



# Long Term Arena Strategy

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10 YEAR CAPITAL ACTION PLAN  
40+ YEARS OF CITIZEN BENEFIT

**June 2012**

Respectfully submitted to Regional Council on behalf of the Council Appointed Steering Committee

**ACKNOWLEDGEMENTS**

His Worship Mayor Peter Kelly  
Halifax Regional Council

**Council Appointed Steering Committee**

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The Project Manager would like to thank the Long Term Arena Strategy Steering Committee participants for bringing their subject knowledge to the table and for their ability to contribute both personally and as representatives of important stakeholder groups.



## TABLE OF CONTENTS

<b>Executive Summary</b>	<b>Pages 6 - 8</b>
<b>Section 1: Background</b>	<b>Pages 9 - 11</b>
1.1 Introduction	
1.2 Project Mandate	
<b>Section 2: Planning Context – Project Discussion and Situation Analysis</b>	<b>Pages 11 - 35</b>
2.1 Community Facility Master Plan: Facility Development Principles	
2.2 Arena Inventory	
2.2.1 Construction/Opening Dates/Age of Facilities	
2.2.2 Ownership and Management Model	
2.2.3 Cost Recovery – Operational Effectiveness	
2.3 User Groups – Mandate for Service Delivery	
2.4 Demographic Analysis and Population Forecasts by Minor Hockey District/School District	
2.6 Current State of Arenas	
2.6.1 Recapitalization Summary (Lou Dursi)	
2.6.2 Recapitalization Financial Impact by Year	
2.7 Review of Canada Games Legacy Facilities	
2.7.1 St. Margaret’s Centre Olympic Ice	
2.7.2 Emera Oval	
2.7.3 Consideration for Additional Outdoor Community Refrigerated Ice	
<b>Section 3: Recommendations</b>	<b>Pages 35 - 43</b>
3.1 Facility Standards Recommendations	
3.2 Policy Development Recommendations	
3.3 Capital Development Recommendations	
3.4 Financial Strategy Recommendation	
3.5 Implementation Recommendations and Timelines (overview)	
<b>Section 4: Implementation</b>	<b>Pages 44 - 46</b>
<b>Section 5: Summary</b>	<b>Pages 46 - 47</b>

## APPENDICES

APPENDIX A:	Building Assessment Summaries Arenas	Pages 50 - 90
APPENDIX B:	2001 Arena Capacity Study - Update 01/29/09, Catherine Oliver	Pages 92-113
APPENDIX C:	Long Term Arena Strategy Background Report 03/31/11, Catherine Oliver	Pages 114-133
APPENDIX D1:	Arena Operations Assessment Nov. 2010-Oct. 2011 12/30/11, Catherine Oliver	Pages 134-151
D2:	BMO Financial Package for Period Ending March 31, 2012	Pages 152-159
APPENDIX E:	Community Facility Master Plan 06/30/08 <a href="http://www.halifax.ca/facilities/CFMP/documents/CFMPFINALMay08.pdf">www.halifax.ca/facilities/CFMP/documents/CFMPFINALMay08.pdf</a>	Pages Online
APPENDIX F:	LTAS Steering Committee Terms of Reference <a href="http://www.halifax.ca/facilities/CFMP/documents/LTASSteeringCommitteeTermsofReference.pdf">www.halifax.ca/facilities/CFMP/documents/LTASSteeringCommitteeTermsofReference.pdf</a>	Pages 162-165
APPENDIX G:	Community Access Plan <a href="http://www.halifax.ca/facilities/CFMP/documents/CommunityAccessPlan.pdf">www.halifax.ca/facilities/CFMP/documents/CommunityAccessPlan.pdf</a>	Pages Online



## EXECUTIVE SUMMARY

Analysis for the Long Term Arena Strategy included all municipally owned ice surfaces, with consideration for the full landscape of arena inventory.

The scope of work for this review was broad and included such things as:

- Consideration of non-municipal facilities;
- Consideration for recapitalization, replacement and reuse of municipal facilities;
- Locational options;
- Outdoor refrigeration opportunities;
- Identification of proposed priorities; and
- High level multi-year capital budget outline for implementation for municipal facilities

Also included in the discussion and recommendations are consideration for operational and governance enhancements related to scheduling, access plan, and pricing structures.

In all cases, recommendations were considered by the Steering Committee to add value, where there was evidence of inherent efficiencies to the provision of services to citizens. The concept of “enhanced participation for citizens” was an important guiding principle. An additional consideration for the Steering Committee was that the provision of ice in HRM should be done in a manner that would enhance access to citizens while, when possible, provide a more cost and operationally effective structure for the Municipality. The consolidation and construction of replacement arenas as purpose built and purpose located, versus continued investment in existing aging arenas was reviewed in detail. The key findings led to recommendations related to opportunities for the replacement of aging arenas in order to provide a higher level of efficiency and operational effectiveness by consolidation and retirement of some aging arenas.

The Steering Committee has taken a look to the future. The recommendations that follow are an indication of a desire to be proactive in the establishment of more effective and sustainable arena provision and service delivery.

### Four Key Findings:

1. This study determined that there is no need to add additional inventory – no additional ice surfaces are recommended as part of this review. The following facts indicate decreasing demand and extra capacity in existing arenas:
  - Usage in arenas is currently declining. Off-peak usage has reduced over the past five years – see Table 8a, 8b;
  - Adult recreational hockey groups are well served presently, based on demand levels. These groups historically, have used a higher percentage of off peak ice times then they are currently using;

- Regional population in the 0-19 age groups is declining as outlined in Table 16 School Enrolments; and
  - The HRM “Recreation Blueprint” focuses on children and youth as primary target markets.
2. The implementation of a Centralized Scheduling Process will provide for strategic usage of facilities that will in turn ensure more effective utilization of municipal assets.
    - This is particularly true in off peak seasons like Spring, Summer and September, as well as during non-prime regular season times. See Tables 9a, 9b, 10a, 10b.
  3. Implementation of the Community Access Plan will ensure a fair and equitable distribution of ice time throughout sports, genders and age groups.
    - Currently in place at the BMO Centre, the Access Plan will support the existing youth and adult programs currently in place, and will allow for additional access for new and underserved groups.
  4. Consolidation of aging arenas into multi-pad arenas is supported as a fiscally responsible decision related to both capital construction and operations. As older arena facilities are retired and replaced, opportunities for their re-use will be present which could assist in the promotion and support of non-ice activities such as Lacrosse.

The consolidation of 6 existing aging facilities into 2 new multi-pad facilities is anticipated to reduce operating, maintenance and recapitalization costs to the Municipality in excess of \$2M per year. Furthermore, annual lifecycle reserves will be established at each of the two proposed facilities, and would be adequately funded through operating revenues of each facility. (Indicative operating costs Section 2.2.3)

Recommendations in this report are organized into 5 categories, and will guide decision making for the provision of arena facilities into the future:

1. Facility Standards Recommendations
  - Development of 12 “functional considerations” to be considered in construction of new and recapitalized facilities
2. Policy Development Recommendations
  - Supporting the Steering Committee principle of enhanced participation, 6 recommendations are to be considered. They address issues such as Access, Centralized Scheduling, Cost Recovery, and Pricing
3. Capital Development Recommendations
  - Recapitalization for Multi-District Facilities that have arenas
  - Peninsula Consolidation – Multi Pad Arena
  - Dartmouth Consolidation – Multi Pad Arena



- Retirement and effective re-use of existing aging arenas
- Overall reduction of building inventory from 14 to 8

#### 4. Outdoor Rinks Recommendations

- Long Term - Community Refrigerated Ice Program

As outlined in 2.7.3, the Steering Committee proposes that a long term investment be made into outdoor refrigerated ice opportunities for other areas in the Municipality, in order to enhance participation, and reduce some barriers such as transportation for some citizens. This investment would include both capital and operating funds in order to develop small refrigerated ice surfaces throughout the Municipality – and that annually, a decision be made through a grant/lottery to situate a facility in a local community. It is suggested that this recommendation be reviewed within the context of capital planning for consideration after 5 years of successful Emera Oval operation.

#### 5. Financial Strategy and Implementation Recommendations

- Utilizing existing annual recapitalization funds for strategic long term benefit
- Support and promote capital partnerships
- Short Term – proceed with Peninsula Consolidation
- Medium Term – proceed with Dartmouth Consolidation

Short Term Recommendations 2012 - 2015	Medium Term Recommendations 2016 - 2020	Long Term Recommendations 2020 - 2025
<ul style="list-style-type: none"> <li>•Centralized Scheduling</li> <li>•Access Policy</li> <li>•Peninsula Consolidation</li> <li>•MDF Phase Recapitalizations</li> <li>•Annual lifecycle investments</li> </ul>	<ul style="list-style-type: none"> <li>•Dartmouth Consolidation</li> <li>•MDF Phase 2 Recapitalizations</li> <li>•Annual lifecycle investments</li> </ul>	<ul style="list-style-type: none"> <li>•MDF Phase 3 Recapitalizations</li> <li>•Annual lifecycle investments</li> <li>•Outdoor Rink Project</li> </ul>

This timeline is contingent on being able to proceed with the Peninsula Consolidation without compromising the current level of arena inventory. If this is not possible, the Dartmouth Consolidation should proceed first. This is important in order to maintain the current service level of arena users to meet their program needs.

Refer to Sections 3 Recommendations, and 4 Implementation for detailed discussion.

## SECTION 1: BACKGROUND

### 1.1 Introduction

The Long Term Arena Strategy (LTAS) was mandated by Regional Council in January of 2010, in order to fulfill the analysis required to guide arena inventory decision making.

Council initiated a two-phase strategy to address the region's arena deficiencies (i.e. arena shortage and their aging condition). Phase 1, the short term strategy, addressed an immediate critical shortage of ice surfaces and resulted in construction of the BMO Centre. Phase 2 is the development of a Long Term Arena Strategy that would look at the remaining aging infrastructure and develop long term options to ensure there would remain a stable and adequate number of ice surfaces in the future. Phase 1 was led by the Municipality. Phase 2 is being led by a Council approved Steering Committee. The Terms of Reference for the Long Term Arena Strategy Steering Committee were approved by Regional Council at the January 26, 2010 Council Meeting, and are included in Appendix F of this report.

The Committee, led by a staff Project Manager, was assigned to undertake stakeholder discussions, data gathering and analysis (e.g. building condition assessments, demographic and user trends, capital and operating costs, etc.) and to present options and a recommended strategy to Council. The recommendations will address issues such as recapitalization of existing arenas, consolidations and construction of new arenas, closures, priorities, comparative capital/operating costs of various arena configurations/options, and phasing. In the case of any recommended closures, the Committee will also provide recommendations with respect to whether these buildings and properties should be disposed of or redeployed for other recreational or public purposes.

The successful completion of the LTAS project is represented by a series of recommendations in a number of areas included in this report. Based on the evidence gathered in the process of this analysis, the implementation of these recommendations will result in renewed efficiencies in operations and service delivery, and enhanced access to the municipal arena assets for the next 40+ years. Regional Council will be guided by the thorough work of the Steering Committee, representing all of the major ice and non-ice arena user groups, and volunteer citizens, as HRM moves together toward an integrated and strategic approach to the management of municipal arena assets for the common good of all users.

### Project Timeline

The terms of reference for the LTAS Steering Committee and project were approved in January 2010. Following a recruitment process the Committee was formed and then initiated work on the LTAS process in September 2010.

As part of the Canada Games Legacy, it was intended that the chillers from the Emera Oval be reallocated to other locations across HRM.

Therefore, the mandate of the LTAS committee was expanded to include assessment of locations for the chillers after the Canada Winter Games.

A portion of the initial work of the committee was focussed on this aspect. Due to the success of the Emera Oval, Regional Council decided to make it permanent at the current location in March 2011. This decision removed the need for the committee to complete the assessment of locations and therefore, the focus of the committee shifted to the remaining mandate items. Also, in December 2010, Regional Council opted to bid on the 2015 FIFA Women's Soccer event and commencing in May 2011, the work on the LTAS was suspended for the most part while analysis on a potential stadium was undertaken until the final decision was made in March 2012. During the work on the Stadium, minimal work continued on the LTAS including further data analysis and periodic assessment by the committee. Upon completion of the stadium work in March 2012, focus returned to the LTAS work and completion of the final analysis.

### **1.1.1 Project Mandate**

As approved by Regional Council, the Committee's primary role was to develop and recommend a long term replacement strategy for the provision of municipally owned ice arenas in HRM. This strategy was to also consider the use of community outdoor refrigerated ice rinks as a possible part of the replacement solution, and the 2011 Canada Games Legacy Rink (The Emera Oval).

More specifically, the Committee was asked to:

- a. Review and refine a staff recommended project scope and time line (Section 2.1)
- b. Develop with staff a public/stakeholder participation program in order to stimulate comment/consultation and gain further input. Recommend public meetings as required. \*
- c. Advise on the need and priorities for background and studies and research (Section 2.1)
- d. Review all available background information
- e. Take into consideration usage and future plans of any non-municipally owned facilities and potential impacts (Section 2)
- f. Determine which HRM owned facilities are best suited to be recapitalized, which ones should be considered for conversions to other indoor recreation usage, and which ones would be better suited to be replaced. Include siting options/recommendations for those replacement needs (Section 3)
- g. Consider community outdoor refrigerated as a part of a long term replacement strategy. Include siting options/recommendations for those as well (Section 2.7.3)
- h. Take into consideration the 2011 Canada Games Legacy arena opportunity and recommend siting options for this project (Section 2.7)
- i. Recommend a multi-year implementation plan for the long term strategy, indicating the order in which priorities should be implemented (Section 4)
- j. Develop, with the aid of staff, a high level multi-year capital budget plan using industry standard costs/sq. ft. estimates (Section 4)
- k. Take into consideration, as part of the implementation strategy, the role of user fee cost recovery, cost sharing, fund-raising and use of area rates (Section 2.2.3)
- l. Make the final presentation and recommendation of a long term strategy to Regional Council

The Committee undertook all of these tasks. These recommendations have been developed based on a practical approach to both service delivery and sound operational expectations.

\* LTAS process was research based, with leadership representation from service provider groups and public at large on the Steering Committee. Although discussed by the Steering Committee at length as a project deliverable, the eventual timing of the project did not allow for open general consultation.

## SECTION 2: PLANNING CONTEXT

In order to provide Regional Council with an informative and evidence based report, three key areas of analysis were undertaken in the process of this analysis:

- a. Capital facility inventory and assessment
- b. User group access and usage statistics
- c. Facility operating revenues and expenditures

The Steering Committee undertook a thorough review of all aspects of the data and statistical analysis, and took a consensus approach to decision making during the development of recommendations. In addition, the Steering Committee adopted the philosophy that their primary goal, was to work towards recommendations and improvements to the existing service provision that would increase participation by citizens in ice season, and off ice season facility usage. It recognized that there are some barriers to participation at this time that are related to the rental cost of ice time. The lack of availability of prime time hours during the regular season ice time is also a barrier for some ringette and figure skating groups. See Table 13.

A review of prime time usage across all facilities identified that there is less usage of “fringe times” (i.e. 4:00 pm – 6:00 pm and 10:00 pm – 12:00 am during the week), then at any time in the recent history. See Table 8 a, b. The successful provision of additional ice inventory in the Short Term Strategy has resulted in a reasonably fair distribution of prime time access across the Municipality. However, the fact that fewer “fringe times” are being rented, along with pricing and scheduling considerations, has caused some financial strain in the system.

Arena managers concur that this decline in non-prime usage of facilities translates into a more competitive environment in which to acquire clients, and a more difficult task of generating overall revenues. Most clients clearly prefer access to prime time vs. non-prime time when given a choice. Facility Managers say that it is difficult to cost effectively operate public facilities without a strong percentage of utilization in the non-prime time category of ice inventory.

For the most part, minor hockey groups receive a reasonable percentage of access to facilities. Facility Schedulers indicate that their facilities do not have waitlists, and with the exception of the Eastern Shore minor sport organizations, groups are not requesting a large amount of additional ice time. As indicated in Table 13 Access in Minutes by User, there is currently a variance in access to ice time between minor hockey user groups, and other ice sports.

## 2.1 Community Facility Master Plan: Facility Development Principles

Facility Development Guiding Principles have evolved formally in HRM since the adoption on the 2004 Indoor Recreation Facility Master Plan (IRFMP) by Regional Council. The IRFMP document was the first of its kind for the Halifax Regional Municipality (HRM), which was an amalgamation of 4 existing municipalities in 1996. As such, it was necessary to outline basic guiding principles for facility development in order to establish a common level of expectation in the amalgamated municipality. The approval in principle by Regional Council of the Community Facility Master Plan (CFMP) in 2008 further supported and clarified the 2004 guiding principles.

These guiding principles for facility development (pg. 72 IRFMP) are:

- Philosophy
  - HRM understands and respects the geographic and social demographic diversity and responds to the needs of citizens in a fiscally prudent manner
  - Trends, carefully balanced with desires will be given careful consideration to develop accurate and appropriate priorities and strategies
  - Needs are also determined based on priority target groups as defined in the HRM Community and Recreation Services “Recreation Blueprint”
- Compatibility with HRM Regional Planning and Principles
- Partnerships – Non-Municipal management and financing of recreation facilities is encouraged assuming the approved mandates and service delivery standards will be increased or at least achieved
- Community Management Agreements
  - Should be standardized to ensure the best interests of the citizens are being met
- Scale of Accommodation for Facility Location
  - Location of new facilities to be determined through Facility Implementation Model in consideration of the Regional Plan
  - New facility or expansion must have significant/appropriate population and demographic support
  - New facility development will not be undertaken in competition with existing (municipal) services
  - Recreation facilities will be located on highly visible sites that maximize access opportunities for citizens
  - Prior to development of additional facilities, existing facilities will be evaluated for existing special opportunities that accommodate the service need
- Facility Types
  - HRM facilities should focus on participation rather than spectator events
  - Whenever possible, new facilities should be developed in conjunction with existing in order to maximize both the convenience and enjoyment of citizens, and economies of scale in terms of operations
- Recovery of Operating Cost
  - Facilities should be provided in multi-use components and in combination with other services
  - Facility components and features should increase revenues whenever possible
  - Facilities should be scheduled to accommodate the needs of the users while at the same time maximizing cost recovery

Building on these stated principles, the 2008 Community Facility Master Plan provided the following additional areas for consideration (pg. 11 CFMP):

- Integrated Planning
  - Effective use of other Council approved strategies, directives and planning tools to facilitate integration of existing policies to ensure compatibility with community vision and existing community plans
- Distribution of Facilities
  - Consideration of population and its distribution throughout the municipality is an important aspect to successful community facility planning
- Activity Coverage
  - The municipality will strive to provide a range of recreation opportunities for its residents and design facilities that promote participation
- Community Based Arts and Culture
  - Program opportunities should be built into community facilities wherever possible
- Balance New Assets Against Lifecycle Obligations
  - A balance must be found between investing in new assets and existing facilities. Priority should be given to maintenance, lifecycle and upgrade of current assets
- Community Building Through Asset Management
  - Management models other than municipally operated facilities are strongly encouraged
- Ensure agility in planning to accommodate for future change

In every case, these principles are given consideration in new facility planning, and when recommendations for facility development are brought forward to Regional Council for consideration. In summary, these principles can be reduced to three guiding principles: build smart, build appropriate, and build only when necessary.

## **2.2 Arena Inventory**

### **Historical Perspective**

Arena inventory and provision of ice to user groups has historically been a shared role for the Municipality and a number of privately owned and operated arenas. Private owners, although in place primarily to respond to the needs of their specific constituency, allow and encourage a level of public usage in their facilities. Two of the six privately owned arenas operate specifically for the benefit of the public, and do so at no cost to the Municipality. The other four, two owned by DND and two owned by separate Universities, operate for the benefit of their own members, but allow some public access as well. Dalhousie University has recently announced a service disruption of one to several years as they repair or replace their aging arena, effectively reducing the inventory to 25 for an undetermined amount of time.

The responsibility to provide recreation, sport and leisure facilities for citizens rests with the Municipality, and although there are examples of some capital funding assistance from the Province of Nova Scotia, these examples are rare, and are based on the priorities and capacity of the government of the day.

## 2.2.1 Construction/Opening Dates/Age of Facilities

### Current Perspective

Currently there are 26\* sheets of ice in the HRM, located in 20 different facilities.

**Table 1: Arena Inventory**

	Owner/Operator	Arena	Year Constructed	Age in Years
1	HRM/HRM	Devonshire Arena	1971	41
2		Gray Arena	1972	40
3		Gerald J LeBrun Arena	1972	40
4		Bowles Arena	1972	40
5	HRM/Community Board	Halifax Forum	1927	85
		Halifax Forum Complex – Civic Arena	1995	17
6		Centennial Arena	1967	45
7		Spryfield Arena	1972	40
8		Eastern Shore Community Centre	1973	39
9		Cole Harbour Place - Scotia 1	1975	37
		Cole Harbour Place - Scotia 2	1988	24
10		Halifax Metro Centre	1977	35
11		Dartmouth Sportsplex	1982	30
12		St Margaret's Centre - Fountain	1985	27
		St Margaret's Centre - Smith	2005	7
13		Sackville Sports Stadium	1989	23
14	HRM/Private Operator	BMO Centre – A, B, C, D	2010	2
15	Privately Owned	Shearwater Arena	1964	48
16		Saint Mary's Arena	1966	46
17		Shannon Park Arena	1969	43
18		Sackville and District Community Arena	1973	39
19		*Dalhousie Arena	1983	29
20		Bedford Dome	2009	3

\*recent closure announcement by Dalhousie University

**Table 2: Age Profile**

Age in Years	Number Of Ice Sheets
40+ years	10
30-39 years	5
20-29 years	4
10-19 years	1
9 years & under	6

Consistent with the age profile, recapitalization requirements have been identified for many of the municipal facilities. With 57% of the municipal inventory over the age of 30 years (11 of 20 arenas), and 58% of the overall inventory over 30 years (15 of 26 arenas), many of the requirements are related to mechanical systems that are considered to be critical to the ongoing capacity of the facility to make and keep ice. In most cases, investments in these facilities have been limited to general upkeep.

A comprehensive facility assessment has been carried out on each of the 14 municipally owned facilities (20 sheets of ice in total) in order to identify the recapitalization requirements necessary to maintain a basic level of productivity at each facility. The recapitalization planning does not address implementation of operational efficiencies outside of those which would be realized purely from the recapitalization of aging equipment and mechanical systems. This assessment will be discussed in Section 2.6.1.

## **2.2.2 Ownership and Management Model**

### **Management and Operations of Facilities**

HRM owns and operates either directly, or through various types of partnerships, 20 ice sheets which are located in 14 different facilities. These 14 facilities are the primary subject area of this analysis. Staff have reviewed and is familiar with some of the operational goals and objectives of the privately owned facilities, but has not carried out a detailed review on those 6 ice surfaces.

**Table 3: Owner/Operator Profile**

Owner/Operator	Number
HRM Owned/HRM Operated	4
HRM Owned/Board or Private Operated	16
Privately Owned and Operated	6

Although owned by the Municipality, there are 10 different management groups tasked with operational and strategic responsibility for the facilities. This takes place, with two exceptions, through management agreements with community boards. A private company currently operates the BMO Centre 4Pad facility, and the municipality operates 4 single sheet arenas.



This model has created an effective competitive environment for the users, but also establishes a unique situation that in many cases works against the ability of user groups to get fair and equitable access to ice time.

This environment rewards the larger, more organized, historic user groups that are knowledgeable and capable of contacting and negotiating with several facility management groups concurrently, and works against smaller, less organized user groups and individuals that may not be experienced in this aspect. The more experienced group will choose the cheapest and best times for ice that are available, regardless of how many facilities they may have made tentative commitments with. This type of negotiation and ultimate last minute decision by the user groups often means that other potential user groups are not able to access the arena inventory (ice rentals), because of the lateness of the decision, and the ice often becomes surplus to the facility. This type of negotiation is currently the norm in HRM, and as a result, facilities and user groups alike are left at risk by user groups who, by no fault of their own, choose the most cost effective option at the last minute, releasing their unneeded inventory back into the system.

Volunteer board and partnership management groups in the HRM are to be commended for their work over many decades of service provision, often with limited or no assistance from the municipality. Their dedication to citizens related to the development and enjoyment of sport and recreation, set the stage for families, individuals, and young future sport stars to excel in our region. Without their vision and commitment, many of the facilities on our region would never have been built.

The following tables illustrate the current arena facility management groups in partnership with HRM:

**Table 4: Board and Partner Operated Arenas:**

<b>Board and Partner Operated Arenas:</b>	<b>Operated by:</b>
Halifax Forum Complex (including Civic Arena)	Halifax Forum Community Association
Centennial Arena	Centennial Arena Commission
Spryfield Arena	Spryfield Lions Rink and Recreation Society
Eastern Shore Community Centre	Eastern Shore Recreation Commission
Cole Harbour Place Scotia 1 & 2	Community Builders Inc.
Halifax Metro Centre	Trade Centre Limited
Dartmouth Sportsplex	Dartmouth Sportsplex Community Association
St. Margaret's Centre Fountain & Smith	St. Margaret's Arena Association
BMO Centre A, B, C, D	Nustadia Recreation Inc.
Sackville Sports Stadium	Interim HRM

**Table 5: Municipally Owned & Operated Arenas:**

<b>Municipally Owned &amp; Operated Arenas:</b>	
Devonshire Arena	Peninsula Halifax
Bowles Arena	Dartmouth
Gray Arena	Dartmouth
Bedford LeBrun Arena	Bedford

**Table 6: Privately Owned & Operated Arenas:**

<b>Privately Owned &amp; Operated Arenas:</b>	<b>Owned by:</b>
Dalhousie Memorial Arena	Dalhousie University (decommissioned as of April 1/12)
Saint Mary's Alumni University Arena	Saint Mary's University
Shearwater Arena	Department of National Defense
Shannon Park Arena	Department of National Defense
Sackville and District Community Arena	Lake District Recreation Association
Bedford Dome Arena	Rocky Lake Development Association

### Cooperative Planning

Annually, for the past three years, members of the volunteer board management groups, along with municipal staff, and the private arena owners, have gathered to review bookings for arena users in order to work towards fair and equitable ice allocation. This process has been voluntary and although well attended at about 80%, has not achieved 100% participation by all municipal partners. It is limited in scope, and was designed to allow for cooperative problem solving regarding requests for ice usage particularly when ice inventory is affected (such when the BMO Centre was introduced, or when Dalhousie University announced the closure of its arena). It does not address unused ice or ice time availability, does not thoroughly address the needs of recreational hockey for adult men or women, tournament equity, off season equity, public skating equity or the role of private sector skill development rentals.

It also does not benefit from a Council approved Community Access Plan in order to ensure groups and individuals are given fair and consistent access to municipal assets. The only facility to date with an "Access Policy" in place is the BMO Centre, HRM's new 4Pad Arena. **This report will recommend the implementation of a centralized scheduling policy and a region – wide Access Plan in order to ensure better access and more efficient use of municipal facilities.**

### Cost Recovery of Arena Operations

At this time, board and privately operated municipal facilities are expected to operate at 100% cost recovery – that means that the revenues generated at the arena must meet or exceed all operational costs, debt service (if applicable) and recapitalization. Each of the facilities is able to apply to the municipality each year for recapitalization assistance and, pending budget approval, receive assistance in this area. Most of the facilities require some level of operational support from the municipality and receive that support in a number of different ways such as:

- Annual operating subsidy;
- Annual debt payments;
- No fee financial and administrative support; and
- Municipal leases for space or parking

In addition, each facility operates in isolation of the others as a separate entity. Operational decisions such as pricing structures, priority access to inventory, seasonal sport and tournament choices, whether or not there is off season ice i.e. summer ice available, staffing levels, refund and advertising policies, etc., are the responsibility of the individual management group. There is inconsistency in these operational policies by virtue of having many groups involved, and there is a level of difficulty inherent with ensuring that there is fair and equitable access for citizens throughout the region. As such, the task of finding and securing ice is not necessarily an easy one for citizens and user groups.

From an “asset owner” perspective, there is inconsistency in the types of performance measurements and accountabilities that are in place as a result. This is an area that would benefit from a strategic approach. **The Steering Committee hopes to achieve benefits in this area through the implementation of the Community Access Plan, and the Centralized Scheduling methodology.**

It should be noted that not only are there various management models, but there are various facility types as well. As previous facility principles have outlined, and current models have illustrated, multi-district or multi-use facilities are more cost effective to operate, and more convenient for citizens. It is difficult within the current financial reporting environment to “pull out” arena-specific information from these multi-district facilities and it is difficult to identify “apples to apples” in almost every case. This also is a symptom to some degree, of multiple management groups each with various software, reporting systems, and approaches.

Notwithstanding, the following Tables 7a and 7b in Section 2.2.3 provide an illustration of the existing information relative to each facility, including annual revenues and expenditures, and indicative surplus or deficit for the years as noted. This is not empirical data, but is a solid representation of the indicative costs to the municipality, and the fiscal benefit of consolidated facilities.

### **2.2.3 Cost Recovery – Operational Effectiveness**

#### **Indicative Operating Cost of Facilities**

With consideration of many factors in a fairly complex environment, the following Tables outlines indicative operating costs for municipal arena facilities for the time period noted. Tables 7a and 7b show actual revenues and expenses. Some of the facilities are classified as Multi-District Facilities (MDF) and some are classified as Arenas. As outlined in Section 2.2.2, various facility types and configurations make it challenging to provide an empirically correct comparison of operating costs at this time.

**For detailed breakdown see Appendix D1 and D2.**

**Table 7a: Actual Operating Cost**

	Facility Name	Facility Type	2010/11 Actual Revenue	2010/11 Actual Expenses	Annual Net Surplus (Deficit)
	Bowles Arena	Arena			
	Devonshire Arena	Arena			
	LeBrun Bedford Arena	Arena			
	Gray Arena	Arena			
<b>a)</b>	<b>Sub Total</b>		\$1,152,226	\$1,764,623	<b>(\$670,421)</b>
<b>b)</b>	<b>BMO Centre (2010/11)</b>	Arena	\$927,477	\$755,996	
		Capital Reserve		\$83,335	<b>\$88,146</b>
<b>c)</b>	<b>BMO results (2011/12)</b>	Arena	\$1,860,530	\$1,637,951	
		Capital Reserve		\$250,000	<b>(\$51,877)</b>
<b>d)</b>	<b>BMO budget (2012/13)</b>	Arena	\$1,926,275	\$1,589,581	
		Capital Reserve		\$250,000	<b>\$91,828</b>

The following actual results do not include specific additional support provided by HRM as listed in the Cost Recovery section of this report.

**Table 7b: Actual results 2010/2011**

Facility Name	Facility Type	2010/11 Actual Revenues	2010/11 Actual Expenses	Net Surplus (deficit) (after subsidy, debt, capital)
Centennial Arena	Arena	\$578,000	\$599,000	(\$25,000)
Eastern Shore Community Centre	MDF	\$493,000	\$497,000	\$0,000
Spryfield Lions Arena	Arena	\$327,638	\$337,229	(\$21,485)*
Cole Harbour Place - Scotia 1& 2	MDF	\$3,530,000	\$3,161,000	\$103,000
Dartmouth Sportsplex	MDF	\$4,786,000	\$5,050,000	(\$238,000)
St. Margaret's Arena Smith & Fountain	MDF	\$1,557,000	\$1,560,000	(\$13,000)
Sackville Sports Stadium	MDF	\$3,260,000	\$3,240,000	(\$226,000)
Halifax Forum & Civic	Arena	\$3,559,000	\$3,601,000	(\$213,000)

\*deficit carried over from previous year

### **Regular Season October 1 – March 31**

The following quote from Catherine Oliver's 2011 Long Term Arena Strategy Background Report (Appendix C), summarizes important regular season facts:

"Fewer operating hours are defined as prime time in 2011 as compared with 2007 or 2001. In 2011 prime time hours were 48 hours per week while in 2007 they totalled 57 hours, and in 2001, 67 hours. The percentage of prime time use has declined from 100% to 99% since 2007. There are currently 15 hours of unused prime time among the 20 facilities analyzed. The percentage of fringe time use has declined between 2007 and 2011 from 75% to 60%. There are currently 332 hours of unused fringe time available among the 20 facilities analyzed. If demand remains unchanged, there could be at least 39 hours of excess prime time ice in the 2011-2012 ice season with 26 ice surfaces in operation. Lower utilization levels coupled with fewer hours defined as prime time reduces the amount of revenue generated by arenas.

