

**A COMPARATIVE DESIGN ANALYSIS OF TWO MEDIUM-SIZED URBAN
WATERFRONTS: THUNDER BAY AND WINDSOR**

BY

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Executive Summary

Thunder Bay and Windsor are no different from every other port-city in the world. They are in the midst of a transformation towards a publicly accessible and recreation based waterfront. This report compares the central waterfronts in these two cities and offers recommendations for future redevelopment and design that will aid in their transition. Principles from the Royal Commission on the Future of Toronto's Waterfront are the template for analysis of these two waterfronts. Nine principles from the *Regeneration* report were reviewed and applied to Thunder Bay and Windsor using a previously tested method. The principles in the *Regeneration* report are:

- Clean
- Green
- Connected
- Accessible
- Open
- Useable
- Diverse
- Affordable
- Attractive

Evaluation criteria were developed using a previous research report, policy documents, and waterfront design literature. Twenty-six criteria were applied under the nine principles to analyze each waterfront and offer recommendations for the future:

Clean

1. Provincial water quality guideline is met

Green

2. Public open space represents significant land on the waterfront
3. Significant amount of land of waterfront reserved for natural area and conservation

Connected

4. Waterfront trails should weave through parks
5. The waterfront trail should be close to the water's edge
6. Road use in place of a waterfront trail should be minimal
7. Waterfront promenades should have minimal breaks
8. Historic features and buildings should be present on the waterfront

Accessible

9. Minimal walking distance between public transit stops and waterfront
10. Minimum width for waterfront trails
11. Presence of clear signs or orientation maps at park entrances
12. Vehicular traffic should not create congestion

Open

13. Clear view front street leading to the water
14. Views of the waterfront should not be blocked by tall buildings
15. View of water body from northern boundary of park

Useable

16. A range of activities, with at least one lake [or river] dependant activity
17. No hidden enclaves within the sites
18. Waterfront trails lit at night for safe use
19. Appropriate distance of picnic site and parking
20. Public washrooms available in parks
21. Winter maintenance of park pathways

Diverse

22. The supportive surrounding uses
23. Variety of attractions to draw users

Affordable

24. Public boat-launch ramps and marina slips
25. Minimal cost for travel and entrance to waterfront

Attractive

26. Mix of landscape types in park

The areas studied were in close proximity to the downtowns cores. The Thunder Bay study area is larger due to the three core areas near the water's edge created by the amalgamation of Fort William and Port Arthur in the 1970's.

Twenty-two sites including industrial and open spaces were included in the study. These sites were classified into local nodes, regional nodes, activity centres, natural and industrial/working waterfront areas. Nine sites from Thunder Bay and thirteen sites from Windsor were selected to represent similar waterfronts in both cities.

Thunder Bay's current waterfront does not meet most evaluation criteria (see Figure i). The waterfront in Thunder Bay has poor accessibility, visual appeal, openness, and connectivity. There are only three recognizable open spaces along the waterfront, which are surrounded by industrial uses that detract from the natural beauty of the water's edge. The limited public park system along the waterfront is a weak point in the municipality's evaluation.

From the analysis of the waterfront sites, both cities performed poorly in recreation water quality standards. However, Windsor has a well-connected central waterfront parks system that offers many activities and recreation opportunities along the waterfront. Additionally, impressive views of Michigan are present throughout the central riverfront because of the lower shoreline of the Detroit River in relation to the rest of the city. Unfortunately, Windsor has no naturalized areas along its waterfront.

Table i: Evaluation of Thunder Bay and Windsor Waterfronts

CRITERIA	THUNDER BAY	WINDSOR
Clean		
Water Quality	●	●
Green		
Waterfront Open Space	●	●
Waterfront Natural Area	●	○
Connected		
Waterfront trail / Promenade Weaves Through Parks	●	●
Waterfront trail / Promenade Near Water	●	●
Waterfront trail Not Near Arterial Road	○	●
Continuous linear use of the waters edge	○	●
Waterfront Historic Features	○	●
Accessible		
Transit Stop within 400m	○	●
Width of pathways is min 2.4m	○	●
Orientation signs / maps present	●	○
Road access to site	○	●
Open		
View from streets perpendicular to shoreline	○	●
Appropriate Scale of development	○	●
View from boundary	○	●
Useable		
Range of activities available	○	●
Min hidden enclaves	○	●
Visibility on WFT at night	●	●
Distance from picnic to parking	●	●
Provision of toilet facilities	●	●
Winter pathway maintenance	●	●
Diverse		
Supportive adjacent land uses	○	●
Variety of attractions & Activities per annum	●	●
Affordable		
# and cost of Boat Launch Ramps	○	○
Minimal Cost To Travel and Enter	●	●
Attractive		
Mix of Landscape Types	○	●

○ = does not meet criteria

● = scarcely meets criteria

● = meets/exceeds criteria

Thunder Bay Recommendations

Short-term recommendations

- Undertake a study of waterfront practices in similar sized communities to guide the implementation of the 'Next Wave' plan.
- Provide more water dependant activities along the waterfront.
- Connect the Mc Intyre Floodway trail system to the Neebing Marsh to link the Intercity Core.
- Widen existing and future pathways to a minimum of 2.4 metres.
- Place demand-activated traffic signals at the entrances of the Thunder Bay Marina.

Medium-term recommendations

- Develop public transit routes to access the waterfront areas in the Intercity and southern core.
- Increase accessibility of the waterfront area paving pathways.
- Create momentum for development and link areas with small waterfront parks along the waterfront.
- Promote the historic significance of the original settlements in Thunder Bay the area with relics or markers
- Disperse activities throughout other waterfront parks.

Long-term recommendations

- Consolidate industrial uses along the waterfront.
- Develop waterfront retail uses such as cafés, restaurants, and shops.

Windsor Recommendations

Short-term recommendations

- Place pedestrian oriented lights more commonly throughout the waterfront park system.

Medium-term recommendations

- Naturalize the central riverfront in Windsor with vegetation native to the region.

Long-term recommendations

- Develop waterfront retail uses such as cafés, restaurants, and shops along the north side of Riverside Drive.

Recommendations for both Thunder Bay & Windsor

Short-term recommendations for both cities

- Identify existing and future waterfront open spaces and their linkages with a signage system. Post signs within both cities' waterfront parks identifying the maintenance of the park, and the operation hours of the facilities. Development of a comprehensive orientation system that accurately shows distinct boundaries of the existing waterfront parks to replace the current orientation maps is needed for both port-cities.

Medium-term recommendations for both cities

- Construct at least one other publicly-accessible boat launch within the core areas.

Long-term recommendations for both cities

- Obtain easements across industrial waterfront lands.
- Continue to acquire lands along the waterfront.
- Continue towards creating a clean waterfront through processes outlined by the International Joint Commission.