could be run through a comprehensive system of settlement basins, plant and aeration treatment and constructed wetlands. The area is large, highly visible from the freeway and accessible to the public. Arcata, California uses wetlands for final polishing of wastewater in a tidal area which includes public access on boardwalks with interpretive materials through the wetlands.

Daylight the storm sewer

Another option that blends partial storm water treatment, public education and interpretation would be to follow the existing discharge into slip 2 up the hill to an elevation where a portion of this flow could be intercepted and run through steps necessary to demonstrate the potential of this technique. This linear treatment process would be on the surface, lending itself to interpretation and provide a pedestrian link under the freeway to connect the Depot and the Bayfront area.

Adjacent to Great Lakes Aquarium

A third location that would emphasize public education of this technique over actual treatment of storm water, is to the west of GLA. This area is in the realm of the aquarium and this activity consistent with their role of connecting the general public with water related habitats, systems and issues. This demonstration garden would utilize water pumped from the bay.

Recommendations

1. Bayfront planning be allowed to re-start without new commitments creating limitations.
2. The city be supportive of alternative locations for treating storm water with natural processes.
3. Before alternative sites are researched, a detailed project purpose memorandum be developed which defines fundamental motivation for the project and its essential outcomes.
4. That city staff charged with stormwater strategies and education and, the Regional Stormwater Protection Team are part of any private initiative in the creation and implementation of stormwater education demonstrations or treatment systems.