This compromises operating efficiency and increases net operating costs to owners. There is an unmet demand for learn to skate lessons which could grow as a result of increased interest in skating generated by the Emera Oval.

Overall ice utilization in prime and fringe periods dropped from 89% in 2007 to 82% in 2011. Prime time ice utilization dropped from 100% in 2007 to 99% in 2011 with 15 hours (or more) of prime time ice unused per week. Demand/use levels for Fringe hours can be regarded as giving an indication of overall demand levels for ice time and of demand levels in specific areas. In 2011, 60% of fringe hours were in use while in 2007, 75% of fringe hours were used.” See Table 8a.

**Table 8a: Utilization of Capacity**

	2011	2007
<b># Of Ice Sheets</b>	<b>20</b>	<b>15</b>
Prime Time (Mon-Fri 6:00 pm-10:00 pm) (Sat & Sun 8:00 am-10:00 pm)	99%	100%
Fringe Total	60%	75%
Early Morning (6:00 am-8:00 am)	39%	61%
Late Afternoon (4:00 pm-6:00 pm)	91%	99%
Late Evening (10:00 pm-12:00 am)	59%	74%

“In 2011 Fringe use was highest at Dartmouth Sportsplex at 93% and Cole Harbour at 90% while Fringe hour use at the BMO Centre was lowest at 26% and second lowest at the Rocky Lake Dome at 47%. In 2007, Dartmouth Sportsplex Fringe utilization was 91% and Cole Harbour was 82%. The lowest Fringe utilization recorded in 2007 was 53% at the Fountain sheet at St. Margaret’s Centre. In 2011, Fountain was 71%.” See Table 8b.

**Table 8b: Fringe Utilization**

<b>Highest 2011</b>	<b>2011</b>	<b>2007</b>
Dartmouth Sportsplex	93%	91%
Cole Harbour	90%	82%
<b>Lowest 2011</b>		
BMO Centre	26%	n/a
Rocky Lake Dome	47%	n/a
<b>Lowest 2007</b>		
St. Margaret’s Centre	71%	53%

The following Tables 9 and 10 are included to illustrate the level of individual planning at each facility, and the opportunity for a more consolidated approach to scheduling the municipal assets. A consolidated approach would increase the percentage of overall usage at facilities by consolidating in areas of lower usage, and focussing marketing to the groups who utilize these seasons (non-traditional users) for better overall utilization of the facilities and equipment.

**Table 9a: Spring and Regular Winter: Prime and Non-Prime Definitions**  
**Spring: April 1 to June 30 / Regular Winter: October 1 to March 31**

<b>Prime and Non-Prime</b>			
<b>Spring &amp; Winter</b>			
<b>Prime Hours</b>	48 hrs./wk.	M-F 6:00 pm – 10:00 pm	20 hrs. (4 hrs./day x 5 days)
		Sat 8:00 am – 10:00 pm	14 hrs.
		Sun 8:00 am – 10:00 pm	14 hrs.
<b>Non-Prime Hours</b>	64 hrs./wk.	M-F 8:00 am – 6:00 pm	50 hrs. (10 hrs./day x 5 days)
		M-F 10:00 pm – 12:00 am	10 hrs. (2 hrs./day x 5 days)
		Sat, Sun 8:00 am – 10:00 pm	4 hrs. (2 hrs./day x 2 days)
<b>Total Available</b>	112 hrs./wk.	per Arena	

**Table 9b: Total Spring Hours Rented 2012 (total Municipal inventory)**

	<b>Total Capacity Available</b>	<b>Total Weekly Rented</b>		<b>Total Capacity Available</b>	<b>Total Weekly Rented</b>
WK. 1	1456 hrs.	853.50	WK. 8	1456 hrs.	736.75
WK. 2	1456 hrs.	761.75	WK. 9	1456 hrs.	344.75
WK. 3	1456 hrs.	694.50	WK. 10	896 hrs.	281.75
WK. 4	1456 hrs.	740.50	WK. 11	896 hrs.	210.25
WK. 5	1456 hrs.	717.50	WK. 12	896 hrs.	212.75
WK. 6	1456 hrs.	622.00	WK. 13	896 hrs.	183.25
WK. 7	1456 hrs.	646.25			
<b>Total Hours Rented</b>					<b>6777.50</b>

**Breakdown of data for Table 9b:**

- Subtotal Spring hours available (**13 surfaces for 9 wks.** x 112 possible hrs. per week): 13,104 hours
- Subtotal Spring hours available (**8 surfaces for 4 wks.** x 112 possible hrs. per week): 3,584 hours
- Total Spring hours available: 16,688
- Total Spring hours used: 6,777.5 hours
- **Percentage of Total Spring used: 41%**

Spring utilization is highest as reported, at Sackville Sports Stadium with an average of 77 hrs./wk. over 9 weeks, Centennial Arena with an average of 67 hrs./wk. over 13 weeks and Civic Arena with an average of 67 hrs./wk. over 9 weeks.

Spring utilization is lowest as reported, at BMO Centre with an average of 27 hrs./wk. over 13 weeks, Dartmouth Sportsplex with an average of 28 hrs./wk. over 13 weeks, and St. Margaret's Centre Fountain Arena with an average of 39 hrs./wk. over 13 weeks.

**Table 10a: Summer Prime and Non-Prime Definitions Summer: July 1 – August 31**

<b>Prime and Non-Prime</b>			
<b>Summer</b>			
<b>Prime Hours</b>	84 hrs./week	M-F 8:00 am - 10:00 pm	60 hrs. (12 hrs./day x 5 days)
		Sat 8:00 am - 8:00 pm	12 hrs.
		Sun 8:00 am - 8:00 pm	12 hrs.
<b>Non-Prime Hours</b>	28 hrs./week	M-F 6:00 am -8:00 am	10 hrs. (2 hrs./day x 5 days)
		M-F 10:00 pm - 12:00 am	10 hrs. (2 hrs./day x 5 days)
<b>Total Available</b>	112 hrs./week per Arena	Sat, Sun 8:00 pm - 12:00 am	8 hrs. (4 hrs./day x 2 days)

**Table 10b: Total Summer Hours Rented 2012 (total municipal inventory)**

	<b>Total Capacity</b>	<b>Total Weekly</b>		<b>Total Capacity</b>	<b>Total Weekly</b>
WK. 1	1232 hrs.	432.5	WK. 6	1232 hrs.	652.5
WK. 2	1232 hrs.	468.0	WK. 7	1232 hrs.	669.5
WK. 3	1232 hrs.	554.5	WK. 8	1232 hrs.	760.5
WK. 4	1232 hrs.	566.5	WK. 9	1232 hrs.	578.0
WK. 5	1232 hrs.	561.5			
<b>TOTAL</b>					<b>5244.0</b>

**Breakdown of data for Table 10b:**

- Total Summer hours available (**11 surfaces for 9 weeks**): 11,088 hours
- Total Summer hours used: 5244 hours
- **Percentage of Total Summer Prime and Non-Prime utilized: 47%**

Summer utilization is highest as reported, at Sackville Sports Stadium with an average of 84 hrs./wk. over 9 weeks, at Cole Harbour Place with an average 83 hrs./wk. over 9 weeks, and Centennial Arena with an average of 66 hrs./wk. over 9 weeks.

Summer utilization is lowest as reported, at BMO Centre with an average of 34 hrs./wk. over 9 weeks, Dartmouth Sportsplex with an average of 41 hrs./wk. over 9 weeks, and Civic Arena with an average of 43 hrs./wk. over 9 weeks.

The ability to operate arenas at a sufficient cost recovery level is related directly to the ability to rent non-prime, and off season (Spring, Summer, September) inventory. These factors are critical. It is clear in the analysis that prime time utilization continues to be high (Table 8a) while the non-prime usage has dropped significantly since the last analysis in 2007. See Tables 8b, 9b and 10b.

The data in this section indicates that there is sufficient ice capacity and opportunity for improved, more efficient scheduling of these assets, which will result in a higher level of performance in this facility category, without compromising service delivery to citizens and sport user groups.

## 2.3 User Groups – Mandate for Service Delivery

### Children and Youth

The Recreation Blueprint is the guiding document for service delivery for HRM’s Community and Recreation Services (CRS), and has a focus on ensuring fair and equitable access to participation activities for children and youth. Ice and non-ice activities such as the minor sport activities listed in Table 11: Minor Sport Arena Users are relevant to the CRS document. However, the document does not provide commentary on the appropriateness of providing market driven skill development for children and youth in municipal facilities. Commentary related to adult participation identifies a role in areas “of high need, where CRS is the sole service provider,” or with consideration of a specific level of cost recovery. Market driven skill development programs for children and youth, provided by the private sector, have developed regardless of municipal direction, and remain corner stones of the arena landscape. They are popular with citizens, and they generate revenues for the facilities. These types of activities take place in all arena facilities in the municipality, to some degree. HRM has 14 key user groups for ice and non-ice usage of arena facilities. They are:

**Table 11: Minor Sport Arena Users**

Minor Hockey	Recreational Drop In - Shinny
Minor Ringette	Public Skating
Figure Skate Clubs	Nova Scotia School Athletics Federation
Sledge Hockey	Major Minor And Junior Competitive Hockey
Short Track Speed Skating	Facility Specific Skill Development
Recreational Men’s Hockey	Private Sector Market-Driven Skill Development
Recreational Women’s Hockey	Lacrosse

Minor sport groups are organized through Provincial Sport Organizations (PSO’s) and are members of the provincial Sport Nova Scotia umbrella organization. Participation numbers for those groups are:

- Minor Hockey – 6304 registered participants
- Minor Ringette – 980 registered participants
- Figure Skate Clubs – 1416 registered participants

Short Track Speed Skating experienced a heightened awareness and interest as a result of the recent Canada Winter Games held in HRM, but has not experienced a significant increase in registered participants. Registration is estimated to be fewer than 100. Short Track Speed Skating had 7 hours of ice time in the past regular season.

Lacrosse is a structured non-ice facility user that is represented by both a Provincial Sport Organization and a National Sport Organization. This sport operates year-round with some activity in the Winter months in gymnasiums, with peak seasons in June and September taking place in arenas. The sport currently operates in 8 locations and experiences significant frustration at a lack of ability to gain access in many of the municipal facilities. Currently there are 13 Lacrosse Leagues or Programs, utilizing 1541 non-ice hours per year.



**Table 12: HRM Lacrosse Leagues and Programs**

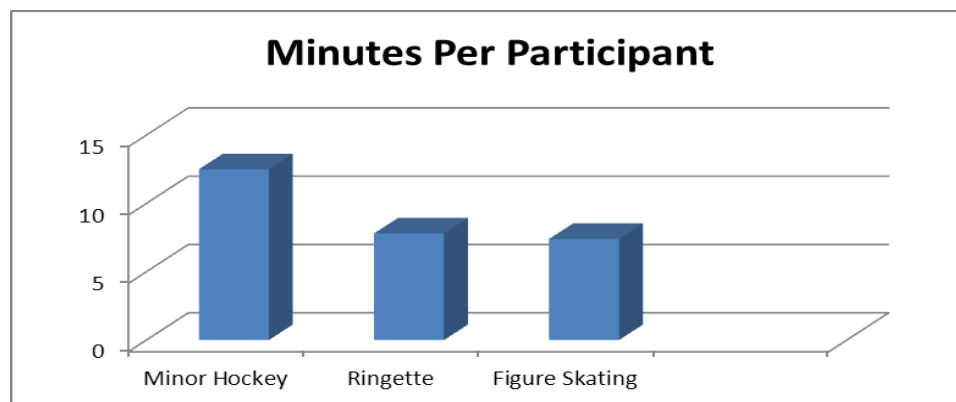
Metro Minor Lacrosse League	St. Margaret's Storm Club
East Coast Jr. Lacrosse League	Sackville Wolves Club
Senior Mens Lacrosse League	Bedford Rock Club
Masters Lacrosse League	Dartmouth Bandits Club
Mini Tyke Lacrosse	Eastern Shore Breakers
Halifax Northwest Rebels Club	Lacrosse NS Provincial Teams
Halifax Southwest Hurricanes Club	

There are other less structured non-ice users of arenas as well. These include Indoor Tennis, Ball Hockey, Roller Derby, and Ultimate Frisbee.

### Current Access to Ice

Current access for minor sport ice participants is noted below, per participant, at 3.5 minutes to 15.6 minutes per week during regular season. See Table 13. The Table is an overview of access from a per capita perspective. Participation numbers change slightly each year. Minor hockey, at an average of 12 minutes per participant, receives a higher percentage of access than ringette or figure skating – both at an average of 7 minutes per participant.

**Chart A: Minutes per Participant by Minor Sport Category**



### Trends

Data charts in the LTAS Background Report, Catherine Oliver 2001, pg. 10 (Appendix C) indicate that “Minor hockey trends over several years show TASA on a steady rise over 10 years, and Dartmouth reaching a peak in 2005/06, and steadily declining since then.

Overall, Minor Hockey has seen a decline of 2% in 2010/11 over 2009/10. Hockey Nova Scotia lowered the start age in 2011/12 to four years of age in order to allow for additional participation at the younger age group. It is interesting also to note that HRM Minor Hockey associations lag behind the rest of the province in terms of female participation. The provincial rate as a whole is currently 15.9% while for HRM it is 12%. With HRM removed, the provincial participation rate is 18%. Part of the reason for the

lower rate may be Ringette, which is very active and growing in HRM, and has increased from 717 participants in 2005/06 to 1009 in 2010/11 (a 41% increase)."

### Current Access to Ice

Ice usage data was collected from each minor sport association and included the numbers of registered participants, and the total numbers of hours rented overall by association. It did not include ages and skill levels of participants, and did not include tracking hours rented by parents or coaches outside of the ice allocations managed by each association. Each sport has different requirements for various skill levels. The amount of time on ice needed for more advanced hockey, ringette, speed or figure skating is greater than the amount of time on ice needed for beginners. This data does not differentiate between those differences and is a snap shot of the per capita allocation. The recommended Access Plan in this report, includes a detailed formula that does consider skill levels, ages and Long Term Athlete Development as components of the formula.

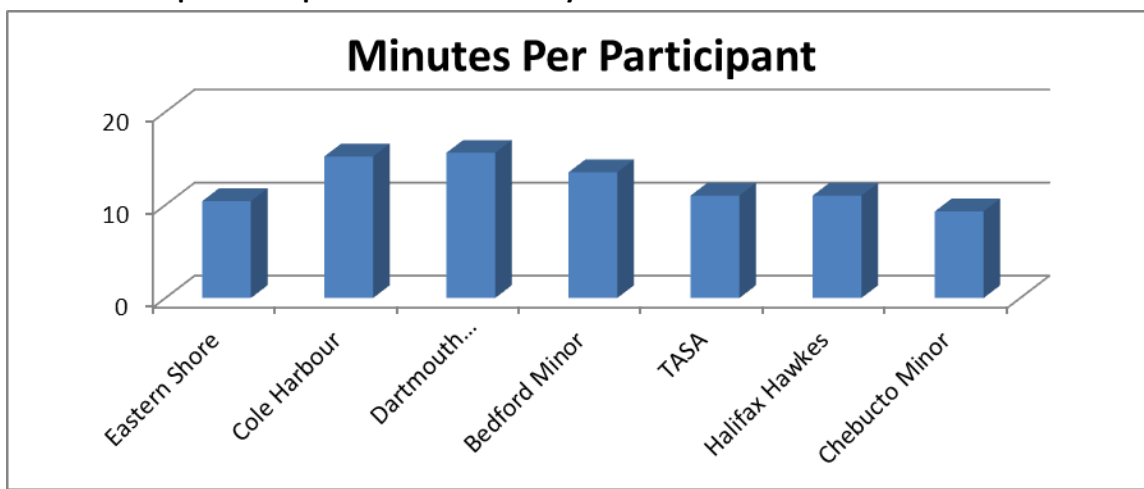
**Table 13: Access in minutes per Participant**

2011/2012	# of Participants	# of Ice Hours	Minutes Per Participant
<b>Eastern Shore Hockey</b>	357	37	10.4
<b>Cole Harbour Hockey</b>	697	106	15.2
<b>Dartmouth Whalers</b>	911	142	15.6
<b>Bedford Minor Hockey</b>	962	129	13.5
<b>TASA Minor Hockey</b>	995	109.5	11.0
<b>Halifax Hawkes Hockey</b>	979	108	11.0
<b>Chebucto Minor Hockey</b>	564	52.5	9.3
<b>Sackville Minor Hockey</b>	839	97	11.5
<b>Total</b>	<b>5,465</b>	<b>684</b>	<b>Average 12.0</b>
<b>Eastern Shore Ringette</b>	31	2	6.4
<b>Cole Harbour Ringette</b>	179	14	7.8
<b>Dartmouth Ringette</b>	124	12	9.6
<b>Sackville Ringette</b>	142	10	7.0
<b>Bedford Ringette</b>	183	15	8.1
<b>HSM Ringette</b>	159	14	8.8
<b>Chebucto Ringette</b>	162	11	6.7
<b>Total</b>	<b>980</b>	<b>78</b>	<b>Average 7.8</b>
<b>Shearwater Skate Club</b>	132	20	15.0
<b>Dartmouth Skate Club</b>	274	21	7.0
<b>Sackville Skate Club</b>	299	16.5	5.0
<b>Bedford Skate Club</b>	223	14.5	6.0
<b>St. Margaret's Skate Club</b>	280	18	6.0
<b>Halifax Skate Club</b>	191	9	5.0
<b>Dalhousie Skate Club</b>	17	6	3.5
<b>Total</b>	<b>1,416</b>	<b>105</b>	<b>Average 7.4</b>
<b>Speed Skating</b>	Unconfirmed		

Although there is a discrepancy in numbers of hours allocated to each minor sport category, it should be noted that in some cases, groups are unable to utilize extra hours when they are offered either because they are not needed, or because the hours offered are not preferred times.

The data above shows a discrepancy not only between minor sport associations, but also within each group as well. This is illustrated by the following Chart B regarding the current status of minutes per participant for each of the regions Minor Hockey Associations:

**Chart B: Minutes per Participant for Minor Hockey Associations**



### Adult Usage

Current adult recreational hockey usage of ice is complimentary to the usage by children and youth in minor sport, and should be supported and encouraged.

Based on the percentage of ice usage in regular season and non-traditional ice season usage at municipal facilities (Tables 8a to 10b), each facility appears to be meeting the needs of both minor sport and the adult recreational groups, at this time. The best and most cost effective scheduling principle for facilities is to encourage adult users to participate as close to the non-prime hours as possible in order to afford as much flexibility, access, usage as possible by youth. It is recommended that the ongoing management of this balance be overseen by the proposed Centralized Scheduling Process.

The aging demographic in the region and projected population increases indicate that there is opportunity for further support and development of adult recreational activities. This will provide healthy alternatives for aging adults, as well as utilize an important market group for better overall utilization of municipal assets.

Projected population data for the region (Catherine Oliver - Arena Capacity Update Jan. 2009) indicates that "the largest potential growth areas for the next fifteen to twenty years is Bedford, specifically Kearney Lake North, Bedford South and Bedford West. The nearby area of Clayton Park is also expected to grow significantly. Total projected increase in population in this area is in the order of 31,000 in

diversified mix use development. The next largest potential growth would be in Dartmouth at Russell Lake and Morris Lake with a total of approximately 12,000.”

**Table 14: HRM Projected Population 1996 – 2021**

	<b>Low Projection</b>	<b>Medium Projection</b>	<b>High Projection</b>	<b>Actual</b>
1996 (Base)	342,966	342,966	342,966	342,966
2001	353,886	356,452	358,256	359,183
2006	361,825	367,150	370,893	372,858
2011	367,266	375,497	381,297	
2016	370,934	382,170	380,106	
2021	373,035	387,371	397,483	

\* Source: Base Source Statistics Canada Census of Canada 1996, 2001, 2006

Projections: Calculated by Canada Mortgage and Housing Corporations Potential Housing Demand. Catherine Oliver – Arena Capacity Update Jan. 2009.

There are ongoing concerns, however, related to recreational public skating times at most facilities. Comments by Steering Committee Members indicate that this is an ongoing issue, and a review of facility schedules indicate that there is very little recreational public skating available in the region during prime time. It is recognized that there are a number of hours currently not being utilized at arenas. The Steering Committee sees this as an opportunity, and suggests the ongoing management of this opportunity should be carried out through the recommendation for Centralized Scheduling.

LTAS Background Report, Catherine Oliver 2001, indicates that “the additional interest in skating generated by the Emera Oval can be expected to create more demand for Learn to Skate programs in HRM, and that those programs will continue to grow.

**Table 15: Learn to Skate 2010/2011**

		<b>Registrations</b>	<b>Waitlist</b>
HRM Programs	Cole Harbour Place	895	157
	Halifax Forum	1,040	441
	Spryfield Arena	257	102
Skate Club Programs	Bedford	163	
	Dartmouth	168	
	Halifax	176	
	Sackville	302	
	Shearwater	60	
	St. Margaret's	240	
<b>Total</b>		<b>3301</b>	<b>700</b>

There is evidence to support facility provision for access by children and youth during the traditional season for each sport. There is less if any evidence available to support access for adults or for private sector skill development, or for “off traditional” ice seasons. However, market desire, and a heightened understanding of the value of physical activity for all ages, has established a pattern that currently includes these activities on a regular basis in all municipal arenas in all seasons. As demographics in the area continue to change, it will become increasingly important to support, promote and grow adult usage, as a balanced and strategic component of effective facility utilization.

## 2.4 Demographic Analysis and Population Forecasts by Minor Hockey District/School District

“Census population estimates do not provide data by minor hockey area or age group and so school enrolments provided the only available information about the current size of one of the key market groups for ice activities. Enrolment data from 2006 to 2010 was available on the Halifax Regional School Board website by school. An analysis of that data revealed that the total number of children in HRM Schools decreased by 3,191 or 5.8% between 2006 and 2010. It was not possible to relate the school data to Minor Hockey boundaries. The data collected from the HRSB website was organized into school families and is presented in Table 16.

Based on school families, the area with the greatest net decrease was the Cole Harbour High family of schools with 669 fewer children registered in 2010 as compared with 2006. The Charles P. Allen family of schools had the greatest net increase with 357 more children registered.

**Table 16: School Enrolments**

	2010	2006		% Change
CP Allen	5,206	4,849	357	7.4%
Sir John A MacDonald	3,988	3,933	55	1.4%
Lockview	3,764	3,754	10	0.3%
Halifax West	5,804	5,856	(52)	-0.9%
Citadel	5,029	5,142	(113)	-2.2%
Millwood	2,445	2,559	(114)	-4.5%
Prince Andrew	3,954	4,297	(343)	-8.0%
Dartmouth High	3,733	4,117	(384)	-9.3%
JL Ilsley	3,451	3,860	(409)	-10.6%
Eastern Shore	2,457	2,792	(335)	-12.0%
Musquodoboit Rural	667	765	(98)	-12.8%
Auburn Drive	3,675	4,221	(546)	-12.9%
Sackville	3,091	3,557	(466)	-13.1%
Cole Harbour	3,783	4,452	(669)	-15.0%
Duncan MacMillan	395	479	(84)	-17.5%
<b>Totals</b>	<b>51,442</b>	<b>54,633</b>	<b>(3,191)</b>	<b>-5.8%</b>

**Note:** School enrolments in the growth areas of Tantallon/Hammonds Plains/Bedford peaked in 2009 and recorded a modest decline of 55 students in 2010. This information supports the trends discussed in the 2009 C. Oliver Arena Capacity Update Report (Appendix B). In general, the Dartmouth/Cole Harbour/Eastern Shore areas are continuing a significant decline in terms of school age children while the Bedford/Tantallon areas have continued to increase. Halifax/Sackville are declining, but at a slower rate. Unless

significant immigration occurs, it can be expected that the number of children in HRM will continue to decline as the overall aging of the population continues.” CO March 11

Conclusions related to the demographic overview support the notion that there is sufficient existing inventory in the municipality to meet the current and projected needs of the facility youth users.

## **2.6 Current State of Arenas**

### **Where are we today?**

- 20 of the total 26 ice sheets in HRM are owned by the Municipality
- 11 of the 20 municipal ice sheets are 30+ years old - 7 of these are well over 40 years old
- 5 of the 26 ice sheets opened since 2009, one in 2009 in Bedford (The Rocky Lake Dome), and four in 2010 at the BMO Centre.

Recapitalization assessments have been carried out through Building Assessment studies at 12 of the 14 municipally owned facilities focused in this analysis. Two municipally owned ice sheets not included in the Building Assessment analysis are:

- Metro Centre – recapitalization planning for this facility is carried out annually through the Partner Operator, Trade Centre Limited
- BMO Centre – as the newest facility (opened Nov. 2010); there is a thorough recapitalization/ annual lifecycle upgrade fund in place generated by ice rental revenues at the facility. A building assessment was not carried out

Major recapitalization for the 14 municipally owned facilities (which house 20 sheets of ice), that are the focus of this analysis is projected to be just fewer than forty (40) million dollars, at \$2.0M - \$5.5M range per facility. The recapitalization requirements have been determined based on a need to increase the reliability or safety of each facility, not to enable any functional, operational, management, environmental, service delivery, or facility upgrades that would enhance the ability of the municipality to provide a more efficient or effective service to its citizens.

This report makes recommendations for the replacement, consolidation, and recapitalization of facilities in order to better meet the overall needs of citizens while operating a more efficient level of service provision. This report does not recommend additional inventory for the Region.

### **2.6.1 Recapitalization Summary**

Building Condition and Energy Assessments for the Arenas and Multi-District Facilities (except the Halifax Metro Centre & BMO Centre) was undertaken by Planning and Infrastructure – Facility Development over this past year. The successful Proponent was Capital Management Engineering Limited (CMEL) of Halifax and the resulting data has been utilized in order to inform the LTAS Project Report, and the development of the subsequent recommendations.

The objective of each assessment (Appendix A) was to provide HRM with: a description of the facility as a whole and for each building component on a component and elemental basis (site work, structure, roof, building exterior, building interior, electrical and mechanical); descriptive information including age, assessment of performance and remaining life; and prioritized recommendations for replacements and/or upgrades.

The assessment and audit estimated the scope, cost and scheduling of improvements for the facility to continue to be used in conformance to all applicable codes. The costs were prioritized as Short Term (1 to 5 years), Long Term (6 to 10 years) and Extended Term (11 to 25 years).

The scope of the Building Condition Assessments and Energy Audits included:

- Facility condition assessment in accordance with ASTM Standard E2018-08, including the review of existing drawings and report data, interviews with operations and maintenance personnel, site assessment, photography, analysis and reporting;
- Identification of deferred maintenance and deficiencies, and classification on a priority basis, consistent with the Capital Planning Guide produced by Efficiency NB, August 2009;
- Recommendations for repairs or upgrades, including modifications or improvements that may be required to meet municipal, provincial and federal building codes, and other upgrades that may be recommended to improve health, safety and operating efficiency;
- Cost estimates for repairs, upgrades and anticipated future repairs, laid out over a 25-year period;
- Technical report preparation, including narrative description of components, their assessment and recommendations, and presentation of deferred maintenance, priorities and projections in formats usable to the client;
- The evaluation of the building for code compliance and accessibility;
- In consultation with HRM's Fire & Emergency Services, the evaluation of all fire and life safety systems for code compliance; and
- The evaluation of potential energy efficiencies in accordance with the Capital Planning Guide's Energy Efficiency Capital Planning Tool (EECP-T)

The data forthcoming was extensive, and will be made available in detail to those who would like to peruse the full scope of the building assessment reports. It is currently not available electronically, but can be made available in hard copy. Executive Summaries for each facility is included in Appendix A of this report.

The assessments were carried out in 9 categories of lifecycle readiness, and have resulted in a sound understanding of the state of repair of the aging municipal arenas.

The nine categories of assessment (Table 18) include:

Category 1	Site Work - soft landscaping: non-structural fills, topsoil, sod, trees and shrubs & hard landscaping: structural fills, asphalt, concrete curbs, sidewalks, exterior lighting, signage
Category 2	Architecture, Exterior - elements of the building to enclose, protect from the elements including windows, walls, siding
Category 3	Roof
Category 4	Structure - foundations, load bearing walls, floor and framing systems
Category 5	Architecture, Interior - interior load bearing walls, ceilings, flooring, elevators, stairs, escalators, manufactured specialties & accessories
Category 6	Mechanical - systems related to heating, ventilation, air conditioning, plumbing, waste disposal, sprinkler
Category 7	Electrical - systems that receive power: lighting, security, data, cctv, wiring
Category 8	Life Safety - fire alarm panels, fire detection systems, emergency & exit lighting, emergency generators
Category 9	Specialty Systems - systems or equipment not directly building related, unique to the function/use of the building

**Table 17: Recapitalization Requirements by Category (rounded in thousands)**

Recap In Thousands	HFC	SMC	CHP	DSP	Spry	Eastern Shore	Dev.	SSS	LeBru n	Gray	Bowle s	Cent
<b>Total # of Ice surfaces</b>	2	2	2	1	1	1	1	1	1	1	1	1
<b>Category 1</b>	305	513	630	889	499	429	16	212	208	121	83	169
<b>Category 2</b>	1,647	120	564	182	633	437	431	92	191	315	180	149
<b>Category 3</b>	913	1,187	1,008	934	223	838	209	442	386	250	252	267
<b>Category 4</b>	0	0	0	0	0	0	503	0	0	0	0	0
<b>Category 5</b>	733	892	225	35	252	211	112	192	209	99	96	222
<b>Category 6</b>	447	317	133	132	136	120	72	126	209	48	62	52
<b>Category 7</b>	79	107	200	185	308	132	133	112	267	154	149	61
<b>Category 8</b>	94	115	166	132	32	20	23	122	119	34	89	25
<b>Category 9</b>	1,148	1,330	1,517	1,373	1,526	734	1,605	1,495	971	936	1,033	941
<b>Totals</b>	\$5,366	\$4,581	\$4,443	\$3,862	\$3,609	\$2,921	\$3,104	\$2,793	\$2,560	\$1,957	\$1,944	\$1,886

**Snap Shot Comments are:**

- Generally speaking all facilities require extensive recapitalization
- Average cost per facility for lifecycle recapitalization at this time is \$3.3M
- Aging Multi-District Facilities show recap costs for arena components only and require significant recapitalization work to their roofing systems
- With only 2 exceptions, Mechanical recapitalization is the most pressing issue for facilities



## High Risk Arena Facilities

**Halifax Forum Complex:** As an arena facility that is a registered historic venue, the Halifax Forum has seen 85+ years of participation in a number of sports, and is well established as an icon in Halifax for sport and community gathering. The facility is now identified as high risk as a result of recapitalization requirements in the refrigeration and mechanical systems, the brick shell is in need of significant repair, as well as a lack of general accessibility, i.e. Categories 2, 3, 5, 6, 9. Neither of the fields of play (ice surfaces) meets acceptable size standards. Both are under the recognized NHL size of 200' x 85'.

The cost of proposed recapitalization requirements of all these items combined is \$5.4M, and does not address facility shortfalls in terms of operational efficiencies, ease of access and field of play.

**Devonshire Arena:** Described as a “high risk to fail” for several years, this facility continues to be of concern for long term usage. The mechanical systems at this facility, including the refrigeration plant and brine pipe system are at risk of failure. The structural integrity of the facility is identified in the building assessment as a concern as well. However, additional limitations at the facility make it unpopular for most minor sport or adult usage, with the exceptions of recreational adult play, and some minor sport entry level play. This is a facility that would be difficult to improve within a recapitalization plan.

**Spryfield Lions Arena:** Although there has been a significant attempt over the past several years to recapitalize this facility, there continues to be many issues outstanding that place this in the “high risk” category. The recapitalization total for this facility is \$3.6M. Consideration was given to consolidation at the existing Captain William Spry Centre. Unfortunately there is not sufficient footprint at that site to easily accommodate the addition of an arena. The Steering Committee feels that this facility is an important part of the community fabric and strongly recommends that all avenues be explored to reconstruct this facility in the community – preferably as a component of the Captain William Spry Centre.

## Multi District Facilities

The Multi-District Facilities (MDF) are identified as important service delivery hubs in the region (CFMP 2008) and provide various sport, recreation, and community gathering multi-use alternatives for citizens. They are strategically located, along with the new Canada Games Centre facility, in central locations. These central locations provide citizens with access to one or more of this MDF facility type within a 20-30 minute maximum drive-time. (This drive time is recognized to be longer for rural residents.) Recapitalization of these facilities is strongly supported as a result of the long term fiscal and service delivery benefit to citizens.

**Table 18: Multi-District Facilities - Medium Risk**

Name	Arena Recapitalization Requirement
St. Margaret's Centre	\$4.6M
Cole Harbour Place	\$4.4M
Dartmouth Sportsplex	\$3.9M
Sackville Sports Stadium	\$2.8M
Eastern Shore Centre	\$2.9M

In summary, the Building Assessment/Audit process provided technical data to better understand the cost associated with maintaining the facilities at the current state of readiness. Those summarized details are included in Tables 17, 18, and 19.

## 2.6.2 Recapitalization Financial Impact by Year

**Table 19: Recapitalization Requirements by Year (rounded in thousands)**

Recap In Thousands	HFC	SMC	CHP	DSP	Spry	Eastern Shore	Dev.	SSS	LeBrun	Gray	Bowles	Cent	Total
<b>1-5 yr. total</b>	2,300	1,250	1,500	1,400	2,000	1,300	2,000	850	1,300	800	650	700	\$16M
<b>6-10 yr. total</b>	1,000	300	550	550	300	400	150	500	300	300	300	225	\$5.0M
<b>11-15 yr. total</b>	800	1,600	775	300	100	400	300	800	350	400	400	200	\$6.5M
<b>16-20 yr. total</b>	1,000	700	750	650	800	400	150	500	300	300	200	375	\$6.2M
<b>21-25 yr. total</b>	600	1,200	975	1,200	800	600	700	500	450	350	500	525	\$8.5M

## 2.7 Review of Canada Games Legacy Facilities

Considerable planning took place over a period of 18 - 24 months related to the Legacy opportunities and proposed long term benefits of the Canada Winter Games hosted by Halifax Regional Municipality in February of 2011. Funding was allocated to the development (expansion of an existing NHL arena) of an Olympic sized (200' x 100') arena at the St. Margaret's Centre. This arena would host the Short Track speed competitions for the Games, and would remain as a venue for further development of that emerging sport in our Region.

In addition, the overwhelming interest and participation at the Canada Games Long Track Oval on the Halifax Commons (temporarily constructed for the 2011 Winter Games event) resulted in a decision by Regional Council, following the Games, to construct a permanent Facility on that site. The facility has since been named the Emera Oval in recognition of a corporate sponsorship of the venue, and citizens continue to utilize the long-track field of play for recreational purposes at no charge, and competitive sport purposes within a fee structure. The operational costs of the facility are the ongoing responsibility of the Municipality.

### 2.7.1 St. Margaret's Centre Olympic Ice

Over \$1M was invested in the expansion of the Smith Arena at the St. Margaret's Centre in order to host the 2011 Canada Winter Games Short Track Speed Skate events. This enhanced facility and games destination was envisioned as a significant legacy benefit in order to encourage and grow more interest and more athletes in this sport.

However, only 7.5 hours of ice time was allocated this past year for the short track club to utilize at the facility. This was available at full market cost to the group, and consistent with the challenges of emerging and new sports, the club experienced great difficulty in meeting its financial responsibilities. Final validation is required, but it appears as if the outcomes did not meet the expectations. In order to support and encourage new and emerging activities, there may in many cases be a requirement for financial support, in addition to available facilities.

### 2.7.2 Emera Oval

Community Recreation Services staff responsible for the Emera Oval operations, indicate that the estimated participation total for 2010/11 was approximately 100,000 skaters, and that for the 2011/12 season, there were approximately 130,000 skaters. These numbers were estimated by staffs that were designated as "on-site event counters".

Based on the above number of participants, staff has stated for the record, "It was an extremely successful season for the Oval! We surpassed expectations. We had hoped to achieve the previous year of 100,000 and we went well above and beyond. There was great feedback from all users of the oval."

Net Operational cost to the Municipality:	2010/2011	\$718,924
	2011/2012	\$573,281

A suggestion by the Steering Committee is the addition of a refrigerated arena for recreational sport, inside the unused portion of the existing Emera Oval. This is a great location, and is a successful gathering spot for recreational public skating. The addition of a refrigerated arena on the site would provide a recreational sport perspective that would complement the existing infrastructure already on the site.

### 2.7.3 Consideration for Additional Outdoor Community Refrigerated Ice

Prior to the decision to retain the Emera Oval on the Halifax Commons, the LTAS Steering Committee was asked by Regional Council to consider legacy options for the 6 "refrigeration chillers" utilized to make temporary refrigerated ice for the Canada Games event on the Commons. The thought was that they would be redeployed in some form of community configuration(s) elsewhere.

The Committee participated in discussion regarding potential criteria and locations for sites, and indicated a preference for a location. Subsequent to this discussion, the decision was made to retain the long-track permanently on the Commons.

The Steering Committee recommends that a long term investment be made into refrigerated ice opportunities for other areas in the Municipality in order to enhance citizen participation, and reduce some barriers such as transportation for some citizens. This investment would include both capital and operating funds in order to develop small refrigerated ice surfaces throughout the municipality – and annually, a decision would be made through a grant/lottery, to situate a facility in a local community. This program would require more refinement in order to proceed, but supports the guiding principle of the Steering Committee to enhance participation by citizens through accessible facilities. This is an additional way to further accommodate public recreational skating.

There was no evidence found to indicate that outdoor refrigerated ice would impact on the need for indoor arena inventory.

## **SECTION 3: RECOMMENDATIONS**

The Steering Committee has attempted with the assistance of staff, to develop “evidence based recommendations” for consideration by Regional Council. The Steering Committee appreciates the sensitive nature of facility discussions, and attempts to proceed with a logical and practical approach to the future.

### **3.1 Facility Development Standards**

In an effort to ensure that citizens have a positive experience regardless of where the facility is located or how old the facility is, several key aspects of upgrades should be considered. In facility planning to date in HRM, users have indicated that their primary need is to have access to facilities at a reasonable fee. Users are less concerned about the support amenities in their facilities in almost all cases. However, citizens generally indicate in every conversation that they expect to have certain comforts considered when planning for new facilities takes place. In many cases, citizens develop a sense of pride for their facilities that is tied deeply to their loyalty and pride for their communities overall.

It is for this reason that the Municipality should continue to consider the guiding principles for facility development developed in both the IRFMP and the CFMP as outlined in Section 2.1 of this report. Considerations for positive locational and architectural applications are often possible without significant increases to the cost of construction of a new facility.

Following are recommended “functional considerations” for inclusion in new arena facility development:

Multi-Use Arena Facilities should be designed with capacity to be multi-use and cross functional in order to maximize revenue generation and create an accessible and usable space for year-round citizen benefit in sport, recreation and leisure pursuits.

1. Complex/hub concept - Stand-alone facilities are not as cost effective to build or to operate, and are not recommended. Whenever possible, facilities should be built as part of a larger complex or central hub of like facilities. (synergy, excitement)
2. Site selection must be considered to ensure they are “non-competing” with existing municipal facilities
3. Multi-purpose room for small tournaments
4. Minimal seating (150-400)
5. Dressing rooms should be a minimum of 14' x 23' square feet (BMO Centre)
6. Dressing rooms should accommodate gender usages
7. Showers in dressing rooms – adjustable heat for water
8. Goose neck faucets in dressing rooms and public washrooms for water bottles
9. Dry land warm-up space (pre-game) – can be multi-use with small room for tournaments
10. Facility development should be based on best practices guidelines and legislation to support persons with disabilities
11. Energy efficiency in building envelope (LEED Silver is corporate objective)

### 3.2 Policy Development Recommendations

The overall goal in policy recommendations is enhanced participation of citizens in existing inventory through heightened utilization – get as many people to participate as possible. Following are Steering Committee recommendations developed in order to support the principle of enhanced participation:

1. **Centralized Scheduling:** The Steering Committee recommends that, in order to create a fairer, more equitable, and efficient use of municipal assets, there be a centralized scheduling procedure developed and implemented immediately. The centralized scheduling will be carried out in cooperation with existing facility schedulers and management groups, and will enhance the existing process.

It will be necessary to allocate staff and other resources to this task and so it is recommended that staff return to Regional Council with a proposed process and procedure in Fall of 2012 in order to allow for implementation in time for the Fall 2013 regular ice season. This timeline recognizes that requests for the Fall 2013 regular ice season will be forthcoming in May and June of 2013.

The implementation of this policy will allow for a strategic approach to utilization of ice, and will ensure that minor sport and adult sport groups, along with recreational citizen usage of ice will be treated consistently and appropriately from a facility usage perspective. Data presented in Tables 8, 9 and 10 illustrate complexities in the current system of multiple scheduling groups, and presents opportunities for a more effective and strategic approach to the utilization of the arenas. Centralized Scheduling will provide a single portal for user groups to access ice, and will allow, through a web-based approach, for efficient and fair access to available ice by user groups and citizens.

Aspects of a centralized process include:

- Web based system
- Consolidation of requests and scheduling of facilities for tournaments, off-prime usage, and “turned in” weekly hours
- One-stop requests to central office rather than requirement to make individual requests to several facilities and several management groups
- Faster more consistent response time to users
- Combined usage of staff resources and online resources for maximum efficiency
- The ability for all scheduling will be completed annually as per the “Access Policy” described in the BMO Centre document, reference recommendation 3.2
- Reduction of multi-policies and procedures currently present as a result of 10 management groups individually scheduling 14 municipal facilities. See Table 1.

This policy will require a heightened level of communication and cooperation between the municipality and its partner management groups, and will result in a more efficient provision of service to citizens.

2. **Access Policy:** Immediate implementation of the Community Access Plan throughout all arenas is recommended. The policy and procedure jointly developed in 2010 by Nustadia Recreation Incorporated and HRM Staff is a comprehensive document that takes into consideration Guiding Statements, Strategic Objectives, and Implementation Policies and Strategies.

Data and trends discussed in this document do not lead the Steering Committee to anticipate any immediate “material” changes to user groups, but will ensure that future access for ice time is supported by participation numbers, skill levels, and program goals. It will eventually assist in the increase of ice time for groups who currently receive a lower ratio of ice time to participant, and will guard against groups acquiring additional ice before those groups in greater need are offered available ice. This is true as well regarding gender specific sports such as ringette, figure skating, and women’s hockey. It is also recognized that there may be factors in addition to the inability to acquire ice times, which limit the ability for groups to grow. These factors, such as price of ice, coaching, and field of play, should also be considered by groups in their ongoing consideration for growth.

The specifics of the Community Access Plan discuss:

Guiding Statements	Strategic Objectives
<ul style="list-style-type: none"> <li>• Vision Statement</li> <li>• Mission Statement</li> <li>• Value Statement</li> </ul>	<ul style="list-style-type: none"> <li>• Fairness &amp; Equity</li> <li>• Inclusivity</li> <li>• Financial Sustainability</li> <li>• Environmental Sustainability</li> <li>• Code of Behaviour</li> <li>• User Satisfaction</li> <li>• Transparency</li> </ul>

As well as:

Management Policies	Operational Policies	Programming Policies
<ul style="list-style-type: none"> <li>• Gender Equality Policy</li> <li>• Accessibility Policy</li> <li>• Discrimination and Harassment Policy</li> <li>• Conduct &amp; Disciplinary Procedures Policy</li> <li>• Financial Objectives</li> </ul>	<ul style="list-style-type: none"> <li>• Operational Best Practices</li> <li>• Risk Management Best Practices</li> <li>• Fairness &amp; Equity</li> <li>• Inclusivity</li> <li>• Financial Sustainability</li> <li>• Environmental Sustainability</li> <li>• Code of Behaviour</li> <li>• User Satisfaction</li> <li>• Transparency</li> </ul>	<ul style="list-style-type: none"> <li>• Ice and Other Program Allocation Policy</li> <li>• Market Competition Policy</li> <li>• Special Programs</li> <li>• Regional and National Events Policy</li> </ul>

The Steering Committee recommends that this policy be transitioned into the municipal facilities beginning in the Fall of 2012, in order to be prepared for full implementation for the ice season requests for the Summer Season 2013.

3. **Strategic Management:** As an additional benefit to the Municipality, the implementation of the centralized scheduling policy will result in the overall synchronization of operations, policies, systems in municipal arenas that will in turn enhance citizen access and usage.
4. **Proposed Recapitalizations and Consolidation of Facilities:** It is recommended that recapitalization and consolidation projects be overseen directly by HRM Planning and Infrastructure – Facility Development Staff. This will ensure that the allocation of municipal funds will be carried out through a strategic approach to upgrades, lifecycle planning, and consistency of oversight necessary for a more accountable and broad scope approach to facility development and management.
5. **Cost Recovery:** The Steering Committee goal is to create recommendations in order to increase utilization of the arenas. Pricing is a key component of utilization. Centralized scheduling is expected to provide a better utilization rate of facilities, and as such, should also have a positive effect on cost recovery of arenas. As centralized scheduling is able to affect the market and utilization rates at facilities, it is anticipated that pricing could better reflect the overall needs of citizens and ultimately respond to the market accordingly. It is recommended at this time, that pricing be maintained at a status quo, rather than increasing cost of ice rentals as a result of incorporation of new consolidated facilities. The intent is to save on overall operational costs by utilizing economies of scale that are not currently available as a result of the current scheduling and management structure, and that there be a long term strategic alignment of operations overall.

Service provision of recreation and sport venues is not a business, and should be approached with a more accessible overall approach, rather than an environment of competition between facilities.

6. **Pricing Strategy:** Citizens will benefit from a consistent approach to ice rental costs - a harmonized approach would be beneficial to users, and would allow for a more consistent and equitable outcome for users. Currently, pricing is different for each facility, especially for adult users, and creates a highly competitive environment that is difficult to utilize and unreasonable for many users to understand. It is recommended that a harmonized approach be considered within the context of a

centralized scheduling model, and brought back to Regional Council for consideration after the initial implementation of the centralized scheduling model.

### 3.3 Capital Development Recommendations

In an effort to ensure that this long term strategy represents the most logical opportunities for citizen, fiscal success and guiding principles of facility development, the principles of consolidation and recapitalization have been utilized to the highest degree possible.

1. **Recapitalization:** It is recommended that the following Multi-District Facilities receive recapitalization funding for the components as identified in the Building Assessment audits. They are important recreation and sport service delivery hubs in our region, and are necessary to the overall successful provision of ice services. They are:

Name of Facility	Building Assessment Total Funds Required
St. Margaret's Centre	\$4,581,000
Cole Harbour Place	\$4,434,000
Dartmouth Sportsplex	\$3,862,000
Eastern Shore Centre	\$2,793,000
Sackville Sports Stadium	\$2,921,000
<b>Total</b>	<b>\$18,591,000</b>

The other arenas, as ice only facilities, present opportunities for the refinement of an effective overall system for the provision of arena inventory long term, for the region as a whole.

2. **Consolidation of Facilities:** The consolidation and rebuilding of the aging "ice only" arenas allows for a more effective geographic distribution of ice, while at the same time aligns the facilities into a cost effective operational model, creating spaces for future that better meet the needs of sport user groups and citizens.

Rather than continued investment of significant funds into aging facilities that will not improve the overall performance of the facilities, these recommendations will allow for the investment of municipal funds to be effective in both the development of the facilities, and the development of an overall service delivery model that positions the municipality for effective and strategic service provision through location, type, size, and operational model. It reduces the number of buildings in the system from 14 to 10, allowing for better citizen service, and better owner asset management.

Arena Inventory is proposed as follows:

1. Existing 4 pad – BMO Centre
2. Proposed Multi pad (3 or 4 pads)- Peninsula Halifax
3. Proposed Multi pad (3 or 4 pads) – Dartmouth



Recapitalization of the following Multi District Facilities, Arenas and Halifax Metro Centre:

4. St. Margaret's Centre
5. Cole Harbour Place
6. Dartmouth Sportsplex
7. Eastern Shore Centre
8. Sackville Sports Stadium
9. Spryfield Arena
10. Centennial Arena

This consolidation recommendation is based on the principle that concurrent with the new consolidated facility opening, the retirement of existing facilities takes place as follows:

Peninsula Consolidation	•Multi Pad Arena - replacing: Forum, Civic, Devonshire and including a possible Partnership
Dartmouth Consolidation	•Multi Pad Arena - replacing Bowles, Gray, LeBrun and including a possible Partnership
Respectful Sport Re-Use	•Spryfield Arena, Bowles Arena •Bedford LeBrun Arena, Gray Arena •Centennial Arena

It is recommended that the Peninsula Consolidation take place as soon as possible. The High Risk Facilities as listed in Section 2.6.1 of this report are all in the greater Peninsula area. That, coupled with the recent (possibly permanent) closure of the Dalhousie Arena and the ongoing desire of Saint Mary's University to rebuild their facility at some time in the near future, creates the perfect storm for significant service interruption on and around the Peninsula.

Opportunities for facility partnership related to the Peninsula Consolidation should be pursued at this time. A proactive approach at this time is recommended in order to meet the current and future needs of user groups of those facilities.

It is key to consider the development of the consolidated Forum site in order to ensure there is no or limited service interruption for arena users on the Peninsula. This is important in order to maintain the current service level of arena users to meet their program needs. If this is not possible, the Dartmouth Consolidation should proceed first.

The proposed Dartmouth Consolidation is equally significant to the overall long term service delivery of ice in the Region. The facilities related to the Dartmouth Consolidation are not categorized in this report as a high risk to fail at this time, and as such, fall after the requirements of the Peninsula arena facilities. Operating costs and scheduling of these arenas may improve as a result of a Centralized approach, but

overall efficiencies and age related issues will not. It is recommended that Life Safety recapitalization continue at these facilities until the Dartmouth Consolidation is approved by Regional Council.

While it is recognized that consolidation and retirement of aging facilities can be a difficult and often emotional task for municipalities, it is important to identify the long term benefits to citizens in terms capital investment and operational efficiencies for future. In addition, it is recognized that in cases where facilities have been managed on behalf of the municipality by volunteer boards, it is as a result of the commitment of these Boards to their Communities, that the facilities have performed so well for so long.

### **3.4 Financial Strategy Recommendation**

#### **A) Recapitalization and Consolidation Recommendations:**

Historically, capacity has existed in the approved capital budget to implement the recapitalization recommendations above, related to the 5 Multi-District Facilities (MDF) listed. If additional capacity is required it will be proposed to Regional Council in an upcoming report regarding the MDF Facilities.

It is recommended that development of the funding strategy for the Consolidation Recommendations on the Peninsula and in Dartmouth, include discussions for support with the Province and Federal Government, along with discussions with potential partners in order to create a funding formula for Council approval. If partnership funding is not forthcoming, it is recommended that Regional Council proceed regardless, in order to achieve the opportunities inherent with the recommendations.

### **3.5 Implementation Recommendations and Timelines (Overview)**

#### **A) Facility Standards Recommendations**

This report recommends that Facility Standards as outlined in 3.1 are included in the development of recapitalized and consolidated facilities, and that when projects of this nature are carried out; the planning is done within the overall context of the CFMP, user group and citizen consultation, and Regional Planning considerations.

#### **B) Policy Development Recommendations**

This report recommends that Policy recommendations as outlined in 3.2 are implemented as soon as possible, and that both the Community Access Plan and the Centralized Scheduling Policy are incorporated into the operational structures of ice service provision no later than Fall 2013.

#### **C) Recapitalization and Consolidation Recommendations:**

Recapitalization of the Multi-District Facilities and consolidation of aging ice arenas is recommended.

This report recommends the following approach:

1. **Recapitalization Phase:** It is recommended that annual upgrades for the 5 listed Multi-District Facilities commence immediately in Fiscal 2012/13. This is recommended to take the form of a rotation annually of 1 or more facility per year, for a 12 to 15 year period as outlined in the Building Assessment model. This rotation should continue until all category components identified have received upgrades.
2. **Consolidation Phase:** It is recommended that the Peninsula Consolidation commence immediately, and that staff return to Regional Council in Fall 2012 with a preliminary design and funding plan for consideration. It is further recommended that a public consultation process be included in the project design in order to specifically address concerns, sensitivities, and opportunities relative to the Forum building. The Forum Building is registered with Historic status, and requires specific consideration as a result. As discussed in this report, the Peninsula consolidation must proceed without service disruption to user groups. If this is not possible, the Dartmouth Consolidation should proceed as a first step.

Concurrent with the opening of the Peninsula Consolidated Facility is the immediate closure of the Halifax Forum and Civic Arenas and the Devonshire Arena. These closures are critical to the success of the consolidation.

3. It is recommended that the Dartmouth Consolidation commence immediately following the Peninsula Consolidation, and that, like the Peninsula project, staff return to Regional Council with the full project outline at that time. The Steering Committee recommends that this facility be constructed in a centrally located site such as Dartmouth Crossing or Shannon Park.

Concurrent with the opening of the Dartmouth Consolidated Facility is the immediate closure of the Bowles Arena, Gray Arena and the Bedford LeBrun Arena. These closures are critical to the success of the consolidation.

4. Further investigation is required regarding the redevelopment of the Spryfield Arena. The Steering Committee feels strongly that continued attempts at recapitalization of the existing facility are not the preferred course of action, and that consolidation with the existing Captain William Spry Centre is preferred. Preliminary results of site analysis at Captain William Spry indicate that the site will not easily accommodate an arena. Staff should return to Regional Council within the next fiscal period with a detailed recommendation regarding the redevelopment and siting of this facility.

Concurrent with the opening of a redeveloped Spryfield Arena is the closure of the existing Spryfield Arena.

5. **Centennial Arena:** The Centennial Arena, should be re-evaluated for consolidation after the Dartmouth consolidation is complete. The recapitalization requirements should be evaluated

annually along with facility usage requirements that may change as a result of the recommended implementation of a strategic approach to scheduling – in particular as it relates to Spring, Summer and September usage.

6. Eastern Shore Centre: This facility has been defined as a Multi District Facility (MDF) in recognition of the service delivery role it plays in the geographic community. Although it requires approximately \$3M in recapitalization, this work should be carried out in order to ensure that the facility continues to meet the ice sport and recreational needs in the area. In keeping with the development principles of consolidation and economies of scale, additional review should take place to determine opportunities for future consolidation of other municipal service provision in the community, to this site.

#### **D) Outdoor Rinks Recommendations**

As outlined in 2.7.3, the Steering Committee proposes that a long term investment be made into refrigerated ice opportunities for other areas in the Municipality, in order to enhance participation, and reduce some barriers such as transportation for some citizens.

This investment would include both capital and operating funds in order to develop small refrigerated ice surfaces throughout the municipality – and that, annually, a decision be made through a grant/lottery to situate a facility in a local community. It is suggested that this recommendation be reviewed within the context of capital planning for consideration after 5 years of successful Emera Oval operation.

#### **E) Financial Strategy and Implementation Recommendations**

##### **Summary of Recommendations:**

Short Term 2012 - 2015	Medium Term 2016 - 2020	Long Term 2020 - 2025
<ul style="list-style-type: none"> <li>•Centralized Scheduling</li> <li>•Access Policy</li> <li>•Peninsula Consolidation</li> <li>•MDF Phase 1 Recapitalizations</li> <li>•Annual lifecycle investments</li> </ul>	<ul style="list-style-type: none"> <li>•Dartmouth Consolidation</li> <li>•MDF Phase 2 Recapitalizations</li> <li>•Annual lifecycle investments</li> </ul>	<ul style="list-style-type: none"> <li>•MDF Phase 3 Recapitalizations</li> <li>•Annual lifecycle investments</li> </ul>

## SECTION 4: IMPLEMENTATION

Table 20 is an estimate of maintaining a “state of good repair” for the arena portions of the Multi-District Facilities noted. These amounts do not include soft costs or contingencies, which would be an additional 25% of the total estimate. The 25 year recapitalization plan for the full Multi-District Facility list will be completed and presented to Regional Council in 2012. Historically, HRM has funded the Major Facilities Capital Budget an average of \$2.44M per year since 2006. The 2012/13 Capital Budget for these facilities has increased to \$3.2M.

**Table 20: Recapitalization Implementation \*\***

	SMC	DSP	CHP	Eastern Shore	SSS	Annual Total
2012-2013	1,300,000					1,300,000
2013-2014		2,000,000				2,000,000
2014-2015			1,800,000			1,800,000
2015-2016				1,500,000		1,500,000
2016-2017					1,100,000	1,100,000
2017-2018	1,600,000					1,600,000
2018-2019		900,000		600,000		1,500,000
2019-2020			1,300,000			1,300,000
2020-2021					1,300,000	1,300,000
2021-2022	1,100,000					1,100,000
2022-2023		900,000				900,000
2023-2024			625,000		500,000	1,125,000
2024-2025				900,000		900,000
<b>Total</b>	<b>4,000,000</b>	<b>3,800,000</b>	<b>3,725,000</b>	<b>3,000,000</b>	<b>2,800,000</b>	<b>17,325,000</b>

**\*\* Note:** Development of a plan for the full recapitalization requirements and planning related to the Multi-District Facilities is a Planning and Infrastructure deliverable for the 2012/13 fiscal year.

Minimal life-safety recapitalization will take place in the following facilities in order to maintain operations pending the development of the proposed consolidated facilities on Peninsula Halifax, and in Dartmouth:

Halifax Forum Arena	Spryfield Arena
Devonshire Arena	Bowles Arena
Civic Arena	Gray Arena
Bedford LeBrun Arena	Centennial Arena

It is anticipated that the consolidation of these facilities will allow for the re-use of some, for other sport purposes such as Lacrosse, and some for market value sale of property. Staff will return to Regional Council with recommendations related to these opportunities outlining the benefits and challenges, including any budget implications.

Also noted in Section 2.6.1, it is important to recognize that the Halifax Forum has been a registered historic property since 2003, and there is due process to follow related to redevelopment on that site. There is clearly heritage value that resides partly in the original building, its design and materials, but also

in its associations. The strongest historical association is with the architect Andrew Cobb who was a talented and renowned local architect trained in the Beaux Arts style. The other important historical associations are to those sport and community events held at the Forum including hockey, boxing, wrestling, curling, circuses, rallies, skating competitions, and music concerts.

If the Forum is unable to be retained in its entirety, then those portions of the building which speak most strongly to those embodied heritage values would be identified through consultation with the community, and incorporated into the redesign of a new building.

The Centennial Arena, should be re-evaluated for consolidation after the Dartmouth consolidation is complete. The recapitalization requirements, although significant, should be evaluated annually along with facility usage requirements that may change as a result of the recommended implementation of a strategic approach to scheduling – in particular as it relates to Spring, Summer, and September usage.

The following arena consolidation timeline is outside of the current anticipated capital budget, and will require consideration and Council Approval regarding development of the funding formula.

**The consolidation of 6 existing aging facilities (Devonshire, Forum, Civic, LeBrun, Bowles, Gray) into 2 new multi-pad facilities is anticipated to reduce operating, maintenance and recapitalization costs to the Municipality in excess of \$2M per year. Furthermore, annual lifecycle reserves will be developed at each of the two facilities, and funded through operating revenues of each facility. (Indicative operating costs Section 2.2.3)**

#### Proposed Consolidation Implementation:

##### Consolidation Phase 1

Peninsula Consolidation				
Fall 2012	January 2013	August 2013	September 2013	September 2014
Design, funding formula and consultation program report to Regional Council	Issue RFP to proceed with Design Build Project	Council awards Design Build Contract	Construction commences on site	Open consolidated facility
Estimated Cost				\$45M

##### Consolidation Phase 2

Dartmouth Consolidation				
Fall 2015	January 2016	August 2016	September 2016	September 2017
Design, funding formula and consultation program report to Regional Council	Issue RFP to proceed with Design Build Project	Council awards Design Build Contract	Construction commences on site	Open consolidated facility
Estimated Cost				\$40M + land

Retired facilities, after serving citizens for many years, will be respectfully evaluated for best re-use opportunities upon the opening of consolidated multi-pad arenas in each area. They will no longer be utilized for ice sport or recreational skating.

## **SECTION 5: SUMMARY**

The Steering Committee has taken a look to the future.

The Long Term Arena Strategy has been developed as an evidence based document. The data utilized in the development of the recommendations was prepared for this report over the past 18 - 24 months.

In all cases, recommendations were considered by the Steering Committee to add value where there was evidence of inherent efficiencies to the provision of services to citizens. Four significant components of consideration were:

- a) The examination of operational information and the desire to provide a more cost and operationally effective structure for the municipality;
- b) The examination of building audit components including cost of recapitalization;
- c) Building functionality and ability to meet the overall needs of the user groups at each specific arena; and
- d) Participation numbers, rental statistics, patterns and trends in the municipal ice inventory.

Arena users and citizens will experience a higher level of service delivery through Centralized Scheduling, and a region-wide Access Plan to ensure a fair and equitable distribution of ice time to all user groups. This will ensure that underserved groups will have a fair process to work within for access to ice times. This strategic approach will provide operational savings to the municipality, and a better utilization of public assets.

In an environment where over 58% of the ice surfaces in the region are over 30 years old, and 57% of the municipally owned facilities are over 30 years old, there was consideration given to the value to the consolidation and building of new facilities as purpose built and located, versus the value of continued investment in existing aging facilities. Opportunity existed within the LTAS planning to evaluate the benefits of replacement of aging facilities, to provide a higher level of efficiency and operational effectiveness by consolidation and retirement of some existing arenas.

As outlined in the Arena Operations Assessment Report of December 30, 2011, “the operating results for the BMO Centre as compared with those of the 4 HRM single pad facilities amply demonstrate the economies inherent in multi-pad facilities as compared with single pad arenas.” This aligns with the facility development principles outlined in the CFMP and supports the notion of multi-pad and multi-use facilities as efficient hub service delivery mechanisms. The resulting recommendations related to consolidation of facilities take the operational effectiveness of multi-pads into consideration.

Concern related to the “state of readiness” of the aging facilities and the cost to recapitalize these basic requirements has led the Steering Committee to a proactive approach for future provision.

This study determined that there is not a need to add additional inventory – no additional ice surfaces are recommended as part of this review.

In closing, the Steering Committee supports a strong approach to the implementation of these recommendations and remains committed to the outcomes. As members of key stakeholder groups and dedicated citizens, they have received the full support of their respective organizations and are eager to support Regional Council in the provision of a renewed and revitalized approach to service delivery through the Long Term Arena Strategy.



## APPENDICES

APPENDIX A:	Building Assessment Summaries Arenas
APPENDIX B:	2001 Arena Capacity Study - Update 01/29/09, Catherine Oliver
APPENDIX C:	Long Term Arena Strategy Background Report 03/31/11, Catherine Oliver
APPENDIX D1:	Arena Operations Assessment Nov 2010-Oct 2011 12/30/11, Catherine Oliver
D2:	BMO Financial Package for Period Ending March 31, 2012
APPENDIX E:	Community Facility Master Plan 06/30/08 <a href="http://www.halifax.ca/facilities/CFMP/documents/CFMPFINALMay08.pdf">www.halifax.ca/facilities/CFMP/documents/CFMPFINALMay08.pdf</a>
APPENDIX F:	LTAS Steering Committee Terms of Reference <a href="http://www.halifax.ca/facilities/CFMP/documents/LTASSteeringCommitteeTermsofReference.pdf">www.halifax.ca/facilities/CFMP/documents/LTASSteeringCommitteeTermsofReference.pdf</a>
APPENDIX G:	Community Access Plan <a href="http://www.halifax.ca/facilities/CFMP/documents/CommunityAccessPlan.pdf">www.halifax.ca/facilities/CFMP/documents/CommunityAccessPlan.pdf</a>

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## APPENDIX A

Building Assessment Summaries Arenas

HRM Arenas  
Briefing Notes



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## Halifax Forum and Civic Centre

2901 Windsor Street  
Halifax

**Year of Construction:** 1927 / 1988-2003  
**Number of Ice Sheets:** 2  
**Deferred Recapitalization:** \$1,660,000  
**Facility Condition Index:** 8.49%

**Date of Site Assessment:** 12/13/2011

### Property Description

The property development consists of four buildings; two arenas (Halifax forum and Civic Center), a multipurpose centre (MPC) and a bingo hall (Bingo/Maritime Hall). The Halifax Forum was constructed in 1927, which has a concrete and steel superstructure, a sloped timber roof deck with recently installed modified bitumen roof covering. The building is clad with brick. It is assumed that the Forum is founded on standard concrete footings and frost wall foundation. The Forum is identified as a Heritage site. The Civic center is a pre-engineered steel structure built in 1995 that is assumed to be founded on standard concrete footings and concrete foundation walls. The building has a sloped metal roof covering, vertical metal siding and clay brick siding. The MPC is a pre-engineered steel structure built in 1988 that is also assumed to be founded on standard concrete footings and concrete foundation walls. The building consists of a sloped metal roof, vertical metal siding, overhead doors and painted metal stairs for exiting the building from secondary doors. The Bingo/Maritime Hall was constructed in 2003, which has a steel structure, assumed to be founded on standard concrete footings and frost wall. It has a sloped metal roof, vertical and horizontal metal siding, HardiePlank siding and overhead doors. The total building area of the four buildings is approximately 123,000 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in fair overall condition with a deteriorated exterior envelope associated with the original structure. Similarly, the brine distribution piping was also distressed and in need of repair. The remainder of the buildings and their components were generally in fair to good condition and well maintained. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. A number of the building components will require replacement during the evaluation period that include but is not limited to the roof, exterior cladding and doors, dasher boards, mechanical and ventilation systems, electrical switchgear and lighting, fire alarm panel and cyclical replacement of the ice resurfacers.

## Major Component Replacement

### Category 1 – Site Work

#### 25 Year Recap

**\$305,000**

- At the time of the site visit the asphalt parking areas appeared to be in fair to good condition with minor areas of localized settlement and alligator/longitudinal cracking noted. Evidence of past localized repairs was also observed. Asphalt paving typically has an expected useful life of fifteen years depending on the frequency of use, maintenance and quality of the original installation. Replacement and repairs are expected
- Landscaped areas appear to be in good condition and are not expected to require capital expenditure.
- The concrete flatwork were observed to be in generally good condition

### Category 2 – Architectural Exterior

#### 25 Year Recap

**\$1,647,000**

- The exterior cladding on the Halifax Forum consists of clay brick that is original to the building and is very poor condition. Although the brick cladding has had repairs and renovation in the past, the brick work, if it is expected to be retained, will need extensive renovation and restoration
- The exterior cladding for the Civic Center consists of prefinished vertical metal panels with portions of the front and south elevations which are clad with a brick veneer. It is assumed that the cladding was installed with the construction of the building in 1995. Localized repointing of the brick and replacement of the metal siding is expected to be required to be required

### Category 3 – Roof

#### 25 Year Recap

**\$913,000**

- Roofing on the Civic Center (MPC and Bingo/Maritime Hall) consists of a pre-finished standing seam metal roof that is supported by the building superstructure. Drainage is generally to gutter and downspouts or shed directly to the ground from the sloped roof. It is expected that a portion of the metal roof membranes will require repairs and or replacement during the evaluation period
- Roofing for the Halifax Forum portion consisted of a modified bitumen roof covering. The membrane is supported by a wood roof deck and in turn the steel superstructure. Drainage for the roof is provided by sheeting action to eaves troughs and downspouts. The membrane was in good condition with no reported leaks. Cyclical end of life replacement is expected to be required during the evaluation period

### Category 4 – Structure

#### 25 Year Recap

**\$0**

- The Halifax Forum was reported to be originally constructed in 1927 with the addition of the MPC in 1988, Civic Center in 1995, and the Bingo/ Maritime Hall in 2003. The Forum consists of a combined steel and concrete structure with open web steel joists (OWSJ) that are riveted together that supports a wooden roof deck covered with a modified bitumen roof covering. It is assumed that the foundation consists of standard concrete footings and concrete frost walls with slab on grade flooring
- The Civic Center, Bingo Hall and MPC consist of a pre-engineered steel frame structures. It is assumed that the foundations consist of standard concrete footings and concrete frost walls with slab on grade flooring
- No evidence of major structural faults was observed or reported with the building structure. No major repair or replacement is expected to be required during the term

### Category 5 – Architectural Interior

25 Year Recap

\$733,000

- The interior of the Forum and Civic Center consists of an ice surface atop a concrete slab on grade, change rooms, washrooms, concession room, and skate sharpening room. The two arenas share a mechanical room, electrical room and Zamboni garage. The interior wall finishes for the Forum generally consists of painted concrete, speed tile and exposed painted metal columns / beams. The floor finishes consist of a newly finished epoxy resin on top of the concrete slabs and rubber matting around the ice surface and locker rooms. Ceilings are open to the underside of the ceiling deck with exposed structural components. The upper section of the arena has a box area that is made out of glass and plywood with wood frames. The box sections are open to the rest of the arena and are not heated
- Replacement of the rubber flooring in the Forum and Civic Centre and replacement of the Low-E Ceiling in the Civic Centre are expected to be required during the term

### Category 6 – Mechanical

25 Year Recap

\$447,000

- The main incoming water line is located in Civic Center and is assumed to service all four buildings. The water line is complete with a backflow preventer. Wastewater piping is assumed to be a combination of ABS and or cast iron which drains to the municipal sewer system. Localized repairs are expected to be completed as part of O&M
- Washroom fixtures throughout the four buildings consist of typical water closets, urinals and sinks. In the arenas dressing rooms have washroom/showers. Cyclical replacement of the fixtures can be expected to be required during the evaluation period
- Hot water is supplied to the Forum, Civic and MPC from an indirect fired hot water heater which provides hot water for flood water, washrooms, and showers. The indirect hot water heat uses boiler water from the main boiler located in the Forum boiler room. Cyclical end of life replacement can be expected during the term
- Heating hot water for the Forum, Civic and MPC is provided by the main boiler located in the Forum. It is a York Shipley of Canada boiler which was installed in 1995 and has recently been converted to natural gas. Heating hot water is circulated in a two loop system each with two circulating pump on each loop. The heating water is not treated. End of life replacement is expected to be required during the evaluation period

### Category – 7 Electrical

25 Year Recap

\$79,000

- There is one main feed for the four buildings that goes to the electrical room between the Forum and the Civic Center. The main disconnect is a Square D Canada rated at 1200A and 347/600V, which was installed in 1995. Secondary switch gear is found in each of the buildings that then distributes to the receptacles and lighting. A partial replacement of the primary and secondary components are expected during the term
- Lighting for the arenas have recently been upgraded to high bay T5 fluorescent over the ice sheets. The lighting along perimeter of the two buildings is T8 fluorescent fixtures. End of life replacements can be expected during the evaluation period

### Category 8 – Life Safety

25 Year Recap

\$94,000

- The four buildings are each equipped with their own alarm panel which is located at the main entrance to each building. The panel are connected to smoke detectors throughout the building and externally monitored
- The building is provided with a sprinkler system, dry for the arenas and wet for the MPC and Bingo/Maritime Hall. Emergency lighting is provided by battery back-up wall mounted lighting and LED exit signage strategically placed throughout the buildings
- A 57 hp diesel pump fire pump was installed in 1995 to service the sprinkler system. The single walled fuel tank that services the pump was installed in 1996

- Cyclical and end of life replacement of the Life Safety components are expected to be required during the evaluation period

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,148,000**

- The ice making plant consists of an ammonia based refrigeration plant that provides chilled brine through a piped header system to the ice sheet slab to maintain the ice sheet. The plant consists of three evaporative condensers, two shell and tube chillers, three Mycom reciprocating compressors with two equipped with 75 hp motors and another with a 100 hp motor. The plant has a recently installed heat recovery system using four ThermoStor Ammonia / Water de-superheaters which preheat the boiler water. End of useful life of the majority of the Ice Plant components is expected to be required during the evaluation period
- Brine is circulated by 20 hp circulation pumps through a distribution system including supply / return piping, header and the slab piping. The brine distribution piping was observed and reported to be in poor condition and will require at least a partial replacement during the evaluation period. The in slab brine piping in the Forum and Civic Centre was reported to be in good condition. Major repair or replacement of the brine slab piping is not expected to be required
- Dehumidification for the Civic Center is provided by two Cimco dehumidification units, and the Forum dehumidification is provided by a natural gas fired desiccant roof top mounted dehumidification unit. End of life replacement is anticipated to be required during the evaluation period
- The dasher boards in the Forum were replaced in 2006 with the dasher boards in the Civic Centre were partially replaced in 2009. Cyclical end of life replacement of the dasher boards in both arenas is expected to be required during the evaluation period
- The ice resurfacing equipment is in good to new condition. These units have a typical expected useful life of between ten and fifteen years. For the purposes of the capital plan it is expected that cyclical replacement will be required at ten year intervals during the evaluation period

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Briefing Notes

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## St. Margaret's Centre

12 Westwood Boulevard  
Upper Tantallon

**Year of Construction:** 1986 / 2006  
**Number of Ice Sheets:** 2  
**Deferred Recapitalization:** \$102,000  
**Facility Condition Index:** 0.80%

**Date of Site Assessment:** 02/2/2012

### Property Description

The building contains two arenas, a gymnasium, a multi-purpose room, administration offices, canteen and conference rooms. In general it is a combination of two single storey structure adjoined with a two storey structure. It is assumed to be founded on concrete foundations and has a steel superstructure. The exterior envelope is predominantly clad with metal siding and brick veneer. The roof over both arenas is metal supported by metal purlins and the steel superstructure while the gymnasium and ancillary space has an EPDM roof supported by metal deck and open web steel joists. The reported area of the building is approximately 85,400 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in good overall condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. The recommendations made with respect to the capital plan include replacements of asphalt paving, exterior envelope components, interior finishes, HVAC components, and plumbing fixtures and piping. In the arena system, the ice plant, condensers, headers and piping, dehumidifiers, dasher boards and ice-resurfacing equipment will require replacement or significant refurbishment.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$513,000**

- At the time of the site visit the majority of the asphalt paving was snow covered. It is assumed that the asphalt is in excess of six years old based on the year of construction of the addition to the building. It was reported that the asphalt is in fair condition with some cracks and “alligatoring”. Based on the assumed age and reported condition it is anticipated that repairs will be required in the short term and again in the long term with a complete replacement in the extended term of the evaluation
- Landscaped areas appear to be in good condition and are not expected to require capital expenditure
- The concrete sidewalks along the west elevation were observed to be in good condition with no areas of heaving or settling. No significant repair or replacement is expected to be required



**Category 2 – Architectural Exterior**

**25 Year Recap**

**\$120,000**

- The exterior cladding of the building consists of metal siding and brick masonry. The metal siding is located around the perimeter of each of the arenas and approximately the top ten feet of the gymnasium while brick masonry extends from the main entrance on the south elevation around the east elevation and ends at the arena along the north elevation
- Windows are mainly located in the areas clad by brick masonry and are aluminum framed sealed glazing units. There are two sets of four aluminum glazed doors forming a vestibule at the main entrance and four aluminum framed and glazed doors along the north elevation. Service doors consist of metal doors set in metal frames. In addition there are three overhead doors located along the west elevation of the two arenas
- Cyclical repointing of the exterior brickwork, caulking, exterior and overhead doors and the original sections of metal siding are expected to require replacement during the term

**Category 3 – Roof**

**25 Year Recap**

**\$1,187,000**

- The roof system on both arenas consists of a prefinished metal. The roof system above the gymnasium and ancillary areas consists of an ethylene propylene diene monomer (EPDM) system.
- One of the arenas metal roofs as well as the EPDM membrane (gym and ancillary) are expected to require replacement during the evaluation period

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$892,000**

- There are three main areas in the building:
  - There are two arenas, one constructed in 1986 and the other in 2006. The arenas share a common ice maintenance area and ice plant
  - A Gymnasium
  - A common area connecting both arenas and the gymnasium which contains locker rooms, washrooms, offices, canteen, meeting rooms, workout room, multipurpose room and board room
- The arenas, other than the actual ice pads, have rubber flooring and painted concrete or prefinished metal panel walls. The ceiling in the older arena has low-e blankets suspended or attached to the roof structure and main beams while the other arena has prefinished metal panel ceiling complete with vertical suspended acoustic panels. The dressing rooms have painted block walls, rubber tile floors and the ceilings appear to be painted concrete. Cyclical replacement of the rubber flooring and painted finishes in the arena are expected to be required

**Category 6 – Mechanical**

**25 Year Recap**

**\$317,000**

- The facility has two separate water services; a well supplied potable system and a non potable water system. The non potable water was reported to be supplied from three wells on site with some rain water collection and is being used for flood water, urinals and toilets. It is stored in three, twenty seven thousand litre composite tanks for use as required. Rainwater is processed through a sand filter system for use in washrooms and through a “Jet Ice” system for flood water
- Well water is processed through a reverse osmosis system for drinking (potable) water, domestic tap and showers. Water is distributed throughout the building via copper piping. Hot water is heated and stored in three “Phase Three” indirect fired hot water

storage tanks for use in the building. It is expected that this system will require replacement at the end of its useful life

- There are in excess of sixty plumbing fixtures in the facility which include toilets, sinks, urinals, showers and water fountains. Phased replacement is expected to be required during the evaluation period
- Base load heat for the community center is provided by two AO Smith, model N2003-1065 and N2002-858, oil fired boilers connected to hot water baseboard heaters and ceiling mounted radiant heaters. The boilers are equipped with Power Flame, model C20AC burners and have a capacity of approximately 1,477 MBH each. The boiler water is also used to produce domestic hot water. The boilers are supplemented with reclaimed heat from the ice making equipment. Retrofit and replacement of the boilers is expected to be required during the evaluation period

#### **Category – 7 Electrical**

**25 Year Recap**

**\$107,000**

- The building is equipped with a main disconnect rated at 1200A 347/600V. The main disconnect was manufactured by Square D. Power is directed to the arena equipment, HVAC equipment and to transformers and breaker panels rated at 120/208V. The breaker panels service lights and receptacles throughout the building. No major replacement of the primary electrical components and equipment is expected
- Lighting in the building is a mixture of T5, T8, metal halide induction and incandescent fixtures. End of life replacement is expected to be required

#### **Category 8 – Life Safety**

**25 Year Recap**

**\$115,000**

- The building is equipped with an Edwards EST fire alarm reported to have been installed in 2006. The panel is connected to smoke detectors and alarm bells. Emergency lighting is provided by battery back-up wall mounted lighting and illuminated exit signage. Emergency power is provided by a 250 kW diesel powered generator. The building is equipped with dual wet/dry sprinkler system
- Replacement of the fire alarm, emergency lighting, exit signage and generator are expected to be required during the evaluation period

#### **Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,330,000**

- The building contains two arenas which operate from one refrigeration plant. The plant is comprised of two Mycom compressors, one Frick screw compressor and two evaporative cooling towers. It was observed and reported that the system is equipped with “Eco Chill” heat recovery. There are two “Thermo-Stor” tanks and one large Cimco tank (thermal equalizer) which store hot water, reportedly for preheating domestic hot water, heating pool water, snow pit melting. Chilled brine is pumped through headers in each arena. Controls consist of infrared sensors which monitor the ice temperature. End of life replacement of compressors and cooling towers are expected to be required
- The arenas are equipped with dasher boards, glass protection screens, protective netting, audio systems, time clock, scoreboards and seating. Cyclical end of life replacement expected to be required during the evaluation period
- The brine headers and associated under slab piping was reported to be in good condition with no known leaks or deficiencies. Localized repairs during the evaluation period are expected
- The facility is also equipped with two ice resurfacing machines. End of life replacements are expected during the evaluation period

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Briefing Notes

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## Cole Harbour Place

51 Forest Hills Parkway  
Dartmouth

**Year of Construction:** 1970's / 1988  
**Number of Ice Sheets:** 2  
**Deferred Recapitalization:** \$52,000  
**Facility Condition Index:** 0.18%

**Date of Site Assessment:** 07/27/2011

### Property Description

The building is a multi storey steel structure containing offices, fitness facilities, two arenas, squash courts, office areas, an indoor aquatics center, meeting rooms and canteen. The building is assumed and reported to be founded on standard concrete footings and concrete foundation walls. The base building was constructed in the early 1970s and consisted of a one storey arena. In the 1980s a one story arena was added with a multi storey community center completed in the late 1980s. The exterior envelope is predominantly clad with metal siding and brick veneer. Roofing consists of EPDM and inverted roof systems. The total reported area of the building is approximately 166,000 ft<sup>2</sup>.



At the time of the assessment, the site appeared to be in good overall condition and appears to be maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. The recommendations made with respect to the capital plan include replacements of asphalt paving, exterior envelope components, interior finishes, HVAC components, and plumbing fixtures and piping. In the arena system, the ice plant, condensers, headers and piping, dehumidifiers, dasher boards, sound system, scoreboards and time clocks, and ice-resurfacing equipment all require replacement or significant refurbishment.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$630,000**

- At the time of the site visit it was observed that the asphalt paving was in fair to good condition with a few pot holes, longitudinal cracking and some areas of "alligating". It was also observed that some patching had recently been undertaken near the main entrance. Asphalt repairs and replacement are expected to be required during the evaluation period
- Landscaped areas appear to be in good condition and are not expected to require capital expenditure
- The concrete sidewalks along the south, west and east elevations were observed to be in good condition with no areas of observed heaving or settling and only minor areas of damaged concrete. No major repairs or replacement is expected to be required

- Approximately 50% of the Site Work Category recapitalization costs during the evaluation period have been directed to the **Arena** portion of the development

**Category 2 – Architectural Exterior**

**25 Year Recap**

**\$564,000**

- The exterior cladding of the building consists of architectural block masonry and prefinished metal siding. Repointing of approximately twenty percent of the masonry in the extended term of this evaluation is expected to be required. The prefinished metal siding appeared to be in good condition with minor corrosion observed at the fastener locations. A complete replacement is expected within the extended term of the evaluation period
- The arena areas have building envelopes with minimal glazing while the main community center has double pane sealed units in aluminum frames. The two main entrances to the building consist of aluminum framed storefront style doors. The remaining exterior doors are painted metal with metal frames. There are also three overhead garage doors. Cyclical replacement of doors and glazing are expected upon reaching the end of their remaining useful life

**Category 3 – Roof**

**25 Year Recap**

**\$1,008,000**

- At the time of the site visit the roof system on the original arena, consisted of an Ethylene Propylene Diene Monomer (EPDM) system adhered over a previous roof system. The EPDM roof was reported to have been installed in 2011. All other roofs are ballasted inverted roof systems. Drainage from the EPDM roof system is by gutter to rainwater leaders and by internal rain water leaders for all other areas
- Based on the reported condition and estimated remaining useful life, replacement of the EPDM roof is expected to be required during the extended term of the evaluation period with the inverted roofs requiring replacement in the short term of the evaluation period

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$225,000**

- There are eight main areas in the building:
  - The arenas, consisting of the ice surface, change rooms, bleachers and washrooms
  - The library, consisting of the main book rack area and some offices
  - A swimming pool area containing three pools, a water slide and change rooms
  - A community hall which now contains office areas
  - A fitness centre with exercise equipment
  - A multipurpose room used for presentations, movies and assemblies
  - Squash courts
  - Office areas
- Cyclical replacement of the majority of the interior finishes associated with the arena portions of the development is expected to be required during the evaluation period

**Category 6 – Mechanical**

**25 Year Recap**

**\$133,000**

- The on-site water main and sanitary sewer were reported to have been installed in the early seventies and upgraded in the early eighties to accommodate the expansion of the facility. Localized repairs are expected to be required during the evaluation period
- There are in excess of one hundred plumbing fixtures in the facility which include toilets, sinks, urinals, showers and water fountains. Phased replacement is expected to be required during the evaluation period
- Base load heating is provided by two natural gas fired boilers connected to hot water baseboard heaters. The boilers also provide domestic hot water and heating water for the pools via heat exchangers. Heat for the arena dressing rooms is provided by hot water unit heaters supplied hot water from the boilers. Ventilation is provided by roof mounted air handling units with the exception of the pool area which is ventilated with two air handling units mounted in a penthouse mechanical room and a number of smaller exhaust fans. Cooling for the building is accomplished through electric roof mounted packaged units. In the case of the office areas, the packaged unit is connected to variable air volume boxes.

**Category – 7 Electrical**

**25 Year Recap**

**\$200,000**

- Power is transmitted from a pad mounted transformer located to the west of the building to the main disconnect rated at 2000A 347/600V and to a second disconnect rated at 800A 347/600V. The main disconnects were manufactured by Westinghouse and Federal Pioneer Power respectively. Power is directed to the arena equipment, HVAC equipment and to transformers and breaker panels rated at 120/208V. Cyclical end of life replacement of the main panel is expected to be required
- Lighting in the building is a mixture of T8, T12, metal halide and incandescent fixtures. Ongoing upgrades and replacement of the lighting throughout the building are expected to be required during the evaluation period

**Category 8 – Life Safety**

**25 Year Recap**

**\$166,000**

- The building is equipped with an Edwards fire alarm panel, a portion of which has been upgraded with an EST 2 fire alarm panel located near the front entrance. The panel is connected to smoke detectors and alarm bells throughout the building and reportedly monitored by an independent monitoring company. End of life replacement is expected to be required during the evaluation period
- Emergency lighting is provided by battery back-up wall mounted lighting and illuminated exit signage strategically placed throughout the building. End of life replacement is expected to be required during the evaluation period
- The building is equipped with two sprinkler systems. One system is installed in the community center and the other is installed in the arenas. The arenas have both a wet and dry component. No major replacement is expected to be required

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,517,000**

- The facility is equipped with two arenas, three pools, a whirlpool and a waterslide

**Arena Specialty System/Equipment Recapitalization**

- The refrigeration plant was reported to have been installed by Cimco and is an “Eco Chill” packaged system with plate and frame chillers with heat recovery that was installed in 2006. There are two “Thermo-Stor” tanks which store hot water for ice resurfacing use. There are two Cimco evaporative towers (2010 and 1990) mounted

outside the building near the refrigeration plant. End of life and cyclical replacements are expected to be required during the evaluation period

- Three Cimco dehumidification units are mounted in each of the arenas. It was reported that the dehumidifiers are in excess of ten to fifteen years old and are in good condition. Cyclical end of life replacement can be expected to be required
- The brine headers and associated under slab piping were reported to be in good condition with no known leaks or deficiencies. Localized repairs and replacements can be expected to be required during the evaluation period
- The majority of the dasher boards and glazing are original to the construction of each arena and have an expected useful life of twenty five to thirty years. It is anticipated that the dasher boards and glazing will require replacement within the evaluation period
- Cyclical end of useful life replacement of the Ice Resurfacers is expected to be required during the evaluation period



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## Dartmouth Sportsplex

110 Wyse Road  
Dartmouth

**Year of Construction:** 1982 / 1995 / 1997  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$1,349,500  
**Facility Condition Index:** 6.01%

**Date of Site Assessment:** 07/26/2011

### Property Description

The building is a two storey steel structure containing offices, fitness facilities, an arena, squash courts, an indoor pool, meeting rooms and canteen. The building is assumed and reported to

be founded on standard concrete footings and concrete foundation walls. It was also reported that the structure and foundation were originally constructed in the early 1982 with an addition completed in 1995. The exterior envelope is predominantly clad with brick veneer. The roof on the original building is prefinished metal supported by metal trusses and the steel superstructure. The roof on the addition is part prefinished metal and part EPDM system supported by metal deck on steel joists or trusses and the steel superstructure. The reported area of the building is approximately 132,000 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in fair overall condition; however the building appears to be maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. It is recommended that the concrete stairs be repaired or replaced and the parking area be repaired or replaced as soon as possible. It is also recommended that portions of the roof be replaced as they have reached the end of their useful life. The caulking should be replaced in the near future to prevent water penetration into the building. In addition there are a number of mechanical, electrical and life safety components that should be closely monitored and replaced as required.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$899,000**

- At the time of the site visit it was observed that the asphalt paving was in poor to fair condition with a pot holes, areas of heaving and settling, longitudinal cracking and areas of “alligating”. It was observed that many areas of the parking lot have failed or are beginning to fail while others are in fair condition for their age. A complete replacement of the asphalt will be required during the short term and additional repairs in the extended term of the evaluation
- Landscaped areas appear to be in good condition and are not expected to require capital expenditure

- The concrete flatwork associated with the development requires repairs and or replacements
- Approximately 50% of the Site Work Category recapitalization costs during the evaluation period have been directed to the **Arena** portion of the development

**Category 2 – Architectural Exterior**

**25 Year Recap**

**\$182,000**

- The exterior cladding of the building consists mainly of brick masonry and a small amount of prefinished metal siding. Brick masonry extends from the top of the foundation to the underside of either the sloped metal roofs or the EPDM roofs. The brick veneer appeared to be in fair condition with areas of damaged brick and some areas of mortar failure. Repointing of approximately twenty percent of the masonry is expected to be required
- Metal siding exists at the entrance way canopy at the north side of the building. The siding appeared to be in good condition with minor corrosion observed at the fastener locations
- The arena areas of the building envelope have glazing along the south elevation as does the main community center and pool area which consist of double pane sealed units in aluminum frames. The glazing appeared to be in generally fair to good condition with end of life replacements expected
- The three main entrances to the building consist of metal framed glazed doors. The remaining exterior doors are painted metal with metal frames. There are also two overhead doors. Ongoing replacement of the exterior doors is expected to be required during the evaluation period

**Category 3 – Roof**

**25 Year Recap**

**\$934,000**

- The roof system is an Ethylene Propylene Diene Monomer (EPDM) system with portions of the roof being prefinished metal siding. Drainage from the metal roof system appears to be via sheeting action to the ground below with the EPDM roof drainage by internal rain water leaders assumed to be connected to the municipal storm system. Repairs and replacements of the roof membranes are expected during the evaluation period

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$35,000**

- There are four main areas in the building:
  - The arena, consisting of the ice surface, change rooms, bleachers and washrooms
  - A swimming pool area containing the main and teaching pools, four water slides, sauna, steam room and change rooms
  - A community center which contains multipurpose rooms, a cafeteria and office areas
  - A fitness center with exercise equipment and squash courts
- The arena, other than the ice pad, has rubber flooring and painted plywood or painted block walls. The ceiling in the main arena is open to the underside of the metal roof. The dressing rooms have painted block walls and the ceilings are open to the deck above. There are painted sound acoustic panels installed on the interior walls surrounding the arena. A running track surface is also present around the upper portion of the arena. End of life replacement of the limited Architectural Interior finishes associated with the arena are expected to be required during the evaluation period



**Category 6 – Mechanical**

**25 Year Recap**

**\$132,000**

- The on-site water main and sanitary sewer were reported to have been installed in the early eighties. There is a meter and a backflow preventer installed at the domestic water entrance to the building. Localized repairs are expected to be required during the evaluation period
- There are in excess of one hundred plumbing fixtures in the facility which include toilets, sinks, urinals, showers and water fountains. Phased replacement is expected to be required during the evaluation period
- Base load heat for the community center is provided by a Burnham, model V-1125, natural gas fired boiler and a Weishaupt gas fired boiler connected to hot water baseboard heaters. The boilers also provide domestic hot water and heating water for the pools and for ice resurfacing via heat exchangers. Heat for the arena dressing rooms is provided by hot water unit heaters. Ventilation is provided by twelve air handling units, mounted in a penthouse mechanical room and one mounted in a dedicated mechanical room near the arena dressing rooms and number of smaller exhaust fans. Cooling for the building is accomplished with a roof mounted electric packaged unit and was reported to be limited to a small portion of the building

**Category – 7 Electrical**

**25 Year Recap**

**\$185,000**

- The building is equipped with two main disconnects rated at 1200A 347/600V and to a second disconnect rated at 800A 347/600V. The main disconnects were manufactured by Canadian General. Power is directed to the arena equipment, HVAC equipment and to transformers and breaker panels rated at 120/208V. The breaker panels service lights and receptacles throughout the building. Cyclical end of life replacement of the main panel is expected to be required
- Lighting in the building is a mixture of T8, T12, metal halide and incandescent fixtures. Ongoing upgrades and replacement of the lighting is expected to be required during the evaluation period

**Category 8 – Life Safety**

**25 Year Recap**

**\$132,000**

- The building was reported to be equipped with a Notifier fire alarm system installed in 2006/2007
- Emergency lighting is provided by battery back-up wall mounted lighting and illuminated exit signage strategically placed throughout the building
- The building is equipped with dual wet/dry sprinkler system installed and serviced by Viking Sprinklers
- Cyclical and end of life replacement of the Life Safety components are expected to be required during the evaluation period

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,373,000**

- The facility is equipped with one arena, two pools, a whirlpool, four waterslides, steam room and sauna

**Arena Specialty System/Equipment Recapitalization**

- The plant is comprised of three Cimco / Mycom compressors, plate and frame chiller and an evaporative cooling tower, there are three “Thermo-Stor” tanks which store hot water for ice resurfacing, preheating domestic hot water and snow pit melting. There is a “Jet Ice” reverse osmosis system installed for purification of flood water. In addition to two “Dessert Air” de-humidification units there is an air handling unit equipped with a desiccant wheel located in a mechanical room within the arena. The Plate exchanger

was replaced in 2003 and the cooling tower is less than ten years old. The hot water storage tanks were reported to be in good condition and had been installed within the last five years. The dehumidifiers were installed in 1997 and are in good condition. Cyclical upgrade of the ice plant and associated equipment are expected to be required during the evaluation period

- The brine headers and associated under slab piping was reported to be in good condition with no known leaks or deficiencies. Localized repairs during the evaluation period are expected
- The arena is equipped with dasher boards, glass protection screens, protective netting, audio systems, time clock, scoreboards, approximately three thousand seats and an ice surface cover. The dasher boards and protective glazing and netting were replaced in 2011 and cyclical end of life replacement expected to be required during the evaluation period
- The facility is also equipped with two ice resurfacing machines. Both ice resurfacing machines run on propane with one having a dual fuel system capable of running on natural gas. There is a natural gas re-fuelling station installed. End of life replacements are expected during the evaluation period

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## Spryfield Lions Arena

111 Drysdale Arena  
Halifax

**Year of Construction:** 1972  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$1,112,000  
**Facility Condition Index:** 17.90%

**Date of Site Assessment:** 07/26/2010

### Property Description

The building is a one storey steel structure containing two mezzanines and is assumed and reported to be founded on standard concrete footings and concrete foundation walls. It was also reported that the structure and foundation were originally constructed in 1972 with an addition to the south end of the building completed in 1982. The exterior envelope is predominantly clad with metal siding and brick veneer. The roof consists of standing seam metal panel supported by purlins which are in turn supported by the steel superstructure. The reported area of the building is approximately 39,200 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in poor overall condition as a result of aged infrastructure; however the building appears to be maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. It is recommended that the sidewalk be repaired or replaced and the parking area be repaired as soon as possible. It is also recommended that the ice making equipment be replaced within the immediate to short term. Cyclical replacement of the ice resurfacer is anticipated. The metal siding is deteriorating at the base and where fasteners penetrate to the wall behind and should be repaired or preferably replaced.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$499,000**

- At the time of the site visit it was observed that the asphalt paving was in very poor condition with numerous pot holes, fissures, areas of frost heaving, extensive “alligator cracking”. A complete replacement in the short term is anticipated with repairs beginning at ten years and every five years thereafter to maintain the condition of the parking surface
- Landscaped areas appear to be in good condition and are not expected to require capital expenditure
- The concrete sidewalks along the north and east elevations were observed to be in poor condition. There were a number of areas where the concrete has settled, cracked or heaved. In some areas the uneven surface poses a potential tripping hazard

**Category 2 – Architectural Exterior**

**25 Year Recap**

**\$633,000**

- The exterior cladding along the west and south of the building consist of prefinished metal siding. The siding is in poor condition and it is anticipated that the building will require a complete residing within the next ten years
- The north and east elevations brick masonry extends from the top of the foundation wall to approximately ten feet above the finished floor elevation with prefinished metal siding continuing to the roof level. Repointing and replacement of the caulked control joints is expected to be required
- The main entrance consists of three, aluminum framed storefront style doors, of which one is equipped with an automatic door opener. In addition there is a double aluminum door providing access to the gymnasium. The remaining exterior doors are painted metal with metal frames. There is also one overhead garage door. End of life replacements are expected to be required during the evaluation period

**Category 3 – Roof**

**25 Year Recap**

**\$223,000**

- Roofing consists of a prefinished metal standing seam roof system that was installed in 1995. Cyclical replacement is expected to be required

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$252,000**

- There are four main areas in the building:
  - The arena, consisting of the ice surface, change rooms, a concessions area bleachers and washrooms
  - The gymnasium, consisting of a basketball court, washrooms and a concessions area
  - A gallery located above the change rooms complete with kitchen
  - A mezzanine located above the main entrance including washrooms
- Cyclical replacement of the majority of the interior finishes associated with the ice arena portions of the building is expected to be required

**Category 6 – Mechanical**

**25 Year Recap**

**\$136,000**

- The on-site water main and sanitary sewer were reported to have been installed in 2009. There is a meter and a back flow preventer installed at the domestic water entrance to the building. Localized repairs are expected to be required during the evaluation period
- The building is not provided with showers
- Domestic hot water is supplied from two electric hot water heaters. Cyclic replacement is anticipated at ten to fifteen years intervals

**Category – 7 Electrical**

**25 Year Recap**

**\$308,000**

- Power is transmitted from pole mounted transformers located outside the building to the main disconnect rated at 400A, 600V. Power is then directed to a transformer and then to breaker panels rated at 120/208V. Cyclical end of life replacement of the main panel is expected to be required
- Lighting in the building is a mixture of T8, T12, metal halide and incandescent fixtures. It was reported that six CCTV cameras and associated video recording equipment was installed in 2009. It was also reported that a Paradox alarm system was installed within the last five years and is monitored by AEL Ltd. Cyclical end of life replacement is expected to be required during the evaluation period

**Category 8 – Life Safety**

**25 Year Recap**

**\$32,000**

- The building is not provided with a sprinkler system
- The building is equipped with a Mircom fire alarm panel located near the front entrance. This panel is connected to smoke detectors throughout the building. Emergency lighting is provided by battery back-up wall mounted lighting and illuminated exit signage strategically placed throughout the building. Cyclical end of life replacement of the life safety components is expected to be required during the evaluation period

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,526,000**

- Dasher boards were installed in 2009 and are in good condition. Cyclical end of life replacement is expected during the evaluation period
- At the time of the site visit the ice making system was reported to have been installed in 1972 and was bought second hand. This equipment has an expected useful life of approximately twenty years but can be significantly extended with regular maintenance. A budget allowance for a new ice plant has been included
- There is a noted concern that the brine system has known leaks, predominantly at the return loop end, and that the cold piping is in need of maintenance/repairs
- Cyclical replacement of the Ice Resurfacer can be expected to be required during the evaluation period

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## Devonshire Arena

3395 Devonshire Avenue  
Halifax

**Year of Construction:** 1972  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$1,414,500  
**Facility Condition Index:** 44.35%

**Date of Site Assessment:** 07/28/2010

### Property Description

The building is a one storey steel structure containing a partial mezzanine and is assumed and reported to be founded on standard concrete footings and concrete foundation walls. It has been



developed as a single pad ice arena with an ice surface dimension of 179' x 79'. It has small dressing rooms, Zamboni garage but no permanent bleachers or stands. The ice surface is not of a standard regulation size. It was reported that the structure and foundation were originally constructed in 1972. The exterior cladding consists of prefinished insulated metal siding. The roof consists of standing seam metal panels supported by purlins which are in turn supported by the steel superstructure. The area of the building was reported to be approximately 20,120 ft<sup>2</sup>.

Priority repairs were identified with regards to the concrete ice slab including the insitu cooling piping and manifold header as well as the dasher boards. In addition the arena would benefit from the immediate replacement of the ice plant. The metal siding is deteriorating at the base and where fasteners penetrate to the wall behind and should be repaired or preferably replaced. Further study should be conducted for accessibility and barrier free operations.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap \$16,000**

- The building has a gravel parking area that will accommodate approximately 30 vehicles
- The east side of the building is grassed and has approximately 80 feet of chain link fence running from the south east corner of the building in line with the south elevation to the property line. Cyclical replacement of the fencing is expected

#### Category 2 – Architectural Exterior

**25 Year Recap \$431,000**

- The exterior cladding consists of prefinished vertical metal siding. The metal siding on all elevations was observed to be in poor to very poor condition and is assumed to be original to the building. There was evidence of corrosion at the bottom of the panels, as well as dents and in some cases perforations along the walls. Replacement is expected
- The main entrance consists of a set of double steel doors, typically of service doors. There are a total of seven secondary metal doors; three double sets and a single door. A segmental garage door is located on the north side of the building and provides access



to the Zamboni garage. The frames are exhibiting signs of corrosion as are the hinges. The entrance and service doors are also generally nearing their end of their useful life

- Overhead door is in fair to good condition. Cyclical replacement is expected during the evaluation period

**Category 3 – Roof**

**25 Year Recap**

**\$209,000**

- The roof of the building consists of a standing seam metal roof installed in the 1990s. End of useful life replacement is expected to be required

**Category 4 – Structure**

**25 Year Recap**

**\$503,000**

- There were a number of very significant cracks in the frost wall. In one area, it appeared that a cold joint had opened up and in another area, in close proximity to the ice plant door, a deep crack was noted
- Slab on grade that is used for the ice surface has significant cracking. The cracks are impacting the ice surface and it was reported that the differential settlement has impacted the insitu cooling pipes. We anticipated a new slab with cooling pipes will be required in the immediate term
- Although the purlins supporting the roof were not accessible during the site visit, there were obvious signs of significant corrosion. It was reported that the building has not always had an operational dehumidifier and the building is known to have had excessive sweating in the past

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$112,000**

- The building is well maintained with respect to its architectural interior finishes. The walls and accessible structural elements were clean and recently painted
- The rubber mats were in good condition and did not have signs of excessive wear or missing sections. Cyclical replacement is expected during the evaluation period
- The wire mesh that is used to support the roof insulation is corroded. The mesh is expected to require replacement. The high moisture content that has resulted in the corroding of the purlins and the wire mesh also brings into question the condition of the ceiling insulation

**Category 6 – Mechanical**

**25 Year Recap**

**\$72,000**

- Domestic water and sanitary systems are generally original and appeared to be good overall condition, localized repairs as part of O&M expected
- The two domestic hot water heaters are in good condition with no reported problems. Cyclic replacement of these units as they reach the end of their life cycle
- The washrooms are in good condition. Cyclical replacement in the long term of the evaluation period expected
- Only the change rooms, operator's office and ancillary rooms are heated. Heating is accomplished by a Kerr Comet 270 hot water boiler which provides hot water to a combination of finned tube baseboard radiators and fan coil units. The boiler was installed in 1998 and is in fair to good condition. Cyclical replacement expected upon reaching end of useful life
- The fuel oil tank was installed 2006. Cyclical replacement expected

**Category – 7 Electrical**

**25 Year Recap**

**\$133,000**

- Power is transmitted from pole mounted transformers located outside the building to two main disconnect switches, one ,Cutler Hammer, rated at 200 A, 600 V and one Square D rated at 200 A 120/208V. The Cutler Hammer switchgear was installed within the past 10 years. Replacement of the Square D switchgear is expected

- The lighting is assumed to have been upgraded as required with the branch wiring assumed to be generally original to the building. We have allowed for the metal halide and fluorescent lighting to be replaced at the end of its useful life

**Category 8 – Life Safety**

**25 Year Recap**

**\$23,000**

- The building is not equipped with a fire alarm panel however smoke alarms are installed in the dressing rooms, equipment rooms and office areas. There are exit lights and battery back-up emergency lighting installed throughout the building. Ongoing cyclical replacement during the evaluation period is expected to be required
- Main entrance and the public washrooms do not have automatic door openers. Cyclical replacements can be anticipated

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,605,000**

- The dasher boards were in very poor condition. There were sections that had been reinforced with timber and other areas that have had metal reinforcement added. The dashboards are at the end of their life and should be replaced immediately. If replacement is not possible they should be inspected to ensure that they are safe for continued use and do not create potential safety hazards due to uneven surfaces and or potential weak sections
- The Ice Plant is well maintained but the basic framework is a 1972 installation and is in need of replacement. The system is relying on equipment that is difficult to service, and in some cases certain components may not be serviceable. A complete replacement of the plant is expected with additional replacements and or major component replacement expected during the evaluation period
- Cyclical replacement of the Ice Resurfacer is expected to be required



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## Sackville Sports Stadium

409 Glendale Drive  
Lower Sackville

**Year of Construction:** 1989  
**Number of Ice Sheets:** 2  
**Deferred Recapitalization:** \$716,000  
**Facility Condition Index:** 3.45%

**Date of Site Assessment:** 09/12/2011

### Property Description

The building consists of a two storey steel framed multi use community facility. It contains offices, fitness facilities, an arena, a curling facility, two indoor pools, a daycare, an education center and canteen. The building is assumed and reported to be founded on standard concrete footings and concrete foundation walls. It was also reported that the structure and foundation were originally constructed in the early 1989 with an addition completed in the late nineties. The exterior envelope is clad with metal siding. The EPDM roof membrane is supported by metal trusses and the steel superstructure. The reported area of the building is approximately 122,000 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in good overall condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. The recommendations made with respect to the capital plan include replacements of asphalt paving, exterior envelope components, interior finishes, HVAC components, and plumbing fixtures and piping. In the pool system, pool tile, pumps, filters and the water slide will require replacement within the term of the evaluation. In the arena system, the ice plant, condensers, headers and piping, dehumidifiers, dasher boards, sound system, scoreboards and time clocks, and ice-resurfacing equipment all require replacement or significant refurbishment.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$429,000**

- At the time of the site visit it was observed that the asphalt paving was in fair to good condition with a few pot holes, longitudinal cracking and some areas of “alligating”. It was also observed that some patching had recently been undertaken near the main entrance. Repairs and replacements are expected to be required during the evaluation
- Landscaped areas appear to be in good condition and are not expected to require significant capital expenditure
- The concrete sidewalks along the west elevation were observed to be in good condition with no areas of heaving or settling and only minor areas of damaged. Minor repairs are expected during the evaluation period

**Category 2 – Architectural Exterior**

**25 Year Recap**

**\$437,000**

- The exterior cladding of the building consists of prefinished metal siding on all elevations. The siding appeared to be in fair to good condition with minor corrosion and some dented or damaged panels. There are a few areas of dented and damaged flashings as well as some locations where the drip flashings were damaged or missing
- The two main entrances have aluminum framed and glazed doors and all other doors are metal set in metal frames. In addition there are two overhead doors at the rear of the building
- Cyclical end of life replacement of the metal siding, main entrance doors and overhead doors are expected to be required during the evaluation period

**Category 3 – Roof**

**25 Year Recap**

**\$838,000**

- The roof system is a ballasted Ethylene Propylene Diene Monomer (EPDM). Drainage from the EPDM roof system is by internal rainwater leader connected to the storm water system. Approximately 55% of the roof was reported to have been installed in 1989 and the remainder in the late 1990's
- Based on the reported condition and estimated remaining useful life, replacement of the EPDM roof installed in 1989 is expected in the short term with the remainder roofing (1990s section) is expected to be required during the extended term of the evaluation period. Regular roof maintenance is expected to be carried out frequently in order to achieve the expected useful life

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure. No major repairs or replacement is expected to be required during the term

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$211,000**

- There are nine main areas in the building:
  - The arena, consisting of the ice surface, change rooms, bleachers and washrooms and a curling arena including a lounge area
  - A swimming pool area containing two pools and change rooms
  - Two fitness centers, one unisex and the other designated as "female" only
  - Two studios used for dance and exercise classes
  - A gymnasium
  - Classrooms, leased to a private educational facility and a daycare
  - Office areas inclusive of physiotherapy clinic
  - A canteen with two leased areas for commercial restaurants
  - An area currently under renovation
- The arenas, other than the ice pads, have rubber flooring and painted plywood or painted block walls. The ceiling in the main arena has low e blankets installed to the underside of the metal roof as does the curling arena. The dressing rooms have painted block walls and the ceilings which are open to the deck above. The lounge area near the curling arena has carpet floors, painted block or drywall walls and the ceiling is open to the deck above. Cyclical replacement of the Interior Finishes in the Arena, Curling Sheet and associated areas are expected to be required during the evaluation period

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**Category 6 – Mechanical**

**25 Year Recap**

**\$120,000**

- The on-site water main and sanitary sewer were reported to have been installed in 1989. There are two domestic water entrances to the building. No major replacement is expected to be required during the evaluation period
- Domestic hot water is supplied by three indirect fired immersed coil hot water tanks fed from two main boilers. Cyclic replacement is anticipated
- There are in excess of one hundred plumbing fixtures in the facility which include toilets, sinks, urinals, showers and water fountains. Phased replacement is expected to be required during the evaluation period
- Base load heat for the community center is provided by two oil fired boilers connected to hot water baseboard heaters. The boilers also provide heating water for the indirect fired domestic hot water heaters. Heat for the arena dressing rooms is provided by electric unit heaters. In addition there are packaged roof mounted HVAC units which provide limited ventilation, heating and cooling to the building. Refurbishment and eventual replacement upon reaching the end of their typical expected service life is expected to be required during the term
- An Engineered Air, air handling unit (roof mounted) appeared and was reported to be new and in good condition. The expected useful life of this type of unit is approximately thirty five to forty years. It is not expected that this unit will require replacement in the term of this evaluation
- The two large “Modine” propane fired unit heaters located in the curling arena were installed in 1998. End of life replacement is expected to be required during the term

**Category – 7 Electrical**

**25 Year Recap**

**\$132,000**

- Power is transmitted from a pad mounted to two main disconnects rated at 1200A 347/600V. Power is directed the arena equipment, HVAC equipment and to transformers and then secondary breaker panels rated at 120/208V. Cyclical end of life replacement of the switchgear is expected to be required upon reaching the end of their service life
- The rink lighting was reported to be original (1989) and a lighting replacement is anticipated to be required during the term

**Category 8 – Life Safety**

**25 Year Recap**

**\$20,000**

- The building is equipped with an Edwards, EST 2 Fire alarm panel. Emergency lighting is provided by battery back-up wall mounted lighting and illuminated exit signage. Wet and dry pipe sprinkler systems are located throughout the building. Replacement of the fire alarm and emergency/exit lighting is expected during the term. The sprinkler system is not expected to require significant replacement

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$734,000**

- The facility is equipped with two pools, an arena and a curling sheet

**Arena Specialty System/Equipment Recapitalization**

- The hockey arena and curling sheet operate from one refrigeration plant. The plant was installed by Cimco and consists of three Cimco compressors, a newly installed plate exchanger that replaced the original shell and tube chiller and two evaporative cooling towers. Heat recovery was in progress of being installed. There are three “Thermo-Stor” tanks on site but not completely installed at the time of the site visit. End of life and cyclical replacements of the cooling towers, compressors and heat recovers storage tanks are expected

- The brine headers and associated under slab piping was reported to be in good condition with no known leaks or deficiencies. Localized repairs during the evaluation period are expected
- The arena is equipped with dasher boards, glass and protective netting, audio systems, time clock and scoreboard. Cyclical end of life replacement expected to be required during the evaluation period
- The facility is also equipped with an ice resurfacing machine. End of life cyclical replacements are expected during the evaluation period

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## Eastern Shore Community Centre

67 Park Road  
Musquodoboit Harbour

**Year of Construction:** 1972  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$413,700  
**Facility Condition Index:** 8.03%

**Date of Site Assessment:** 02/02/2012



### Property Description

The building is a single storey steel structure with a partial mezzanine and is assumed and reported to be founded on standard concrete footings and concrete foundation walls. It was also reported that the structure and foundation were originally constructed in 1972 with an addition to the south end of the building completed in 1982. The exterior envelope is predominantly clad with metal siding and brick veneer. The roof consists of standing seam metal panel supported by purlins which are in turn supported by the steel superstructure. The reported area of the building is approximately 32,500 ft<sup>2</sup>.

At the time of the assessment the development appeared to be in fair overall condition as a result of aged infrastructure; however the building appears to be maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. Some electrical, mechanical and life safety components are nearing or have reached the end of their useful life and should be upgraded or replaced within the near future. It is further recommended that the ice making equipment be replaced as well as cyclical replacement of the ice resurfacer.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap \$212,000**

- At the time of the site visit it was observed that the asphalt paving was in good condition and appeared to have been re-surfaced within the last two or three years. Cyclical repair and replacement of the asphalt surfaces is expected to be required during the evaluation period
- Landscaped areas appear to be in good condition and are not expected to require capital expenditure during the evaluation period

#### Category 2 – Architectural Exterior

**25 Year Recap \$92,000**

- The exterior cladding of the main arena is brick masonry with the addition having brick masonry to approximately ten feet above finished floor and metal siding to roof line. The building envelope has no glazing. The brick veneer and metal siding appeared to be in good condition with localized repointing of the brick and replacement of siding expected to be required

- The main entrance consists of two metal doors set in metal frames, of which one is equipped with an automatic door opener. The remaining exterior doors are painted metal with metal frames. There are also two overhead garage doors. Cyclical replacement is expected to be required

**Category 3 – Roof**

**25 Year Recap**

**\$442,000**

- At the time of the site visit the roof was not accessible, however it was reported that the roof was installed in 1972 for the main arena and 1982 for the gymnasium and consists of a prefinished metal standing seam roof system
- Based on the reported condition and estimated remaining useful life, replacement of both of the roofs is expected to be required during the short term of the evaluation period

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$192,000**

- Interior finishes in the building appeared to be in generally fair to good condition. The arena floor slab was reported to be in good condition with no cracks and no signs of settlement. End of life replacement and or refurbishment of the interior finishes associated with the arena is expected to be required during the evaluation period
- Rubber mats were in good condition and had been recently replaced. Cyclical replacement is expected during the evaluation period
- Public washrooms were in good condition

**Category 6 – Mechanical**

**25 Year Recap**

**\$126,000**

- Domestic water was reported and observed to be from an on-site well and the sanitary system is reported to be an on-site septic bed. Within the building, copper domestic water lines feed men's and women's washrooms, two canteen areas, the dressing rooms, two hot water tanks and the flood water system. Wastewater piping is assumed to be PVC or ABS to the septic bed. Two electric domestic hot water heaters provide potable hot water. Localized repairs and replacements are expected to be required during the evaluation period
- The septic system piping could not be observed at the time of the site visit; however the building operator has reported that it is original to the building and was inspected in 2009 by local authorities. Localized repairs and replacements are expected to be required during the evaluation period
- The domestic hot water tanks will require cyclical replacement during the evaluation period
- Plumbing fixtures have an expected useful life of approximately thirty years with faucets typically being replaced after twenty years. There are in excess of forty fixtures installed in the building. Costs have been included for a phased replacement
- Heating is accomplished through a combination of electric and hydronic heating. A wood fired external boiler "Wood Doctor" provides heating hot water and preheats the flood water. Re-claimed heat from the refrigeration cycle associated with the ice plant provides heat water which is used for limited heating of the change rooms. Cyclical end of life replacement is expected to be required

**Category – 7 Electrical**

**25 Year Recap**

**\$112,000**

- Power is transmitted from a pad mounted transformer located outside the building to the main, CEB, disconnect rated at 400 A, 600 V. Power is supplied to the ice plant and a



transformer and then to secondary breaker panels rated at 120/208V. The breaker panels service lights and receptacles throughout the building. Cyclical end of life replacement of the main panel is expected to be required

- Lighting in the building is a mainly T8 fixtures with some CFL and a few incandescent flood lights. Cyclical end of life replacement of the T8 fixtures is expected to be required

**Category 8 – Life Safety**

**25 Year Recap**

**\$122,000**

- The building is equipped with an Edwards EST, Fireshield fire alarm panel located near the ice resurfacer room. This panel is connected to smoke detectors throughout the building and reportedly monitored by AEL Ltd. Cyclical end of life replacements are expected to be required
- Emergency lighting is provided by battery back-up wall mounted lighting and illuminated exit signage strategically placed throughout the building. In addition there is a Caterpillar Diesel fired generator mounted externally at the rear of the building. Cyclical end of life replacements are expected to be required

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,495,000**

- Dasher boards and the associated protective glazing were reported to be replaced by section on an as required basis. It was further reported that each year the sections that are considered to be failing are replaced by in-house staff. A complete replacement is expected to be required during the evaluation period
- The ice plant was installed in 1972 and has had frequent maintenance and replacement of parts. As the plant is over forty years old it is anticipated that a replacement will be required within the short term of this evaluation. A budget allowance for a new ice plant has been included
- The brine piping was reported to have been installed in 1972 and it has reached the end of its useful life. Repairs and localized replacements are expected
- The ice resurfacer appears to be approximately ten years and has an expected useful life of ten to fifteen years. It is anticipated that the ice resurfacer will require cyclical replacement during the term of this evaluation

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## **Dr. Gerald J. LeBrun Recreation Centre**

**36 Holland Avenue  
Bedford**

**Year of Construction: 1972 / 1982**  
**Number of Ice Sheets: 1**  
**Deferred Recapitalization: \$546,000**  
**Facility Condition Index: 8.32%**

**Date of Site Assessment: 08/27/2010**

### **Property Description**

The building consists of a multi use facility consisting of the arena, community center and the Lion's Den. The arena and community centre was originally constructed in 1972 with the Lion's Den addition reportedly completed in 1982. The arena portion of the building is a single storey pre engineered structure that is assumed to be founded on standard concrete footings and concrete foundation walls. The community centre section of the building consists of a single story masonry structure assumed to be on standard concrete footings and concrete foundation walls. The Lion's Den addition is a two story pre-engineered steel framed structure also assumed to be founded standard concrete footings and concrete foundation walls. The exterior envelope is clad with vertical metal siding on all elevations with brick veneers on the lower portions of the front elevation of the arena and community centre. Roofing consists prefinished metal roofing on the arena and Lion's Den with a low sloped conventional Built Up Roof (BUR) membrane on the community centre. The total building area was reported to be 41,400 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in fair overall condition with an aged exterior envelope; however the building appears to be well maintained and in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. A number of the building components will require replacement during the evaluation period that include but is not limited to the roof, exterior cladding and doors, dasher boards, mechanical and ventilation systems, electrical switchgear and lighting, fire alarm panel and cyclical replacement of the ice resurfacer.

### **Major Component Replacement**

#### **Category 1 – Site Work 25 Year Recap \$208,000**

- Asphalt paving was in fair to poor condition with numerous areas of settlement and alligator/longitudinal cracking as well as evidence of past localized repairs. A complete resurfacing is expected to be required
- Gravel roadway and parking areas appeared to be in fair condition with areas of potholes and eroded material
- Asphalt paved pedestrian walkway and concrete stairwell appeared to be in fair condition with some minor areas of damaged/eroded asphalt noted



- The minimal landscaped areas appear to be in good condition and are not expected to require significant capital expenditure
- Site fencing was observed to vary in condition from poor to good condition, cyclical replacement is expected

#### **Category 2 – Architectural Exterior 25 Year Recap \$191,000**

- Prefinished metal siding appeared to be in fair overall condition with some localized areas of impact damage and corrosion, cyclical replacement is expected
- Brick veneer cladding is in generally good condition with some areas of impacted damage. Repairs and repointing are expected to be required
- Main doors were in generally good condition, cyclical end of life replacements are expected
- Secondary doors were in fair to poor condition overall with areas of faded finishes, impact damage and evidence of vandalism, cyclical end of life replacements are expected
- Overhead doors varied in condition from fair to poor. Replacement is expected during the evaluation period

#### **Category 3 – Roof 25 Year Recap \$386,000**

- The metal roof and electrical roof membranes are in poor overall condition with a history of past water ingress and partial repairs/replacements. End of life replacements is anticipated

#### **Category 4 – Structure 25 Year Recap \$0**

- No evidence of major structural faults was observed or reported with the building structure. No significant repairs or replacement is expected to be required during the evaluation period

#### **Category 5 – Architectural Interior 25 Year Recap \$209,000**

- Interior finishes in the building appeared to be in generally fair to good condition and recently painted. Cyclical recoating is expected to be required
- Rink floor slab was reported to be in good condition with no cracks and no signs of settlement
- Rubber mats were in good condition and had been recently replaced. Cyclical replacement is expected during the evaluation period
- Public washrooms were in fair to poor condition and do not provide barrier free access

#### **Category 6 – Mechanical 25 Year Recap \$209,000**

- Domestic water and sanitary systems are generally original and appeared to be good overall condition, localized repairs expected
- Washroom and shower fixtures in the arena appeared to be in generally poor condition. Upgrades and replacements are expected
- Electric domestic hot water tanks will require cyclic replacement
- Electric unit and baseboard heater replacement to be completed as part of operations and maintenance budgets
- Heating for the bleachers consists of two coin operated propane fired radiant tube heaters, cyclical replacement is expected

#### **Category – 7 Electrical 25 Year Recap \$267,000**

- Main disconnect rated at 1200A, 347/600V, manufactured by Cutler Hammer. Secondary 600V switchgear provides power to the plant equipment, unit heaters and

building lighting. A 150kVa transformer provides 120/208V power. Electrical equipment was installed in 1996 and no significant replacement is expected

- T12 lighting is expected to require replacement
- Over ice Mercury Vapour (MV) was installed in 1996. Cyclical replacement is expected

#### **Category 8 – Life Safety 25 Year Recap \$119,000**

- Mircom multi zone fire alarm panel (model # FA-300 Series) was installed in 2008 and will require end of life replacement
- Building is not provided with a sprinkler system
- Main entrance and the public washrooms have automatic door openers. Cyclical replacement is anticipated

#### **Category 9 – Specialty Systems/Equipment 25 Year Recap \$971,000**

- The dasher boards appeared to be in fair condition with no indications of significant damage to the boards or hardware and were installed between 1983 and 1985. End of life replacement is expected to be required
- Heating for flood water and dressing rooms is provided by Slant/Fin oil fired boiler (2010). Cyclical replacement can be expected during the evaluation period
- Fuel oil is provided by a single walled fuel oil tank (2002). Cyclical replacements at approximately ten year intervals can be expected during the evaluation period
- Flood water tanks were in good to new condition (2010). Cyclical end of useful life replacements can be expected during the evaluation period
- Ice making plant infrastructure appeared to be in fair condition and was reported to be very well maintained by the onsite staff and upgrades and replacements have been proactively completed
- Shell and Tube exchanger (1985) is nearing the end of its expected useful life. Cyclical replacement should be expected during the evaluation period
- Frick cooling tower installed in 2007/2008. End of useful life replacement is expected to be required during the evaluation period
- One compressor installed in 2008 with the second reported to be original to building. End of useful life replacement is expected to be required
- Brine header and associated under slab piping reported to be in good condition, localized repairs expected to be required
- Cyclical replacement of the dehumidification equipment as they reach the end of their useful life will be required
- Cyclical end of useful life replacements of the Ice resurfacers (Olympia) can be expected during the evaluation period

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## Gray Memorial Arena

10 Monique Avenue  
Dartmouth

**Year of Construction:** 1972  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$259,000  
**Facility Condition Index:** 5.88%

**Date of Site Assessment:** 08/26/2010

### Property Description

The building is a one storey steel structure containing two mezzanines and is assumed to be founded on standard concrete footings and concrete foundation walls. It was reported that the structure and foundation were originally constructed circa 1972. An addition to the base building consisting of additional dressing rooms, a referee room and a mechanical space was reported to have been completed in 2004. The exterior envelope of the base building and addition is clad with metal siding. The roof consists of standing seam metal panel supported by purlins which are in turn supported by the steel superstructure. The reported area of the building is approximately 27,800 ft<sup>2</sup>.



At the time of the assessment the site appeared to be in fair overall condition with aged exterior envelope infrastructure; however the building appears to be very well maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. A number of the building components will require replacement during the evaluation period that include but is not limited to the roof, exterior cladding and doors, dasher boards, mechanical and ventilation systems, electrical switchgear, fire alarm panel, localized sprinkler piping replacement and cyclical replacement of the ice resurfacer.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$121,000**

- Asphalt paving was in fair to poor condition.
- Secondary asphalt paved roadway in good condition.
- Site fencing was observed to vary in condition from poor to good condition
- Landscaped areas appear to be in good condition
- Cyclical replacement of the asphalt paving, secondary roadway and site fencing is expected to be required during the evaluation period

#### Category 2 – Architectural Exterior

**25 Year Recap**

**\$315,000**

- Prefinished metal siding on the main arena is in fair overall condition with some localized areas of impact damage and corrosion. Replacement is expected

- Metal siding on the addition is in good condition with some minor areas of impact damage noted on the east side of the addition
- Brick veneer cladding is in generally good condition
- Vertical wood siding is in fair to poor condition with faded finishes and deterioration of the wood. Replacement is required
- Main and secondary/exit doors were in generally good condition. Cyclical replacement can be expected
- Overhead doors were in fair to poor condition. Replacement and future cyclical replacement is expected during the evaluation period

**Category 3 – Roof**

**25 Year Recap**

**\$250,000**

- The metal roof membrane is in poor overall condition with a history of past and active water ingress. Replacement is expected
- The addition metal roof membrane is in good condition with no reported areas of damage or water ingress. End of life replacement is expected in the last year of the evaluation period

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$99,000**

- Interior finishes in the building appeared to be in generally fair to good condition, with recent painting of the walls and accessible structural elements. Cyclical recoating of the painted finishes is assumed to be completed as part of O&M
- Rink floor slab was reported to be in good condition with no cracks and no signs of settlement
- Rubber mats were in good condition and had been recently replaced. Cyclical replacement is expected during the evaluation period

**Category 6 – Mechanical**

**25 Year Recap**

**\$48,000**

- Domestic water and sanitary systems are generally original and appeared to be good overall condition, localized repairs expected
- Water closets, urinals and sinks have been generally upgraded with more efficient fixtures
- Electric domestic hot water tanks will require cyclic replacement
- Showers were in good condition and are equipped push button flow regulators
- Electric unit and baseboard heater replacement to be completed as part of operations and maintenance budgets
- Heating for the dressing rooms is by a Burnham oil fired boiler and in floor radiant heat. Fuel oil is provided by a Roth dual walled fuel oil tank. End of life replacement of the boiler and fuel tank is expected
- Heating for the bleachers consists of two coin operated propane fired radiant tube heaters. Cyclical replacement is expected

**Category – 7 Electrical**

**25 Year Recap**

**\$154,000**

- Main disconnect rated at 400 A, 600 V and was manufactured by Federal Pioneer. End of life replacement is expected
- Localized replacement of branch wiring as part of O&M budgets

- The majority of the interior lighting was replaced in 2009 with energy efficient T8 fixtures, cyclical replacement is expected

**Category 8 – Life Safety**

**25 Year Recap**

**\$34,000**

- Fire alarm panel was installed within the past five to ten years and will require cyclical replacement
- Dry sprinkler system will require localized piping replacements. Sprinkler heads replaced in 2009. Repairs and replacements are expected to be required
- Decommissioned wet agent fire suppression in the kitchen area
- Main entrance and the public washrooms do not have automatic door openers

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$936,000**

- The dasher boards appeared to be in fair condition with no indications of significant damage to the boards or hardware although they are original to the building. Replacement is expected to be required
- Flood water boiler and fuel tank will require cyclical replacement at end of useful life
- Flood water tanks were in good overall condition, cyclical replacement expected
- Ice making plant infrastructure appears and was reported to be very well maintained by the onsite staff and upgrades and replacements have been proactively completed
- Plate exchanger complete with ammonia based coolant (2002) replaced original shell and tube exchanger
- Cooling tower (2002), will require cyclical replacement during the term
- Compressors are original and are expected to require cyclical replacement
- Brine header and associated under slab piping reported to be in good condition, localized repairs expected to be required
- Cyclical replacement of the dehumidification equipment as they reach the end of their useful life will be required
- Cyclical replacement of the Ice Resurfacer (Zamboni Model #440)

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## Bowles Arena

15 Ragus Road  
Dartmouth

**Year of Construction:** 1972  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$310,000  
**Facility Condition Index:** 7.17%

**Date of Site Assessment:** 08/26/2010

### Property Description

The building is a one storey steel structure containing two mezzanines and is assumed to be founded on standard concrete footings and concrete foundation walls. It was reported that the structure and foundation were originally constructed circa 1972. The exterior envelope is clad with metal siding. The roof consists of standing seam metal panel supported by purlins which are in turn supported by the steel superstructure. The reported area of the building is approximately 27,300 ft<sup>2</sup>. Landscaped areas associated with the property are mainly grassed and front onto Ragus Road and Acadia Street. A rock swale is located to the north and east of the site building with a treed area on the north side of the property.



At the time of the assessment the site appeared to be in fair overall condition with aged exterior envelope infrastructure; however the building appears to be well maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. A number of the building components will require replacement during the evaluation period that include but is not limited to the roof, exterior cladding and doors, dasher boards, mechanical and ventilation systems, electrical switchgear and lighting, fire alarm panel and sprinkler piping/heads and cyclical replacement of the ice resurfacer.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap \$83,000**

- Asphalt paving was in good to new condition. Cyclical replacements and repairs can be expected during the evaluation period
- Exterior fenced storage area aged and in fair condition. Replacement is expected
- Landscaped areas appear to be in good condition

#### Category 2 – Architectural Exterior

**25 Year Recap \$180,000**

- The prefinished metal siding in fair condition with localized areas of damage and corrosion on the west and north elevations. End of life replacement expected
- Main and secondary/exit doors appeared to be in good condition. End of life replacement



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**Category 3 – Roof**

**25 Year Recap**

**\$252,000**

- The metal roof membrane in poor overall condition with a history of past and active water ingress. End of life replacement is expected to be required

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$96,000**

- Interior finishes in the building appeared to be in generally fair to good condition
- Rink floor slab was reported to be in good condition with no cracks and no signs of settlement

**Category 6 – Mechanical**

**25 Year Recap**

**\$62,000**

- Domestic water and sanitary systems are generally original and appeared to be good overall condition, localized repairs expected
- Water closets, urinals and sinks have been generally upgraded with more efficient fixtures
- Electric domestic hot water tanks will require cyclic replacement
- Electric unit and baseboard heater replacement to be completed as part of operations and maintenance budgets

**Category – 7 Electrical**

**25 Year Recap**

**\$149,000**

- Main disconnect rated at 400 A, 600 V and was manufactured by Federal Pioneer and a partial replacement is expected
- The majority of the interior lighting was replaced in 2009 with energy efficient T8 fixtures, cyclical replacement is expected

**Category 8 – Life Safety**

**25 Year Recap**

**\$89,000**

- Five zone Mircom fire alarm panel was installed within the past ten years and will require cyclical replacement
- Dry sprinkler system will require localized replacements
- Main entrance and the public washrooms automatic door openers, cyclical replacement is expected to be required

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$1,033,000**

- Dasher boards appeared to be in good condition with no indications of significant damage to the boards or hardware. Replacement is expected to be required
- Flood water boiler installed in 2010, cyclical replacement at end of useful life
- Flood water tanks in fair overall condition, cyclical replacement expected
- Fuel oil storage in fair to good condition and is approximately seven years in age with cyclical replacements at ten year intervals expected
- Ice making plant infrastructure appears and was reported to be very well maintained by the onsite staff and upgrades and replacements have been proactively completed
- Cooling tower will require replacement in the short term with the compressors requiring replacement in the long term. Additional cyclical replacement of motors should be expected in the extended term of the evaluation period
- Brine header and associated under slab piping reported to be in good condition, localized repairs expected to be required

- Cyclical replacement of the dehumidification equipment as they reach the end of their useful life will be required
- Cyclical replacement of the Ice Resurfacer is expected to be required



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## Centennial Arena

27 Vimy Avenue  
Halifax

**Year of Construction:** 1967  
**Number of Ice Sheets:** 1  
**Deferred Recapitalization:** \$133,075  
**Facility Condition Index:** 3.00%

**Date of Site Assessment:** 08/26/2010

### Property Description

The building is a one storey steel structure containing two mezzanines and is assumed to be founded on standard concrete footings and concrete foundation walls. It was reported that the arena was originally constructed in 1967. Although not reported, the main entrance vestibule potentially may have been a later addition to the base building. No significant additions to the base building since the original construction. The exterior envelope of the building is predominately clad with metal siding with the entrance vestibule clad with architectural concrete block. The roof consists of standing seam metal panel supported by purlins which are in turn supported by the steel superstructure. The reported area of the building is approximately 28,000 ft<sup>2</sup>. Landscaping is limited to grassed and shrubs/trees on the north and west sides of the property. In addition a treed area is located adjacent to the north side of the building. This area does not appear to be maintained.



At the time of the assessment the site appeared to be in fair overall condition with aged exterior envelope infrastructure; however the building appears to be very well maintained in operable condition. The structural components of the building appeared to be in good condition with no structural deficiencies observed or reported. A number of the building components will require replacement during the evaluation period that include but is not limited to the roof, doors, dasher boards, mechanical and ventilation systems, localized sprinkler piping replacement and cyclical replacement of the ice resurfacer.

### Major Component Replacement

#### Category 1 – Site Work

**25 Year Recap**

**\$169,000**

- Asphalt paving was in fair to poor condition with numerous areas of settlement and alligator/longitudinal cracking as well as evidence of past localized repairs. A complete resurfacing is expected to be required
- Asphalt paved roadway appeared to be in fair to poor condition with evidence of ongoing repairs, deterioration and settlement. Replacement/resurfacing is expected
- Site fencing was observed to be in generally good condition with no reported or observed areas of damage or significant deterioration. End of life replacements expected
- The minimal landscaped areas appear to be in good condition and are not expected to require significant capital expenditure

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**Category 2 – Architectural Exterior**

**25 Year Recap**

**\$149,000**

- Exterior cladding predominately consists of prefinished vertical metal panels with the main entrance cladding consisting of a combination of prefinished vertical metal panels and concrete block. Replacement of the metal cladding is expected
- Main doors were in generally good condition, cyclical end of life replacements are expected
- Secondary and service doors were in fair to poor condition overall with areas of faded finishes, impact damage and evidence of vandalism cyclical end of life replacements are expected
- Overhead door was noted to be in good condition. End of life replacement is expected during the evaluation period
- The secondary entrance concrete stairwells were in poor condition with areas of cracking and spalling concrete, potentially resulting in possible trip hazards

**Category 3 – Roof**

**25 Year Recap**

**\$267,000**

- Roofing for the base building consists of prefinished standing seam metal roof that is original to the building (1967). Replacement is expected
- Main entrance roofing consists of a low sloped roof membrane consisting of an ethylene propylene diene monomer (EPDM) membrane that is in good condition. End of life replacement is expected

**Category 4 – Structure**

**25 Year Recap**

**\$0**

- No evidence of major structural faults was observed or reported with the building structure

**Category 5 – Architectural Interior**

**25 Year Recap**

**\$222,000**

- Interior finishes in the building appeared to be in generally fair to good condition and recently painted. Ongoing painting as part of O&M is expected
- Rink floor slab was reported to be in good condition with no cracks and no signs of settlement. Replacement or major repair is not expected to be required
- Rubber mats were in good condition and had been recently replaced. Cyclical replacement is expected during the evaluation period
- Reflective ceilings were reported to have been installed in 1992 and appeared to be in fair overall condition although are nearing the end of their useful life. End of life replacement is expected
- Bleachers appeared to be in good condition and have been recently painted. Ongoing painting and minor repairs/replacements are expected, as part of O&M is expected
- Mezzanine finishes appeared to be in generally fair overall condition with end of life replacement of the finishes expected to be required
- The public washrooms and the locker room washroom/shower finishes were in good condition with no significant deficiencies. The locker room washroom/showers were renovated in 2003/2003. No significant replacement is expected to be required during the evaluation period
- The main entrance is provided with automatic door openers. Cyclical replacement of the openers is expected
- Public washrooms do not provide barrier free access

**Category 6 – Mechanical**

**25 Year Recap**

**\$52,000**

- Domestic water and sanitary systems are generally original and appeared to be good overall condition, localized repairs expected during the evaluation period
- Washroom and shower fixtures in the arena appeared to be in generally good condition. No significant replacement is expected to be required during the evaluation period

- Electric domestic hot water tank will require cyclic replacement (public washrooms) at approximately ten year intervals
- Flood water, hot water heating and domestic hot water for the locker rooms #1-4 is provided by the Burnham oil fired boiler and two indirect fired SuperStor hot water tanks. End of life replacement of the boiler and tanks is expected to be required

**Category – 7 Electrical**

**25 Year Recap**

**\$61,000**

- There are two electrical feeds for the building. The main electrical switchgear is located in the mechanical room and consists of a 400A/600V main switch that was manufactured by Cutler Hammer. The second electrical feed supplies a 100A/240V panel located in the Zamboni Room and was manufactured by Square D. The panels are in good condition and were upgraded in 2009 and 2004 respectively. No significant replacement is expected
- The T12 and over ice metal halide fixtures are expected to require cyclical replacement

**Category 8 – Life Safety**

**25 Year Recap**

**\$25,000**

- Fire suppression is provided by a dry pipe sprinkler covering all areas of the building. Pull stations and alarm bells were noted throughout the building
- Repairs and replacements of the sprinkler piping, emergency lighting and battery backup are expected during the evaluation period.
- Main entrance is provided with automatic door openers, as noted above, cyclical replacement is expected to be required during the evaluation period

**Category 9 – Specialty Systems/Equipment**

**25 Year Recap**

**\$941,000**

- The dasher boards appeared to be in fair condition with no indications of significant damage to the boards or hardware and were installed between 2001. End of life replacement is expected to be required
- Heating for flood water and dressing rooms is provided by Burnham oil fired boiler and two indirect fired SuperStor hot water tanks. Cyclical replacement can be expected during the evaluation period
- Ice making plant infrastructure appeared to be in good condition with many of the plant components having been recently replaced and or upgraded
- Chiller was replaced in 2009, both compressors have been replaced since 2008 including motors and controls and the condenser was replaced in 2009. Replacement is not expected to be required for fifteen or more years
- The brine header and associated under slab piping was reported to be in good condition with new hose connections recently installed. Localized repairs and replacements are expected
- One of the dehumidifiers was reported to have been replaced in 2009 with the remaining two humidifiers being greater than ten years in age. Cyclical replacement at approximately twenty year intervals is expected
- The arena is provided with two Olympia ice resurfacers. It was reported that one of the units was purchased in 2006 with the second unit purchased in 1998 and is used only as a spare. Cyclical replacement of the primary ice resurfacer is expected

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## **APPENDIX B**

2001 Arena Capacity Study - Update 01/29/09, Catherine Oliver

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**HRM**  
**2001 Arena Capacity Study**  
**Update**  
**January 20, 2009**  
**Prepared by**  
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## Executive Summary

- The Update mirrors the 2001 Study and is based on Minor Hockey Areas as Minor Hockey is the single largest organized user of ice time in HRM. Data updated includes population, demographics, growth projections and minor sport registrations.
- Minor Hockey's Market Capture Rate (percentage of children ages 5 – 14 playing) increased in all areas of HRM between 2000/01 and 2007/08. 47% of the increase was due to rapidly increasing participation by girls.
- Primary Target Market Population for minor sport (ages 5 – 14) decreased in all areas of HRM except TASA (Timberlea Amateur Sports Association) between the 2001 and 2006 Census.
- Total number of children registered in Minor Hockey increased in all areas except Sackville between 2000/01 and 2007/08. Ringette registrations also increased while Figure Skating decreased.
- The number and percentage of children in the 0 – 4 age group (indication of future demand) decreased in all areas between 2001 and 2006, however individual communities showed increases. These included: Hammonds Plains (115), Clayton Park (85), Sackville North (60) and Dartmouth South (44), all of which have experienced subdivision development.
- The Halifax Regional School Board has undertaken a detailed review of demographics as part of the Imagine Our Schools planning process. While the overall population in HRM is projected to increase 32,658 by 2021, the population of children is projected to decrease by 11,715. Despite projected developments at Russell Lake and Morris Lake, 59% of this decline (6,910) is attributed to the Eastern Central Planning Area (Dartmouth, Eastern Passage, Cole Harbour and the Prestons).
- Population growth projections and historical use patterns from similar developments indicate that the projected developments in Kearney Lake North, Bedford South, Bedford West and the nearby area of Clayton Park, totalling close to 31,000, should generate significant demand for ice activities, which, coupled with existing demand, support the original recommendation of Bedford for additional ice surface development. Of the potential sites currently under consideration for ice surface development, the Bedford West site on Hammonds Plains near the 102 Highway is the closest to the majority of these population areas.



## **1.0 Introduction**

The 2001 Arena Capacity Study identified Bedford as a high priority location for future ice surface development. This update was commissioned to determine if any significant factors had arisen in the last eight years that would alter this recommendation.

## **2.0 Methodology**

The update reviewed changes in ice surface supply, minor sport registrations, ice demand, demographics and projected population growth. No research was conducted directly with individual user groups, although provincial minor sport organizations were contacted. The original study used Minor Hockey areas as the basis for assessing demand/supply issues since Minor Hockey has traditionally been the single largest organized user of ice time. The update followed the same protocol. The updated information is presented in Tables that in most cases correspond to the original study and have been numbered accordingly with R indicating revised information. Additional information is provided in supplemental Tables designated S.

The data upon which this update is based should be viewed as having varying degrees of reliability. Community Counts/Canada Census data and Minor Sport registrations would be considered the most reliable as they are actual results, while growth projections and demographic forecasts would be relatively less reliable.

## **3.0 Findings**

### **3.1 Ice Surface Supply**

Three significant events have occurred since 2001. As recommended in the 2001 Study, a second ice surface opened at the St. Margaret's Centre in the Fall of 2005. However the ice surface at the Akerley NSCC closed in the spring of 2007. This effectively reduced the number of ice surfaces to the 2001 level of 21. A review of the overall ice supply conducted in 2006/07 by HRM staff indicated that there were a total of 80.5 unused hours in Prime Time, the majority of which were between 10:00 PM and Midnight. When Akerley closed, HRM moved all adult rentals in the HRM operated arenas into late evening hours in an effort to accommodate the needs of Minor Sport.

An ice surface is currently under construction on the Bedford Common (Rocky Lake). Once in operation this facility will bring the ice supply back up to the minimum level recommended in the 2001 Study. However it is unlikely that it will be able to address the additional current ice demand identified in the Community Facility Master Plan of 2008 or potential future ice demand from proposed developments.

## 3.2 Minor Sport

### 3.2.1 Minor Hockey

Total registrations for the 8 Minor Hockey associations in HRM increased 13.4% between 2000/01 and 2007/08. This was greater than the Province as a whole at 6.3%. Additional analysis indicated that female participation had increased 92.1% from 379 in 00/01 to 728 in 07/08. The province as a whole saw an increase of 63% in female participation from 1,372 to 2,237. However HRM still lags behind the province in terms of the % of females of total registrations at 11.7% as compared to the province with 13.3%.

According to Hockey Nova Scotia, the 11.7% increase in players in HRM is being accommodated in a static ice supply by reducing the amount of ice time per player and by decreasing the length of games. Although the number of girls playing hockey has increased, lack of access for females is still a major issue.

Table 4 R Minor Hockey Registrations 2000 - 2008														
	2000/01				2007/08				Var 08/00					
	Total	M	F	% F	Total	M	F	% F	Total		M		F	
									Act	%	Act	%	Act	%
Eastern Shore	267	258	9	3.4%	346	297	49	14.2%	79	29.6%	39	15.1%	40	444.4%
Cole Harbour	806	688	118	14.6%	848	713	135	15.9%	42	5.2%	25	3.6%	17	14.4%
Dart Whalers	938	886	52	5.5%	990	856	134	13.5%	52	5.5%	-30	-3.4%	82	157.7%
Dartmouth Total	2,011	1,832	179	8.9%	2,184	1,866	318	14.6%	173	8.6%	34	1.9%	139	77.7%
Sackville	812	759	53	6.5%	792	734	58	7.3%	-20	-2.5%	-25	-3.3%	5	9.4%
Bedford & District	809	780	29	3.6%	887	798	89	10.0%	78	9.6%	18	2.3%	60	206.9%
TASA	531	520	11	2.1%	854	781	73	8.5%	323	60.8%	261	50.2%	62	563.6%
Halifax Hawks	819	771	48	5.9%	978	828	150	15.3%	159	19.4%	57	7.4%	102	212.5%
Chebucto	484	425	59	12.2%	506	466	40	7.9%	22	4.5%	41	9.6%	-19	-32.2%
Halifax Total	3,455	3,255	200	5.8%	4,017	3,607	410	10.2%	562	16.3%	352	10.8%	210	105.0%
Total HRM	5,466	5,087	379	6.9%	6,201	5,473	728	11.7%	735	13.4%	386	7.6%	349	92.1%
Province	15,861	14,489	1,372	8.7%	16,854	14,617	2,237	13.3%	993	6.3%	128	0.9%	865	63.0%

## Akerley Impact

2006/07 registration information was compared with 2007/08 in an attempt to assess the impact of the closure of the Akerley rink. See Table 4S on the following page. While total registrations decreased by 9, Males decreased by 68 and Females increased by 59. A similar trend (total registrations about the same with decreasing Males and increasing Females) appears in the Province as a whole.

Of the 8 associations, 5 recorded losses while 3 gained. The increase of 71 for TASA could be attributed to the continuing development of the market as a result of the new ice surface in St. Margaret's and continued population increases, however the underlying reasons for increases in Halifax and Cole Harbour were not readily evident.

After Akerley closed, Bedford recorded the largest decrease with 67 fewer players. This appeared to be excessive given that a review of Akerley ice rentals indicated only 6 hours of rentals per week for that association, all or almost all of which were replaced in other facilities. A detailed review of Bedford registration information indicated that the majority of the decrease was in IP (Introductory Program) males. Decreases for the other associations appeared to be spread more evenly across the divisions. Registrations in Dartmouth, the area that would presumably have been most heavily impacted by the Akerley closure, decreased by 40 with 69 fewer males and 29 more females.

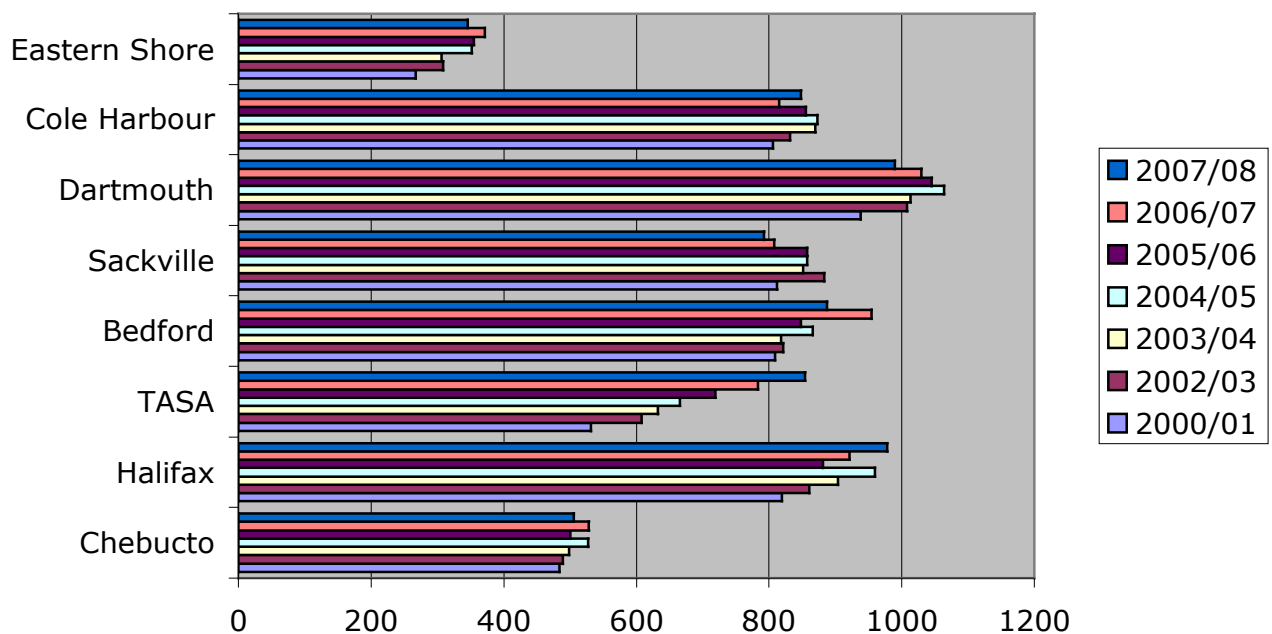
Since Minor Hockey registrations tend to fluctuate from year to year, no definite Akerley impact could be identified.

Fig. 1R on the following page provides a graphic comparison of registrations from 2000-2008. The only Minor Hockey group that recorded consistent increases was TASA.

**Table 4S Minor Hockey Registrations  
Akerely Impact**

	2006/07				2007/08				Variance					
	Total	M	F	% F	Total	M	F	% F	Total Act	% Act	M Act	% Act	F Act	% Act
Eastern Shore	371	295	76	20.5%	346	297	49	14.2%	-25	-6.7%	2	0.7%	-27	-35.5%
Cole Harbour	815	695	120	14.7%	848	713	135	15.9%	33	4.0%	18	2.6%	15	12.5%
Dart Whalers	1,030	925	105	10.2%	990	856	134	13.5%	-40	-3.9%	-69	-7.5%	29	27.6%
Dartmouth Total	2,216	1,915	301	13.6%	2,184	1,866	318	14.6%	-32	-1.4%	-49	-2.6%	17	5.6%
Sackville	808	750	58	7.2%	792	734	58	7.3%	-16	-2.0%	-16	-2.1%	0	0.0%
Bedford & District	954	857	97	10.2%	887	798	89	10.0%	-67	-7.0%	-59	-6.9%	-8	-8.2%
TASA	783	717	66	8.4%	854	781	73	8.5%	71	9.1%	64	8.9%	7	10.6%
Halifax Hawks	921	808	113	12.3%	978	828	150	15.3%	57	6.2%	20	2.5%	37	32.7%
Chebucto	528	494	34	6.4%	506	466	40	7.9%	-22	-4.2%	-28	-5.7%	6	17.6%
Halifax Total	3,994	3,626	368	9.2%	4,017	3,607	410	10.2%	23	0.6%	-19	-0.5%	42	11.4%
Total HRM	6,210	5,541	669	10.8%	6,201	5,473	728	11.7%	-9	-0.1%	-68	-1.2%	59	8.8%
Province	16,849	14,685	2,164	12.8%	16,854	14,617	2,237	13.3%	5	0.0%	-68	-0.5%	73	3.4%

**Fig. 1R Minor Hockey Registrations 2000 - 08**



### 3.2.2 Figure Skating

Figure Skating and Ringette registration information is contained in Table 5R. Figure Skating registration for the Province as a whole declined by 14% between 2000/01 and 2007/08. About 39% of the total for the Province was based in HRM. A severe lack of ice was the primary factor influencing Figure Skating participation according to the Skate Canada Nova Scotia.

### 3.2.3 Ringette

Ringette registrations have increased by 6.8% between 2000/01 and 2007/08. Ringette is basically centered in HRM and lack of ice time is a significant limiting factor in the growth and development of the sport. Some current participants travel as far as Oxford to access ice and teams are being forced to share ice time with as many as three on ice at the same time for practices. An officials training session has been delayed indefinitely due to a lack of ice.

Table 5R Figure Skating and Ringette Registrations							
	96/97	99/00	2007/08		HRM	Var 00/08	
Figure Skating			Total	HRM	% of total	actual	%
CanSkaters	3,791	3,549	2,858	1,121	39.2%	(691)	-19%
CanPower Skaters	14	15	209	120	57.4%	194	1293%
Test Skaters	587	720				(720)	-100%
Star Skate			632	205	32.4%	632	
Competitive Skaters	99	104	91	23	25.3%	(13)	-13%
Synchronized Skaters	31	37	8	2	25.0%	(29)	-78%
Total Province	4,522	4,425	3,798	1,471	38.7%	(627)	-14%
Ringette	788	872	931			59	6.8%

### **3.3 Catchment Demographics**

The 2001 report used 1996 demographic information as the 2001 information was not available and no reliable projections were available.

2001 and 2006 information was used to update Tables 6 and 7 to provide a clearer picture of the basis for the 2001 demand levels and subsequent changes. The 1996 information used in the original report was based on Planning Areas and, as noted in the report, was not directly related to the Minor Hockey boundaries. Similarly the 2001 and 2006 information cannot be directly related to Minor Hockey boundaries although changes in tabulation methods provide a much better approximation. The area with the greatest potential variance is Bedford as the boundaries of the Minor Hockey association encompass about a third of the geographic population area of Hammonds Plains. With no real way to ascertain how much of the Hammonds Plains population falls within the Bedford and District Minor Hockey boundaries, the decision was made to include Hammonds Plains with TASA based on the geographic area.

#### **3.3.1 Total Population**

A review of total population for 2001 and 2006 indicated that three of the eight minor hockey areas exceeded the 3.5% increase in HRM as a whole while two recorded basically static populations. Those exceeding were Bedford, TASA and Eastern Shore. Relatively static areas were Sackville and Dartmouth. The remainder were close to the overall HRM result. Table 6R on the following page provides a detailed review of the gains and losses in each of the communities within the 8 areas.

<b>Table 6R Total Population by Minor Hockey Area</b>					
Source: Community Counts/Canada Census					
	2001	2006	Variance Actual	2006/01 %	Gain/Loss % of HRM Total
Eastern Shore	23,820	24,959	1,139	4.8%	9.0%
Chezzetcook	3,760	4,044	284	7.6%	
Jeddore	1,430	1,525	95	6.6%	
Lake Echo	3,074	2,913	(161)	-5.2%	
Lawrencetown	4,977	5,385	408	8.2%	
Middle Mus	2,099	2,175	76	3.6%	
Musquodoboit Harbour	1,995	2,136	141	7.1%	
Porter's Lake	2,634	2,956	322	12.2%	
Sheet Harbour	1,752	1,684	(68)	-3.9%	
Ship Harbour	2,099	2,141	42	2.0%	
Cole Harbour District	27,625	28,294	669	2.4%	5.3%
Cole Harbour	25,200	25,934	734	2.9%	
Preston	2,425	2,360	(65)	-2.7%	
Dartmouth Whalers	76,472	76,352	(120)	-0.2%	-1.0%
Dartmouth	66,134	65,335	(799)	-1.2%	
Dartmouth East	25,081	22,240	(2,841)	-11.3%	
Dartmouth N	20,104	18,354	(1,750)	-8.7%	
Dartmouth S	20,949	24,741	3,792	18.1%	
Eastern Passage	10,338	11,017	679	6.6%	
Sackville	38,417	38,512	95	0.2%	0.8%
Beaver Bank	6,072	6,025	(47)	-0.8%	
Sackville N	4,060	4,985	925	22.8%	
Sackville S	28,285	27,502	(783)	-2.8%	
Bedford & District	27,398	29,204	1,806	6.6%	14.3%
Bedford	15,954	16,589	635	4.0%	
Waverly/Fall R	11,444	12,615	1,171	10.2%	
Fall River	9,111	10,251	1,140	12.5%	
Waverly	2,333	2,364	31	1.3%	
TASA	36,454	41,328	4,874	13.4%	38.7%
Hammonds Plains	7,907	10,295	2,388	30.2%	
Hubbards	2,055	2,096	41	2.0%	
Hackett's Cove	1,651	1,686	35	2.1%	
Hatchet Lake	2,864	2,877	13	0.5%	
Peggy's Cove	698	679	(19)	-2.7%	
Prospect	3,218	3,169	(49)	-1.5%	
St Margaret's Bay	2,148	2,326	178	8.3%	
Tantallon	6,696	8,062	1,366	20.4%	
Terrence Bay	1,076	1,049	(27)	-2.5%	
Timberlea	8,141	9,089	948	11.6%	
Halifax Hawks	99,556	102,833	3,277	3.3%	26.0%
Clayton Park	26,013	30,911	4,898	18.8%	
Fairview	14,997	14,478	(519)	-3.5%	
Halifax Chebucto	19,062	18,509	(553)	-2.9%	
Halifax Citadel	19,400	19,114	(286)	-1.5%	
Halifax Needham	20,084	19,821	(263)	-1.3%	
Chebucto	26,064	26,920	856	3.3%	6.8%
Armdale NW Arm	9,018	9,773	755	8.4%	
Herring Cove	2,738	2,790	52	1.9%	
Sambro	3,722	3,775	53	1.4%	
Spryfield	10,586	10,582	(4)	0.0%	
Total HRM	355,806	368,402	12,596	3.5%	100%

### 3.3.2 Age Groups

Population by major age groups is provided in Table 7R for 2006 and in Table 7S for 2001. 2001 represents the situation as it existed when the original study was conducted. The 2006 information coupled with growth projections (see Section 3.4 page 12) can provide an indication of areas of future demand for ice services in HRM.

A comparison between 2001 and 2006 reflects a general aging of the population with all of the areas recording lower percentages of children in the 0 – 4 age group (Fig. A page 11). The area with the highest percentage of young children is still TASA at 6.5% although it lost a full percentage point since 2001.

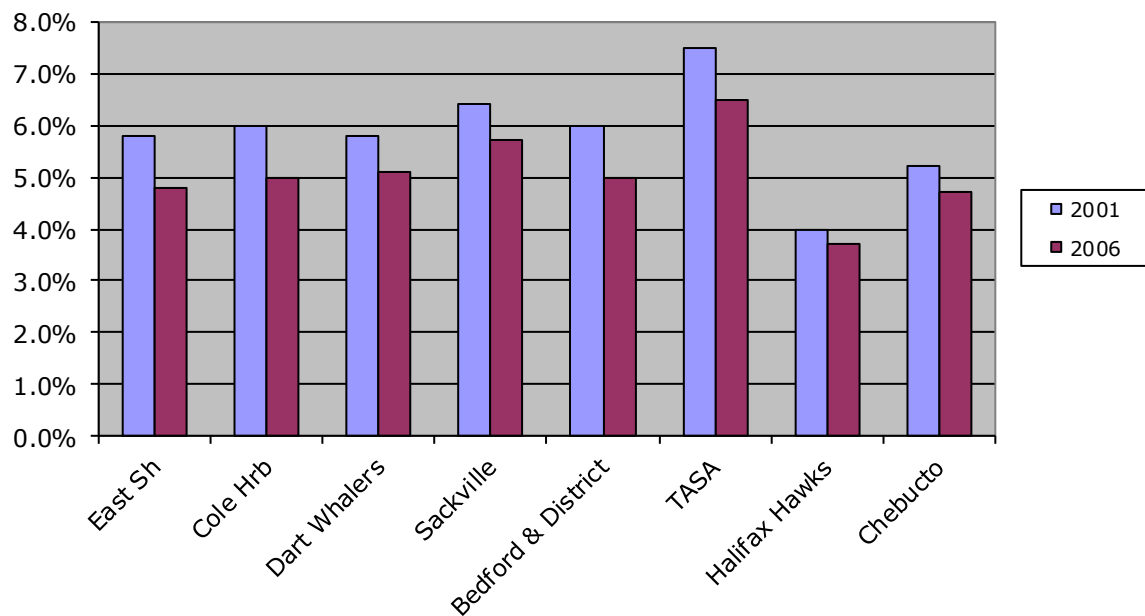
Table 7R Age Groups by Minor Hockey Area 2006 Source: Community Counts/Census Canada									
Actual	East Sh	Cole Hrb	Dartmouth	Sackville	Bedford	TASA	Halifax	Chebucto	Total
0 - 4	1,194	1,405	3,919	2,207	1,458	2,702	3,781	1,275	17,941
5 to 14	3,087	4,022	8,373	5,274	4,051	5,984	7,741	2,952	41,484
15 - 19	1,739	2,408	4,875	2,954	2,266	2,820	5,288	1,707	24,057
20 to 34	3,845	4,827	15,117	7,228	4,444	6,597	32,404	4,780	79,242
35 to 54	8,631	9,888	24,892	13,065	10,310	15,267	27,447	8,888	118,388
55- 69	4,363	4,327	11,627	6,055	4,613	5,803	14,488	4,427	55,703
70+	2,074	1,412	7,435	1,748	2,031	2,149	11,555	2,835	31,239
Total	24,933	28,289	76,238	38,531	29,173	41,322	102,704	26,864	368,054
%	East Sh	Cole Hrb	Dartmouth	Sackville	Bedford	TASA	Halifax	Chebucto	Total
0 - 4	4.8%	5.0%	5.1%	5.7%	5.0%	6.5%	3.7%	4.7%	4.9%
5 to 14	12.4%	14.2%	11.0%	13.7%	13.9%	14.5%	7.5%	11.0%	11.3%
15 - 19	7.0%	8.5%	6.4%	7.7%	7.8%	6.8%	5.1%	6.4%	6.5%
20 to 34	15.4%	17.1%	19.8%	18.8%	15.2%	16.0%	31.6%	17.8%	21.5%
35 to 54	34.6%	35.0%	32.7%	33.9%	35.3%	36.9%	26.7%	33.1%	32.2%
55- 69	17.5%	15.3%	15.3%	15.7%	15.8%	14.0%	14.1%	16.5%	15.1%
70+	8.3%	5.0%	9.8%	4.5%	7.0%	5.2%	11.3%	10.6%	8.5%
Total	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%



Table 7S Age Groups by Minor Hockey Area 2001  
Source: Community Counts/Canada Census

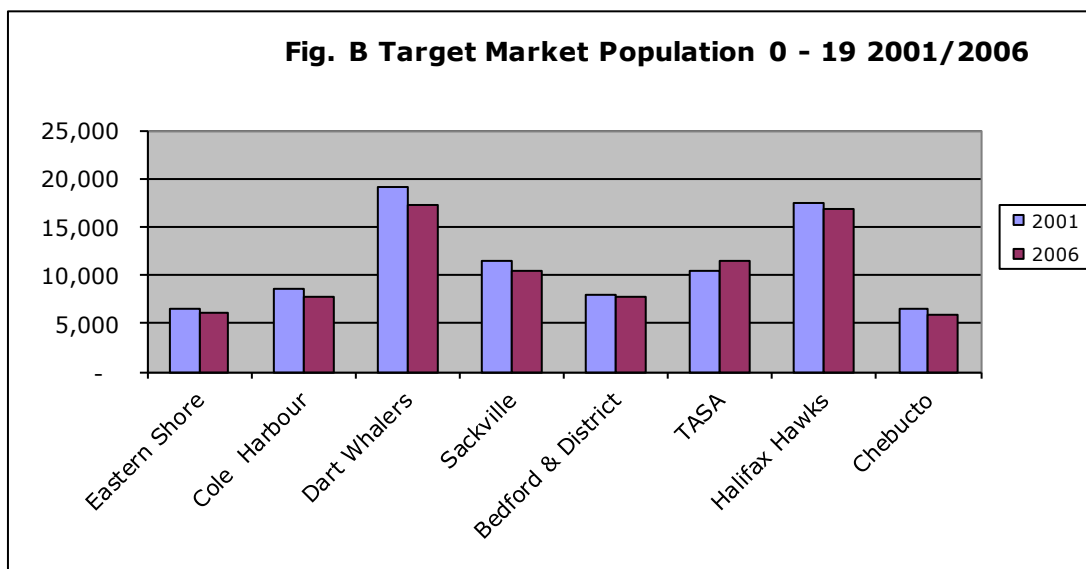
Actual	East Sh	Cole Hrb	Dartmouth	Sackville	Bedford	TASA	Halifax	Chebucto	Total
0 - 4	1,383	1,671	4,424	2,458	1,655	2,718	4,020	1,406	19,735
5 to 14	3,466	4,532	10,048	6,043	4,184	5,537	8,335	3,339	45,484
15 - 19	1,705	2,326	4,738	2,891	2,099	2,128	5,154	1,665	22,706
20 to 34	3,887	4,949	15,940	7,676	4,734	6,861	31,039	4,899	79,985
35 to 54	8,362	10,121	25,357	13,516	10,121	13,284	27,652	8,613	117,026
55- 69	3,231	3,091	9,742	4,356	3,271	4,079	12,086	3,509	43,365
70+	1,795	969	6,317	1,374	1,492	1,774	11,143	2,533	27,397
Total	23,829	27,659	76,566	38,314	27,556	36,381	99,429	25,964	355,698
%	East Sh	Cole Hrb	Dartmouth	Sackville	Bedford	TASA	Halifax	Chebucto	Total
0 - 4	5.8%	6.0%	5.8%	6.4%	6.0%	7.5%	4.0%	5.2%	5.5%
5 to 14	14.5%	16.4%	13.1%	15.8%	15.2%	15.2%	8.4%	12.4%	12.8%
15 - 19	7.2%	8.4%	6.2%	7.5%	7.6%	5.8%	5.2%	6.2%	6.4%
20 to 34	16.3%	17.9%	20.8%	20.0%	17.2%	18.9%	31.2%	18.2%	22.5%
35 to 54	35.1%	36.6%	33.1%	35.3%	36.7%	36.5%	27.8%	32.1%	32.9%
55- 69	13.6%	11.2%	12.7%	11.4%	11.9%	11.2%	12.2%	13.1%	12.2%
70+	7.5%	3.5%	8.3%	3.6%	5.4%	4.9%	11.2%	9.4%	7.7%
Total	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	96.6%	100.0%

**Fig. A % of Population 0 - 4**



### 3.3.3 Target Market Population By Age Groups

Table 7 S2 on the following page provides a comparison of gains and losses between 2001 and 2006 for the target market age groups for each of the communities within the 8 areas. HRM as a whole lost 4,443 children. The only area with a net gain was TASA with 1,123. The area with the greatest losses was Dartmouth Whalers with 2,043 fewer children in 2006 as compared with 2001. Fig. B provides a graphic comparison of the target market populations 0 –19 years of age.



**Table 7S2 Target Market Age Groups by Minor Hockey Area**  
**Actual Var 2006/01**  
**Source: Community Counts/Census Canada**

	0 - 4	5 to 14	15 - 19	Total
Eastern Shore	(189)	(379)	34	(534)
Chezzetcook	(20)	(52)	12	(60)
Jeddore	(22)	(9)	(9)	(40)
Lake Echo	(53)	(82)	(73)	(208)
Lawrencetown	(5)	(52)	2	(55)
Middle Mus	3	(46)	25	(18)
Musquodoboit Harbour	(30)	(47)	(3)	(80)
Porter's Lake	(3)	(38)	67	26
Sheet Harbour	(28)	(35)	4	(59)
Ship Harbour	(31)	(18)	9	(40)
Cole Harbour	(266)	(510)	82	(694)
Cole Harbour	(224)	(431)	78	(577)
Preston	(42)	(79)	4	(117)
Dartmouth Whalers	(505)	(1,675)	137	(2,043)
Dartmouth	(455)	(1,485)	(37)	(1,977)
Dartmouth East	(306)	(777)	(109)	(1,192)
Dartmouth N	(193)	(584)	(147)	(924)
Dartmouth S	44	(124)	219	139
Eastern Passage	(50)	(190)	174	(66)
Sackville	(251)	(769)	63	(957)
Beaver Bank	(18)	(75)	3	(90)
Sackville N	60	85	85	230
Sackville S	(293)	(779)	(25)	(1,097)
Bedford & District	(197)	(133)	167	(163)
Bedford	(191)	(203)	77	(317)
Waverly/Fall R	(6)	70	90	154
Fall River	3	62	86	151
Waverly	(9)	8	4	3
TASA	(16)	447	692	1,123
Hammonds Plains	115	502	215	832
Hubbards	19	(38)	27	8
Hackett's Cove	(21)	(24)	13	(32)
Hatchet Lake	(52)	(42)	85	(9)
Peggy's Cove	(11)	(30)	(4)	(45)
Prospect	(33)	(108)	(15)	(156)
St Margaret's Bay	(2)	27	4	29
Tantallon	14	208	174	396
Terrence Bay	2	(8)	(5)	(11)
Timberlea	(47)	(40)	198	111
Halifax Hawks	(239)	(594)	134	(699)
Clayton Park	85	296	318	699
Fairview	(110)	(223)	(28)	(361)
Halifax Chebucto	(47)	(219)	(32)	(298)
Halifax Citadel	(58)	(208)	(61)	(327)
Halifax Needham	(109)	(240)	(63)	(412)
Chebucto	(131)	(387)	42	(476)
Armdale NW Arm	(4)	(26)	(32)	(62)
Herring Cove	(18)	(60)	26	(52)
Sambro	(2)	(83)	18	(67)
Spryfield	(107)	(218)	30	(295)
Total	(1,794)	(4,000)	1,351	(4,443)

## 3.4 Population Projections

### 3.4.1 Population Growth

Overall population growth in HRM has exceeded the high projections contained in Table 8 of the original report for 2001 and 2006. High level projections used by HRM's Planning Division for the Regional Plan exceed those in Table 8R.

Table 8 R Projected Population HRM 1996 - 2021				
	Low Projection	Reference Medium Projection	High Projection	Actual
(Base) 1996	342,966	342,966	342,966	342,966
2001	353,886	356,452	358,256	359,183
2006	361,825	367,150	370,893	372,858
2011	367,266	375,497	381,297	
2016	370,934	382,170	380,106	
2021	373,035	387,371	397,483	
Source: Base Data: Statistics Canada, Census of Canada 1996, 2001, 2006. Projections: Calculated by the Canada Mortgage and Housing Corporation's Potential Housing Demand Model, Version 1.2				

HRM's Planning Division has identified and assessed potential population growth areas. In terms of the Minor Hockey boundaries, the area with the largest potential growth with the highest likelihood of proceeding within the next fifteen to twenty years is Bedford, specifically Kearney Lake North, Bedford South and Bedford West. The nearby area of Clayton Park is also expected to grow significantly. Total projected increase in population is in the order of 31,000 in diversified mix use development.

The next largest potential growth would be in Dartmouth at Russell Lake and Morris Lake with a total of approximately 12,000.

### 3.4.2 Population Demographics

The Halifax Regional School Board has undertaken a detailed review of demographics as part of the Imagine Our Schools planning process. To date only the major urban areas have been completed as part of Phase 1. The projections are based on School Families and as such do not correspond to the Minor Hockey boundaries however they do give an indication of trends within an overall area.

The following is an excerpt from the Phase 1 Background Report that explains the methodology used to develop the projections.

### “Projection Methodology

Separate age cohort and enrolment projections have been calculated for both Halifax Regional Municipality (HRM) and the two planning areas. The age cohort projection is used to estimate the future population, which provides a trend in the school aged children population at a larger geographic grouping, such as a planning area. The enrolment projection is used to generate a grade-by-grade projection for each program offered at a school. The key components of each methodology are discussed below.

#### **Age Cohort**

The Cohort-Survival Method combined with a technique for deriving migration estimates known as the Residual Method was utilized to estimate populations for HRM and the two planning areas. Both methods are well-recognized techniques for generating accurate and detailed population projections.

The Cohort-Survival Method uses historical Census data and projects future population based on assumptions about births, deaths and net migration. This method was used by well-known author, David Foot, for his best-selling book on Canadian demographic trends, *Boom, Bust and Echo*

The Residual Method is also well recognized if not as widely applied. It involves the calculation of population between two points in time for which population data is available using the Cohort-Survival Method. Given that the Cohort-Survival Method provides a reliable estimate of population resulting from the influences of fertility and mortality, the comparison of a population projection generated by this method with actual Census counts can be assumed to reveal the influence of migration.

#### **Enrolment**

Enrolment projections are based upon the Cohort-Survival Method, which uses historical grade by grade enrolment to estimate a grade by grade projection for each program offered at a school. This method uses trends to identify the progression of students from one grade to the next higher grade. Other data sources, including new housing developments and feeder school analysis, are used to supplement the Cohort-Survival Method projections.”

The areas completed to date are Eastern Central Halifax (Dartmouth, Eastern Passage, Prestons, Cole Harbour) and Peninsular Halifax. Table 8 S provides a comparison of the actual school enrolment in 2005/06 with projected enrolment in 2017/18. The total school enrolment in Eastern Central is projected to decline 23% (4,090) while that in Peninsular Halifax is projected to decline 8% (425). Within the Eastern Central area, the family of schools with the greatest decline is Auburn Drive High at 32% (1,389).

**Table 8 S Projected Enrolment by School Families**

Source: Imagine Our Schools

		Actual	Projected	Variance	
	Schools	2005/06	2017/2018	%	Actual
Auburn Drive High	9	4,304	2,915	-32%	(1,389)
Dartmouth High	11	4,246	3,214	-24%	(1,032)
Cole Harbour District High	12	4,583	3,491	-24%	(1,092)
Prince Andrew	12	4,494	3,917	-13%	(577)
Total East Central	44	17,627	13,537	-23%	(4,090)
Pen Halifax - Citadel High	17	5,108	4,683	-8%	(425)

The report also includes age group information for HRM as a whole and for the two Planning Areas completed to date. Table 8S2 on the following page compares projected age groups to 2021 with the 2006 actual. While the overall population in HRM is projected to increase by 32,658, the population of children is projected to decrease by 11,715, 6,910 (59%) of which will be attributed to the Eastern Central Planning Area. The decreases in the 0 – 19 age groups have been partially offset by projected development.

**Table 8S2 Population Age Group Projections**

Source: Imagine Our Schools

**Eastern Central Halifax Regional Planning Area**

Dartmouth Cole Harbour

	2006	2011	2016	2021	Variance 2021/2006 %	Net
0 to 4	6,005	5,728	5,633	5,354	-10.8%	(651)
5 to 14	13,870	11,658	10,800	10,505	-24.3%	(3,365)
15 to 19	8,000	7,174	5,658	5,106	-36.2%	(2,894)
Total	27,875	24,560	22,091	20,965	-24.8%	(6,910)
Total Pop	115,250	114,897	113,938	112,132	-2.7%	(3,118)

**Peninsular Halifax Planning Area**

	2006	2011	2016	2021	2021/2006 %	Net
0 to 4	2,150	2,378	2,307	2,387	11.0%	237
5 to 14	4,500	4,000	4,078	4,233	-5.9%	(267)
15 to 19	3,410	3,171	2,788	2,526	-25.9%	(884)
Total	10,060	9,549	9,173	9,146	-9.1%	(914)
Total Pop	65,280	65,962	66,704	67,076	2.8%	1,796

**Halifax Regional Municipality**

	2006	2011	2016	2021	2021/2006 %	Net
0 to 4	18,205	18,104	18,311	18,368	0.9%	163
5 to 14	41,970	37,565	35,797	35,922	-14.4%	(6,048)
15 to 19	24,340	23,025	20,274	18,510	-24.0%	(5,830)
Total	84,515	78,694	74,382	72,800	-13.9%	(11,715)
Total Pop	372,675	385,029	396,289	405,333	8.8%	32,658

### 3.5 Market Demand

A comparison of Minor Hockey Registrations with primary market population (ages 5 to 14) data between 2000/01 and 2007/08 (Table A on the following page) indicates that although the size of the market has decreased, the total number of children playing hockey has increased and therefore the percentage of children playing (capture rate) has increased. An analysis of male and female participation indicates that close to 50% of the increase was due to higher female participation.

All of the Minor Hockey Associations increased their market capture rates between 2000 and 2008. However any comparison of rates among the associations should be viewed with caution as there are some discrepancies between the population areas and the Minor Hockey boundaries that could skew the data. With some of the Bedford population allocated to TASA, the potential effect would be to increase the Bedford capture rate and decrease that of TASA. Their combined rate was 14% in 2000/01 and 17% in 2007/08.

The Dartmouth region continued to have a lower capture rate than the Halifax region but the difference in the two rates did not change significantly between the two time frames with Halifax capturing 1.5 percentage points more in 2000/01 and 1.3 percentage points more in 2007/08. However Halifax increased registrations by 16.3% while Dartmouth increased registrations by only 8.6%. This would be expected given that the target market in Halifax is not decreasing as fast as that in Dartmouth.

HRM as a whole continues to lag behind the Provincial participation rate at 14.9% as compared with 16.1% for the Province as a whole.



**Table A Minor Hockey Registrations/Population 5 - 14  
Capture Rate**

	2000/01			2007/08			Variance			
	Reg	Pop	Rate	Reg	Pop	Rate	Reg Actual	%	Pop Actual	%
Eastern Shore	267	3,466	7.7%	346	3,087	11.2%	79	29.6%	(379)	-10.9%
Cole Harbour	806	4,532	17.8%	848	4,022	21.1%	42	5.2%	(510)	-11.3%
Dart Whalers	938	10,048	9.3%	990	8,373	11.8%	52	5.5%	(1,675)	-16.7%
Dartmouth Total	2,011	18,046	11.1%	2,184	15,482	14.1%	173	8.6%	(2,564)	-14.2%
Sackville	812	6,043	13.4%	792	5,274	15.0%	(20)	-2.5%	(769)	-12.7%
Bedford & District	809	4,184	19.3%	887	4,051	21.9%	78	9.6%	(133)	-3.2%
TASA	531	5,537	9.6%	854	5,984	14.3%	323	60.8%	447	8.1%
Halifax Hawks	819	8,335	9.8%	978	7,741	12.6%	159	19.4%	(594)	-7.1%
Chebucto	484	3,339	14.5%	506	2,952	17.1%	22	4.5%	(387)	-11.6%
Halifax Total	3,455	27,438	12.6%	4,017	26,002	15.4%	562	16.3%	(1,436)	-5.2%
Total HRM	5,466	45,484	12.0%	6,201	41,484	14.9%	735	13.4%	(4,000)	-8.8%
Province	15,861	117,565	13.5%	16,854	104,395	16.1%	993	6.3%	(13,170)	-11.2%

## 4.0 Summary

In the eight years since the original study, progress on the recommendations has been mixed. Although an ice surface was added in St. Margaret's Bay that had a marked impact on the local area in terms of increased Minor Hockey participation, the loss of the Akerley rink effectively brought the ice supply back to 2001 levels. Female participation in Minor Hockey has increased significantly although it has a long way to go to reach gender equity and a lack of access to ice time for female dominated sports of Ringette and Figure Skating remains a significant problem. Recreational skating was not examined in this update as information could not be gathered from a sufficient number of arenas in the available time.

Since the population in the target market age groups decreased between 2001 and 2006, growth in Minor Hockey registrations can be attributed to increased market penetration, about 50% of which can be attributed to increased female participation. In 2001 approximately 13.7% of 5 to 14 year olds participated in Minor Hockey in HRM while 14.9% participated in 2008. HRM's participation rate lags behind the Province as a whole at 14.3% in 2001 and 16.1% in 2008. An exploration of the demand for Adult Hockey was not part of this update.

In terms of population trends, a comparison of target market age group projections undertaken in the Imagine Our Schools planning process indicates that the number of children between the ages of 0 and 19 in HRM will decrease by 11,715 between 2006 and 2021, 59% of which will occur in the Eastern Central Planning Region (Dartmouth, Eastern Passage, Cole Harbour and the Prestons) despite projected developments at Russell Lake and Morris Lake. This, coupled with net losses in target market age groups which have already occurred in the area (Table 7S Page 11) tend to indicate that the market for arena services would be relatively lower in the Dartmouth, Cole Harbour and Eastern Shore Minor Hockey areas compared with TASA and Bedford which have high current percentages of children in the 0 – 4 age group (indicating future demand), and in the case of TASA, which has experienced net growth in the target market age groups between 2001 and 2006.

These factors coupled with HRM Planning Division projections for a population increase of approximately 31,000 in developments in Kearney Lake North, Bedford South, Bedford West and the nearby area of Clayton Park, indicate that the original recommendation of Bedford for additional ice surface development remains valid. Of the sites currently under consideration for ice surface development, the Bedford West site on Hammonds Plains near the 102 Highway is the closest to the majority of these population areas.

## APPENDIX C

Long Term Arena Strategy Background Report 03/31/11, Catherine Oliver

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Long Term Arena Strategy  
Background Report

**HRM**  
**Long Term Arena Strategy**  
**Background Report**  
**Draft**  
March 31, 2011

C.E. Oliver  
March 31, 2011

Long Term Arena Strategy  
Background Report

## Executive Summary

The purpose of this research was to determine what impact the opening of the BMO Centre has had on ice demand in the Halifax Regional Municipality, and what other factors, if any, have emerged that would impact on long term ice demand since the update of the original 2001 study was completed in May 2009.

A number of factors have led the consultant to advise that it would be premature to draw any definitive conclusions about long term ice demand at this time. These factors include:

- the late season opening date of the BMO Centre (November 2010),
- the temporary closure of the Shearwater arena,
- the re-development of St. Margaret's Bay Smith sheet to an Olympic ice surface,
- the time lapse required for additional ice capacity to be absorbed by user groups,
- the opening of the Oval,
- the impending opening of a second ice surface at the East Hants facility,
- the time lapse required for the higher cost of ice rentals at the 4 pad to be absorbed by the local market.

It is therefore recommended that supplemental research be conducted when the 2011/12 ice booking schedules have been completed in late August or early September. This information should provide a more accurate assessment of the longer term demand situation as the impact of many of the above factors will have become evident.

In the meantime the following observations are supported by current data.

Based on school registrations, the number of children in HRM has continued to decline with an additional loss of almost 3,200 children since 2006. The highest single area of decline was in the Cole Harbour High family of schools with 669 fewer children registered in 2011 as compared with 2006.

Fewer operating hours are defined as Prime Time in 2011 as compared with 2007 or 2001. In 2011 Prime Time hours were 48 hours per week while in 2007 they totalled 57 hours, and in 2001, 67 hours.

Fewer operating hours are defined as Prime Time in 2011 as compared with 2007 or 2001. In 2011 Prime Time hours were 48 hours per week while in 2007 they totalled 57 hours, and in 2001, 67 hours.

Fewer operating hours are defined as Prime Time in 2011 as compared with 2007 or 2001. In 2011 Prime Time hours were 48 hours per week while in 2007 they totalled 57 hours, and in 2001, 67 hours.

The percentage of Prime Time use has declined from 100% to 99% since 2007. There are currently 15 hours of unused Prime Time among the 20 facilities analyzed.

The percentage of Fringe Time use has declined between 2007 and 2011 from 75% to 60%. There are currently 332 hours of unused fringe time available among the 20 facilities analyzed.

If demand remains unchanged, there could be at least 39 hours of excess Prime Time ice in the 2011-2012 ice season with 26 ice surfaces in operation.

Lower utilization levels coupled with fewer hours defined as Prime Time reduces the amount of revenue generated by arenas. This compromises operating efficiency and increases net operating costs to owners.

There is an unmet demand for learn to skate lessons which could grow as a result of increased interest in skating generated by the Oval.

The biggest impact of the BMO Centre's opening in terms of service has been on the Bedford Minor Hockey Association with 130 hours/wk. in 2 facilities instead of 8, in Prime and Late Afternoon time slots.

Ice access for Ringette and Women's Hockey has significantly improved with a total increase of 30 hours per week and more convenient times, however access is more expensive.

## **1.0 Introduction**

The purpose of this research was to determine what impact the opening of the BMO Centre has had on ice demand in the Halifax Regional Municipality, and what other factors, if any, have emerged that would impact on long term ice demand since the update of the original 2001 study was completed in May 2009.

## **2.0 Methodology**

Arena operators were asked to provide copies of an average weekly schedule for the 2010–2011 and 2009-2010 seasons. The goal was to compare ice hour use before and after the addition of the 4 ice surfaces at the BMO Centre. Operators were also asked to provide a definition of ice hours – Prime/Non-Prime, and current ice rental rates.

Minor Sport organizations were contacted to request current registration information.

Information was collected on Learn to Skate programs hosted by HRM and by local Figure Skating Clubs.

School registration information was obtained from the Halifax Regional School Board website.

## **3.0 Results**

It was not possible to obtain most of the requested information from arena operators. The majority could not provide sample 2009/10 schedules and 4 did not provide 2010/11 information at the level of detail necessary for analysis. Therefore the 2007 study on arena bookings conducted by HRM staff was used to provide a comparison. This information indicated, by operating hour, if a facility was in use but did not provide any information of the type of use. The operating schedules of fifteen facilities from the 2007 study and 20 current facilities were analyzed. Facilities excluded were Centennial and Metro Centre as they did not provide useable data for 2011, Shearwater and Shannon as the schedule information was not consistent, and Dalhousie and St. Mary's as use levels were influenced by in house programming as opposed to local demand.



## 4.0 Research

### 4.1 School Enrolments

Since there has been no census since 2006 and since subsequent population estimates do not provide data by area or age group, school enrolments provided the only available information about the current size of one of the key market groups for ice activities. Enrolment data from 2006 to 2010 was available on the Halifax Regional School Board website by school. An analysis of that data revealed that the total number of children in HRM schools decreased by 3,191 or 5.8% between 2006 and 2010. It was not possible to do a direct comparison with census data in the previous study, nor was it possible to relate the school data to Minor Hockey boundaries.

The data collected from the website was organized into school families and is presented in Table 1. Based on school families, the area with the greatest net decrease was the Cole Harbour High family of schools with 669 fewer children registered in 2010 as compared with 2006. The Charles P Allen family of schools had the greatest net increase with 357 more children registered.

<b>Table 1 School Enrolments by School Families</b>				
	2010	2006		
CP Allen	5,206	4,849	357	7.4%
Sir John A MacDonald	3,988	3,933	55	1.4%
Lockview	3,764	3,754	10	0.3%
Halifax West	5,804	5,856	(52)	-0.9%
Citadel	5,029	5,142	(113)	-2.2%
Millwood	2,445	2,559	(114)	-4.5%
Prince Andrew	3,954	4,297	(343)	-8.0%
Dartmouth High	3,733	4,117	(384)	-9.3%
JL Iisley	3,451	3,860	(409)	-10.6%
Eastern Shore	2,457	2,792	(335)	-12.0%
Mus Rural	667	765	(98)	-12.8%
Auburn Drive	3,675	4,221	(546)	-12.9%
Sackville	3,091	3,557	(466)	-13.1%
Cole Harbour	3,783	4,452	(669)	-15.0%
Duncan MacMillan	395	479	(84)	-17.5%
	51,442	54,633	(3,191)	-5.8%

By general area, the greatest decrease was in Dartmouth/Cole Harbour area with 1,942 or 11.4% fewer children. The only area with a net increase was Bedford/Tantallon with 412 or 4.7% more children registered in 2010 as compared with 2006. See Table 2.

<b>Table 2 School Enrolments by General Area</b>				
	2010	2006		
CP Allen	5,206	4,849	357	7.4%
Sir John A MacDonald	3,988	3,933	55	1.4%
<b>Subttl Bedford/Tantallon</b>	9,194	8,782	412	4.7%
Lockview	3,764	3,754	10	0.3%
Millwood	2,445	2,559	(114)	-4.5%
Sackville	3,091	3,557	(466)	-13.1%
<b>Subttl Sackville/Waverly</b>	9,300	9,870	(570)	-5.8%
Halifax West	5,804	5,856	(52)	-0.9%
Citadel	5,029	5,142	(113)	-2.2%
JL Iisley	3,451	3,860	(409)	-10.6%
<b>Subttl Halifax</b>	14,284	14,858	(574)	-3.9%
Prince Andrew	3,954	4,297	(343)	-8.0%
Dartmouth High	3,733	4,117	(384)	-9.3%
Auburn Drive	3,675	4,221	(546)	-12.9%
Cole Harbour	3,783	4,452	(669)	-15.0%
<b>Subttl Dartmouth</b>	15,145	17,087	(1,942)	-11.4%
Eastern Shore	2,457	2,792	(335)	-12.0%
Mus Rural	667	765	(98)	-12.8%
Duncan MacMillan	395	479	(84)	-17.5%
<b>Subttl Mus/East Shore</b>	3,519	4,036	(517)	-12.8%
	51,442	54,633	(3,191)	-5.8%

**Note:** School enrolments in the growth areas of Tantallon/Hammonds Plains/Bedford peaked in 2009 and recorded a modest decline of 55 students in 2010.

This information supports the trends discussed in the 2009 report. In general, the Dartmouth/Cole Harbour/Eastern Shore areas are continuing a significant decline in terms of school age children while the Bedford/Tantallon areas have continued to increase. Halifax/Sackville are declining but at a slower rate.

Unless significant in migration occurs, it can be expected that the number of children in HRM will continue to decline as the overall aging of the population continues.

## 4.3 Ice Hour Definitions

A review of current ice hour definitions revealed that there is no consensus among the facilities as to what constitutes Prime Time. However, after a careful review some patterns did emerge.

As observed in the original study, the definition of what is Prime Time appears to depend on how much demand a particular facility is experiencing. More demand means that more hours are defined as Prime Time, and less demand, fewer hours are defined as Prime Time. The definition of Prime Time generally has been changing since 2001.

In the 2007 analysis of ice use, Prime Time was defined as 6:00 PM to 11:00 PM Monday to Friday and 7:00 AM to 11:00 PM Saturday and Sunday, for a total of 57 hours, while Shoulder (Fringe) was defined as 4:00 PM – 6:00 PM and 11:00 PM – 12:00 AM Monday– Friday and 11:00 PM – 2:00 AM Saturday and Sunday. Daytime hours (Non-Prime) were anything before 4:00 PM Monday to Friday.

In the 2001 study, Prime Time among 12 participating facilities (institutional facilities such as St. Mary's, Dalhousie, Shearwater and Shannon Park excluded) averaged 67 hours per week with a high of 76 hours and a low of 65 hours.

For the purposes of this study, ice hours were grouped into Prime Time: 6:00 PM –10:00 PM Monday – Friday, and 8:00 AM – 10:00 PM on Saturday and Sunday for a total of 48 Prime Time hours per week. A total of 38 hours were defined as Fringe. Fringe hours include Early Morning, Late Afternoon and Late Evening. Early Morning hours were defined as 6:00 AM to 8:00 AM, 7 days per week, Late Evening were 10:00 PM to midnight, 7 days per week and Late Afternoon were 4:00 PM – 6:00 PM Monday to Friday. Non-Prime hours were everything else. See Table 3.

Note: The Devonshire arena in Halifax only operates a partial schedule with no Non-Prime or Early Morning weekday hours available.

The decrease in Prime Time designation has implications for the net operating results for arena facilities as revenue generation capabilities are being reduced.

**Table 3 Definitions**

	2011	2007
<b>Prime/Peak</b>		
Weekdays	6:00 PM - 10:00 PM	6:00 PM - 11:00 PM
Weekends	8:00 AM - 10:00 PM	7:00 AM - 11:00 PM
Total Hours	48	57
<b>Fringe/Shoulder</b>		
All	6:00 AM - 8:00 AM	
Weekdays	4:00 PM - 6:00 PM	4:00 PM - 6:00 PM
All	10:00 PM - 12:00 AM	11:00 PM - 2:00 AM
Total Hours	38	31

## 4.4 Ice Rental Rates

There is a wide variety of ice rental rates in HRM. Some facilities offer a discount for Minor Sport while others do not. Regular Prime Time hourly rates range from a high of \$230 at the BMO Centre to a low of \$154 at Devonshire. Non-Prime rates range from \$130 at the St. Margaret's Centre to \$75 in Eastern Shore.

Subsidies for Minor Sport groups aside, perhaps the best way to identify how much demand there is for ice is to review the pricing structure. For example, at Devonshire, Bowles and Gray it appears that there is a lack of demand on Saturday evenings as ice from 8:00 PM to 10:00 PM is reduced in price.

Ice rentals before 9:30 AM weekdays are discouraged with a \$150.00 surcharge at Gray and Bowles.

## 4.5 Ice Utilization Comparison 2011/2007

### 4.5.1 Methodology

It was not possible to obtain the requested information from all of the facilities. Therefore the analysis has been limited to the 2010 – 2011 season. These were compared with ice hour use from the 2007 analysis done by HRM staff. The comparison has some challenges in that ice hour use in 2007 was under stress as a result of the abrupt closure of the Akerley facility. Institutional facilities (St. Mary's, Dalhousie, Shannon, Shearwater), and Centennial and Metro Centre (no data for 2011) were omitted from this analysis to provide a uniform basis of comparison.

The main focus of this analysis is on Prime Time and Fringe hour use. The 2011 data for Non-Prime time cannot be compared with 2007 since there is no definition of ice use other than booked and open for that year. Some of the time indicated as In Use in 2007 would have been ice maintenance. Since ice maintenance is not done during Prime or Fringe periods, it was concluded that the 2007 data could be used for comparison purposes.

## 4.5.2 Results

Overall ice utilization in Prime and Fringe periods dropped from 89% in 2007 to 82% in 2011. Prime Time ice utilization dropped from 100% in 2007 to 99% in 2011 with 15 hours (or more) of Prime Time ice unused per week.

Demand/use levels for Fringe hours can be regarded as giving an indication of overall demand levels for ice time and of demand levels in specific areas. In 2011, 60% of Fringe hours were in use while in 2007, 75% of Fringe hours were used. See Table 4.

<b>Table 4 Utilization of Capacity</b>		
	2011	2007
# of ice sheets	20	15
Prime Time	99%	100%
Fringe total	60%	75%
Early morning	39%	61%
Late Afternoon	91%	99%
Late Evening	59%	74%
Prime/Fringe	82%	89%

In 2011 Fringe use was highest at Sportsplex at 93% and Cole Harbour at 90% while Fringe hour use at the BMO Centre was lowest at 26% and second lowest at the Rocky Lake Dome at 47%. In 2007, Sportsplex fringe utilization was 91% and Cole Harbour was 82%. The lowest Fringe utilization recorded in 2007 was 53% at the Fountain sheet in St. Margaret's Bay. In 2011 Fountain was at 71%. See Table 5.

<b>Table 5 Fringe Utilization</b>		
	2011	2007
Highest 2011		
Sportsplex	93%	91%
Cole Harbour	90%	82%
Lowest 2011		
BMO	26%	n/a
Dome	47%	n/a
Lowest 2007		
St. Margaret's Fountain	71%	53%

## 4.6 Minor Sport Registration

### 4.5.1 Minor Hockey

Minor hockey registration tends to fluctuate from year to year, however trends can be seen over multiple years. TASA has seen a steady rise over the last 10 years. Dartmouth peaked in 2004/05 and has been generally declining.

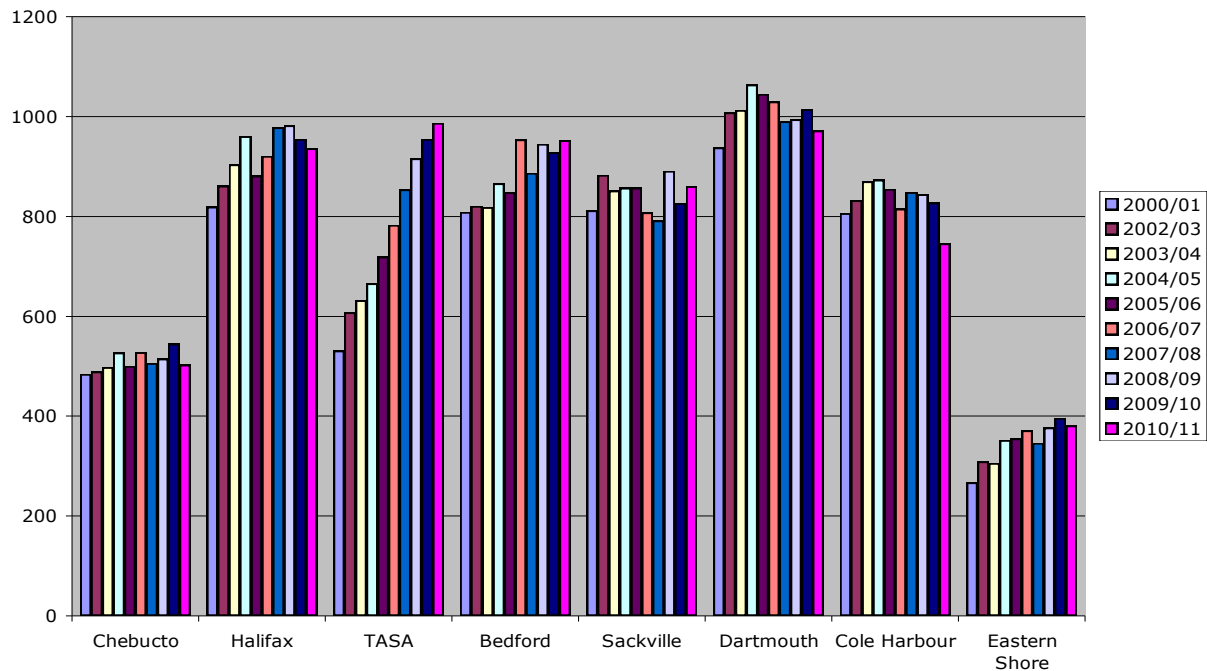
Table 6 Compares Minor Hockey registrations between 2009/10 and 2010/2011 while Fig 1R2 show the trends over a ten year period.

No significant increases in registrations were recorded in 2010/2011 as compared with the previous year and it would be premature to expect that the additional ice access provide by the BMO Centre would impact registrations in the 2010/2011 season. However, another operative factor may be the declining target market population. Cole Harbour recorded a significant decrease in registrations. This decline is being reviewed by Hockey Nova Scotia.

It is interesting to note that HRM Minor Hockey associations lag significantly behind the rest of the province in terms of female participation. The provincial rate as a whole is currently 15.9% while that for HRM is 12%. With HRM removed, the provincial participation rate is 18%. Part of the reason for the lower rate may be Ringette, which is very active and growing in HRM, see the following section.

Table 6 Minor Hockey Registrations									
	2009/10				2010/11				% var to 09/10
	Total	M	F	% F	Total	M	F	% F	
Eastern Shore	396	311	85	21.5%	381	303	78	20.5%	-3.8%
Cole Harbour	827	711	116	14.0%	746	654	92	12.3%	-9.8%
Dartmouth	1,014	888	126	12.4%	972	852	120	12.3%	-4.1%
Dart Total	2,237	1,910	327	14.6%	2,099	1,809	290	13.8%	-6.2%
Sackville	826	745	81	9.8%	860	780	80	9.3%	4.1%
Bedford	928	842	86	9.3%	952	852	100	10.5%	2.6%
TASA	955	857	98	10.3%	987	860	127	12.9%	3.4%
Halifax	955	824	131	13.7%	936	807	129	13.8%	-2.0%
Chebucto	545	491	54	9.9%	503	467	36	7.2%	-7.7%
Halifax Total	4,209	3,759	450	10.7%	4,238	3,766	472	11.1%	0.7%
Total HRM	6,446	5,669	777	12.1%	6,337	5,575	762	12.0%	-1.7%
Province	18,141	15,285	2,856	15.7%	17,777	14,959	2,818	15.9%	-2.0%
Province less HRM	11,695	9,616	2,079	17.8%	11,440	9,384	2,056	18.0%	

**Fig 1R2 Minor Hockey Registrations**



#### 4.5.2 Ringette

Ringette registration has been steadily increasing over the last 5 years. See Table 7. Total ice rented per week by Ringette in HRM increased by 23 hours per week from 69 hours in 2009/10 to 92 hours in 2010/11 and additional ice is expected to be rented in 2011/12.

**Table 7 Ringette Registrations HRM**

		% increase to 05/06
2010/11	1009	41%
2009/10	953	33%
2008/09	903	26%
2007/08	794	11%
2006/07	777	8%
2005/06	717	

According to a Ringette Nova Scotia representative, Ringette Nova Scotia ice time increased from 5.5 hrs. in the previous year(s) to 13.5 hrs. in 2010/2011 because of the BMO Centre. RNS rents ice for younger age group development programs and Nova Scotia provincial team programs.

The individual local associations had the same hours as previous season(s) plus the BMO Centre hours they acquired this year. A number of the associations, Halifax, St. Margaret's, Sackville and Halifax Chebucto, are looking for more ice as a result of the further growth they have experienced to date and expect next season. If there is anything the associations would like to change with their ice times now, it would be to have them in their local community arenas. Cole Harbour didn't take some BMO ice because of the time and nights it was offered and the distance they had to travel to get to the BMO centre with younger players.

Outside of HRM, Ringette is active mainly in the Annapolis Valley, and also in a small area in Cape Breton, Cumberland County/Oxford and Antigonish/St. FX. Participation numbers outside of the Halifax area and the Valley are low.

### 4.5.3 Speed Skating

The Dartmouth Speed Skating Club has experienced a significant increase in membership over the past couple of years from 19 athletes in 2008/09 to 36 in 2010/2011. See Table 8. Membership is drawn from across HRM.

With the interest generated by the Oval and the Canada Winter Games and the new opportunities for short and long track Speed Skating training provided by the Oval and the re-development of the St. Margaret's Centre, participation in Speed Skating can be expected to increase in the coming years.

<b>Table 8 Dartmouth Speed Skating Club Membership</b>					
	<u>2006-07</u>	<u>2007-08</u>	<u>2008-09</u>	<u>2009-10</u>	<u>2010-11</u>
<b>Members by Group</b>					
<b>Male</b>					
Fundamental 6-9	4	2	1	7	3
Learning to Train 10-12	1	3	5	4	5
Training to Train 13-15	3	2	1	5	5
Junior 16-18	1	2		2	1
Senior 19-29		1		1	1
Master 30+			1	4	5
<b>Total Males</b>	<b>9</b>	<b>10</b>	<b>8</b>	<b>23</b>	<b>20</b>
<b>Female</b>					
Fundamental 6-8		1		1	
Learning to Train 9-11	2	2	1	2	5
Training to Train 12-14	4	3	7	6	4
Junior 15-18	1		1	3	4
Senior 19-29		1	2	1	1
Master 30+				1	2
<b>Total Females</b>	<b>7</b>	<b>7</b>	<b>11</b>	<b>14</b>	<b>16</b>
<b>Total Athlete Membership</b>	<b>16</b>	<b>17</b>	<b>19</b>	<b>37</b>	<b>36</b>



#### **4.5.4 Figure Skating**

Information not yet received.

### **4.6 Women's Hockey**

According to a representative of Women's Hockey, the league added four new ice times per week (6 hours) at the BMO Centre this year. This allowed the league to grow from 16 teams in 2009/10 to 19 teams in 2010/11. The league had over 400 registered players and coaches this year.

In 2009/10 they had 6 weekly 90 minute ice times in HRM, now they have 10. The BMO ice times are convenient early evening times while most of the other ice times are a 9:00 PM or later start.

The league is expected to grow to at least 22 or 23 teams next year, and possibly 24. Three new teams are located in Truro, Chester and Wolfville. They will play half their games in their hometowns. One new beginner-type team is expected in Halifax plus another team has so many players that they want to split and form 2 teams.

The cost of the BMO is the main reason they have not taken up more ice time there. They would like to trade in a 10:00 PM Friday night slot for another time at the BMO Centre, but at almost \$400 per 90 minute game, it's too much for the teams. This past season was their most expensive yet by far.

The league held their 30 game playoff tournament at BMO Centre in early April. Next year, with an estimated 23 teams, they will need 38 ice times (57 hours) at total cost of over \$15,000.

Most importantly, they are interested to know about the progress of the plan to extend the BMO Centre's fair Access Plan to other HRM owned arenas. They think it is unfair that their league's access to ice comes at a higher premium than the average prices paid by men's leagues across the municipality.

### **4.7 Learn to Skate**

Learn to Skate programs are operated directly by HRM in 3 facilities and by Skating Clubs in 6 more. Total participation in 2010/11 is estimated at 3,301 with 700 children on the waiting list for HRM programs. According to a Skate Nova Scotia representative there are waiting lists for their programs as well. See Table 9. Note: These figures do not include the Learn to Skate program at the Dartmouth Sportsplex - information is currently being sought.

With the additional interest in skating generated by the Oval, it can be expected that demand for Learn to Skate programs in HRM will continue to increase.

**Table 9 Learn to Skate 2010/11**

	Registrations	Waiting List
HRM		
Cole Harbour	895	157
Forum	1,040	441
Spryfield	257	102
Skating Clubs		
Bedford	163	
Dartmouth	168	
Halifax	176	
Sackville	302	
Shearwater	60	
St. Margaret's	240	
Total	3,301	700

## 5.0 Analysis

### 5.1 Ice Use

#### 5.1.1 Prime time

There are currently approximately 15 hours of unused Prime Time ice among the 20 facilities analyzed. Shearwater is projected to be back in service for the start of the 2011/2012 ice season. This should free up approximately 15 hours of Prime Time ice at the LeBrun Centre that was allocated to the Dartmouth Whalers. An additional 8 hours will likely transfer from the Dome to the new East Hants facility as well as 1 hour at the BMO Centre. If ice demand remained unchanged, there could be 39 hours, or more, of unused Prime Time ice in the 2011/2012 ice season, depending on how many hours are available in the 4 facilities that did not provide useable data. See Table 10

#### 5.1.2 Fringe

There are currently 332 hours of unused Fringe ice time among the 20 facilities analyzed. Of these, 21 hours were late afternoon 4:00 – 6:00 PM, 122 were late evening 10:00 – 11:00 PM and 189 were early morning 6:00 – 8:00 AM. See Table 10

<b>Table 10 Unused Hours</b>		
	2011	2007
# of ice sheets	20	15
Prime Time	15.0	0.5
Fringe total	332.0	137.0
Early morning	189.0	80.5
Late Afternoon	21.0	1.5
Late Evening	122.0	55.0
Total Available	347.0	137.5

### **5.1.3 Use by area**

The high utilization rates of Fringe time at Sportsplex and Cole Harbour and the low utilization rates at BMO and the Dome appear to indicate an imbalance of ice access between the Dartmouth and Halifax/Bedford/Sackville areas. However the pricing policy which places a premium on early morning ice rentals at Gray and Bowles would tend to artificially depress early morning use in these facilities. Fringe use levels at Bowles and Gray were 58% and 55% respectively, which was below the average for the facilities in the analysis. Further investigation of the pricing policy and actual use levels needs to be undertaken before a definitive analysis can be developed.

### **5.1.4 Facility Operations Implications**

Lower utilization levels coupled with fewer hours defined as Prime Time reduces the amount of revenue generated by arenas. This compromises operating efficiency and increases net operating costs to owners.

## **5.2 Service Improvements**

The biggest impact of the BMO Centre's opening in terms of service has been on the Bedford Minor Hockey Association. Prior to 2010/11 season, Bedford MH was renting space in 8 different facilities in Prime Time, Early Morning, Late Afternoon and Late Evening time slots. In 2010/11 facility rentals were limited to the BMO Centre and the Rocky Lake Dome. Time slots were primarily in Prime Time and Late Afternoon with only 1 Early Morning and no Late Evening time slots. Total time rented in 2010/11 was approximately 130 hours per week.

## **5.3 Access Improvements**

The biggest impact of the BMO Centre's opening in terms of access has been on Ringette and Women's Hockey. Ice access for Ringette and Women's Hockey has significantly improved with a total increase of 30 hours per week and more convenient times, however access is more expensive.

Additional ice time has been provided for a variety of Minor Hockey organizations totalling 45.5 hours per week. TASA is the single largest user among this group with 10 hours, followed by Halifax Hawks with 7 hours per week.

## **5.4 Schedule Analysis**

### **5.4.1 BMO Centre**

The BMO Centre is in its first few months of operation. It will take some time for the operation to fully develop. The late start this season probably had an impact on customer participation and it can be expected that capacity utilization will improve in the coming seasons.

### **5.4.2 Diversified Programming**

Cole Harbour and Dartmouth Sportsplex have the most diversified programming of all of the HRM arena facilities and they are the most heavily used facilities in HRM. Their schedules include learn to skate programs during late afternoon and prime time hours, 6 hours of recreational skating during Prime Time each week and adult hockey leagues. The Sportsplex tends to be more game oriented due to its seating capacity and focuses on adult hockey while Cole Harbour has a strong Minor Hockey program.

## **5.5 Other Factors**

### **5.5.1 Pricing Policies**

The wide range of prices for ice, even within HRM owned facilities, coupled with additional capacity has created a situation where ice users can shop for the best price and there are indications that users are willing to use older facilities during less convenient times to access lower prices.

### **5.5.2 Indoor Ice Surface Increases**

In addition to the BMO centre, ice capacity in HRM increased through the re-development of the St Margaret's Bay Centre's Smith ice sheet to Olympic size. This increase in ice surface can have an impact depending upon how it is programmed. For example, if used for learn to skate, it could increase the number of children who could be taught at one time which could address some of the demand for learn to skate without adding another ice surface. The increased capacity could accommodate shared practices for older hockey teams as well as cross ice games for the youngest players.

The new East Hants facility will have an impact on HRM indoor ice use as at least 9 hours of Prime Time ice will likely transfer to this facility once it is in operation.

### 5.5.3 The Oval

The Oval has had a huge impact on HRM recreational skating and its impact on indoor ice demand has yet to be determined. The interest generated in skating could increase demand for learn to skate programs while decreasing demand for paid recreational skating in the indoor facilities. St. Mary's University has experienced a decline in recreational skating and is considering cancelling one of its sessions.

However, it would be premature to conclude that the Oval will address all of the latent recreational skating demand in HRM. Access to local facilities for recreational skating may continue to be a challenge especially during Prime Time.

## 6.0 Summary

A number of factors have led the consultant to advise that it would be premature to draw any definitive conclusions about long term ice demand at this time. These factors include:

- the late season opening date of the BMO Centre (November 2010),
- the temporary closure of the Shearwater arena,
- the re-development of St. Margaret's Bay Smith sheet to an Olympic ice surface,
- the time lapse required for additional ice capacity to be absorbed by user groups,
- the opening of the Oval,
- the impending opening of a second ice surface at the East Hants facility,
- the time lapse required for the higher cost of ice rentals at the 4 pad to be absorbed by the local market.

It is therefore recommended that supplemental research be conducted when the 2011/12 ice booking schedules have been completed in late August or early September. This information should provide a more accurate assessment of the longer term demand situation as the impact of many of the above factors will have become evident.

## **APPENDIX D1**

Arena Operations Assessment, Nov. 2010 – Oct. 2011 12/30/11, Catherine Oliver

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Halifax Regional Municipality  
Arena Operations Assessment Report

**HRM**  
**Arena Operations Assessment**  
**November 2010 – October 2011**  
**Report**  
December 30, 2011

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

## Executive Summary

The purpose of this research was to compare the operation of the BMO Centre with that of the four HRM operated facilities over the 12 month period since the BMO Centre opened. This assessment could not have been developed without the cooperation of HRM and BMO staff. Given the time frame for this research, the information contained in this report may not be complete.

A detailed analysis of both direct and indirect expenses was conducted by the Budget and Financial Analysis department of HRM. Due to differences between the accounting systems and operating schedules in HRM and the BMO Centre, it was concluded that neither a monthly nor seasonal comparison between the two would be possible. Therefore the comparative analysis has focussed on the total 12 month period.

The BMO Centre is in its first year of operation and as a result can be expected to experience increasing revenues and expenses as the operation matures. The first year of operation presented additional challenges as the volleyball courts did not open until August and the liquor licence was not granted until September.

Based on the information collected to date, total capital and direct and indirect operating costs for the 4 HRM single pad facilities was \$1,822,000 against revenues of \$1,155,000 for a net operating deficit of \$670,000, representing a recovery of 63% of expenses.

Including management fees and capital reserve, BMO expenses totalled \$1,868,000 against revenues of \$1,677,000 for a net annual deficit of \$191,000 representing a recovery of 90% of expenses.

Total revenue generating hours for the BMO Centre were 9,989 as compared with 9,931 for the 4 HRM facilities. Average revenue per ice hour used was \$160.00 for BMO as compared with \$124.00 for the HRM facilities. This difference is a result of higher rental fees and fewer non-prime time hours used at BMO.

These results should not be regarded as being representative of future performance. A number of factors suggest that the second year net results for the BMO Centre will be considerably improved. These include the typical historical performances of first year operations, increased utilization of shoulder hours indicated in the current BMO winter schedule, additional revenue from the food and beverage service and proposed changes in the operating format for HRM facilities.

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

## 1.0 Introduction

The purpose of this research was to compare the operation of the BMO Centre with that of the four HRM operated facilities over the 12 month period since the BMO Centre opened. It should be noted that although the HRM system has 26 ice sheets only 25 have been in operation during that period.

## 2.0 Methodology

In order to develop a basis for comparison between the BMO Centre and the HRM facilities, it was necessary to collect all of the revenues and expenses associated with the operation of the HRM arenas. Since not all revenues and expenses are allocated to the same budget areas, and since the Lebrun Centre includes other types of spaces, it took a fair amount of time to accumulate and assess the data.

The basis of comparison was originally intended to be monthly revenues, expenses and operating hours. Actual results for BMO were collected from the monthly financial packages submitted to the Halifax Regional Municipality and from monthly hourly use information provided by BMO management. In order to provide a basis for comparison, revenue and expense categories from BMO financial statements were used as a template for the gathering of information for the HRM facilities.

The information for HRM was initially generated from the SAP system and from hourly use estimates provided by Sport and Safety Services. Anomalies in this information indicated that further investigation was warranted.

More detailed information on hourly use and revenues was generated by Sport and Safety Services from the Class program and from other internal reports. A detailed analysis of both direct and indirect expenses was conducted by the Budget and Financial Analysis Department of HRM.

After a comparison and discussion of results it was concluded that the revenue from the Class program was more accurate on a monthly basis as it corresponded to the number of hours used. Despite attempts to allocate expenses to the months in which they were incurred, the monthly expense results for HRM facilities continued to vary to the extent that the consultant concluded that a monthly or seasonal comparison with BMO would not be advisable. In addition, some of the fluctuations in monthly expense may be due to capital expenses.

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

Average weekly operating schedules for winter 2010/2011 and 2011/12 were collected from BMO and from HRM for 2010/2011. For 2011/12, average weekly operating schedules for the HRM facilities were developed from Class program reports and checked against hours available for rent posted on the HRM website.

Building areas by square foot were obtained from HRM Facilities and Asset Management. As the figure given for the BMO Centre appeared to be usually high, the consultants contacted M&R Engineering and the area used in this report is based on a CAD take off from construction drawings. This was compared with the size of the Mohawk Centre in Hamilton, the building upon which the BMO Centre had been modelled.

The area for Lebrun allocated to the arena was estimated to be 2/3 of the total size of the facility.

<b>Table 1 Facility Areas</b>	
	Sq.ft.
Lebrun at 66%	27,317
Devonshire	20,120
Bowles	27,340
Gray	27,810
Total	102,587
Source: HRM Facilities & Asset Mgmt	
BMO*	144,402
Mohawk**	136,000
*CAD take off M&R Engineering	
** Mohawk website	

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Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

## 3.0 Results

### 3.1 Hours Used

Table 2 provides a summary of ice hours rented and programmed (ice hours used) in the HRM facilities compared with the BMO 4 pad. For the 12 month period BMO used 847 hours more ice hours than the HRM facilities due to operating more shoulder season and summer ice. During the first winter season BMO used 1,448 or 22% fewer ice hours than HRM facilities. BMO's ice utilization in October 2011 improved considerably.

Table 2 Ice Hours Used								
	Winter Nov 10 - Mar 11	Apr-11	May-11	Jun-11	Summer 11 Jul/Aug	Sep-11	Oct-11	Total
BMO	5,221	838	675	278	929	507	1,205	9,653
Lebrun	1,794	43				90	315	2,242
Devonshire	1,380	23				-	244	1,646
Gray	1,701	231	105			171	354	2,561
Bowles	1,794	41	-			165	358	2,357
Total	6,669	338	105	-	-	425	1,270	8,806
Var	(1,448) -22%	500 148%	570 546%	278	929	82 19%	(65) -5%	847 10%

Table 3 and Figure 1 provide a detailed analysis of hours used by type of activity. BMO's adult ice rentals were about double that of the HRM facilities. Differences may exist in what is defined as General Ice between the two organizations that make it difficult to develop definitive comparisons. Some "General Ice" rentals at BMO are Adult (e.g. corporate rentals) and some are Children (e.g. Birthday parties). More investigation of this issue may be required.

C.E. Oliver  
Dec 30, 2011

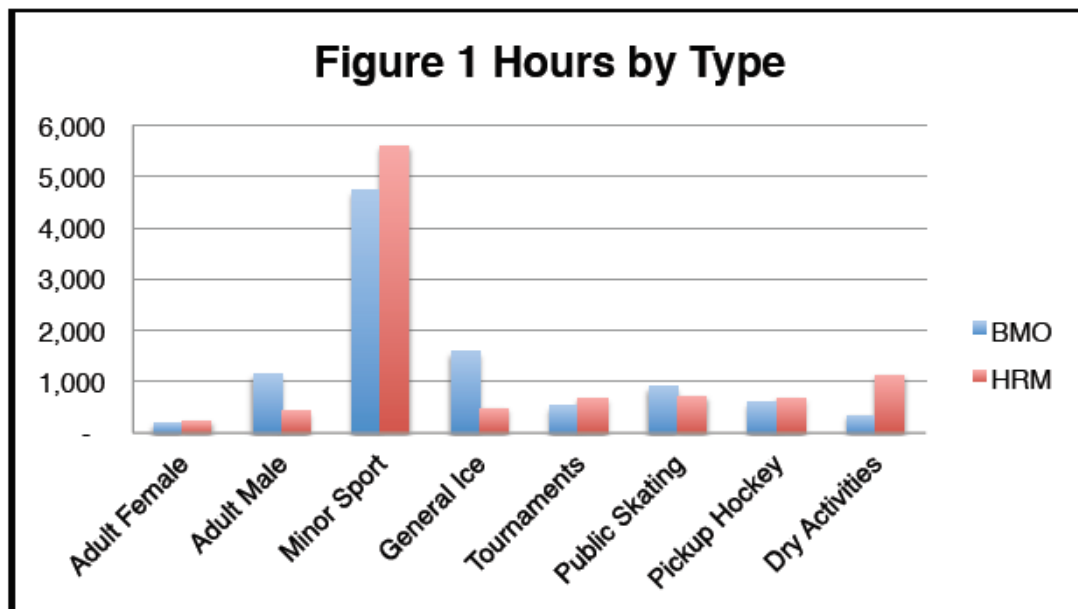
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Arena Operations Assessment Report

**Table 3 Hours by Type**

	BMO		HRM		var BMO/HRM	
Adult Female	195	2%	228	3%	(34)	-15%
Adult Male	1,134	12%	432	5%	702	163%
Subttl Adults	1,329	14%	660	7%	669	101%
Minor Sport	4,721	49%	5,594	64%	(873)	-16%
General Ice	1,581	16%	477	5%	1,104	231%
Tournaments	519	5%	681	8%	(162)	-24%
Public Skating	906	9%	710	8%	196	28%
Pick up Hockey	597	6%	684	8%	(87)	-13%
Total Ice Hours	9,653	100%	8,806	100%	847	10%
Dry Activities	337		1,126			
Total	9,989		9,931			

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report



### 3.2 Average Winter Week Schedule

Table 4 compares the utilization rates for HRM facilities and BMO for a sample winter weekly schedule in 2010/2011. The number of available hours is lower in HRM facilities since Devonshire operates on a reduced schedule.

The definitions of the various categories were developed for the Long Term Arena Strategy Background report in March 2011 and differ somewhat from those used by BMO.

Based on this information BMO had an average of 231 unsold ice hours during an average winter week during its first winter of operation as compared with 126 for the HRM facilities. The difference was due to higher fringe and non-prime utilization in HRM facilities.

A similar comparison for the current winter schedule reveals a somewhat different picture. See Table 4a. In the current season, BMO is using an average of 37 more hours per week, a 15% increase over the previous winter season; however it still lags behind the HRM facilities.

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

<b>Table 4 Schedule Comparison</b>						
<b>WINTER 2010 - 2011 Sample Week</b>						
	<b>Devon</b>	<b>Lebrun</b>	<b>Bowles</b>	<b>Gray</b>	<b>Total</b>	<b>BMO</b>
<b>Capacity</b>						
Prime	48	48	48	48	192	192
Fringe	38	38	38	38	152	152
EM	14	14	14	14	56	56
LA	10	10	10	10	40	40
LE	14	14	14	14	56	56
Prime/Fringe	86	86	86	86	344	344
Non Prime	0	35	35	35	105	140
<b>Total</b>	<b>86</b>	<b>121</b>	<b>121</b>	<b>121</b>	<b>449</b>	<b>484</b>
<b>Used</b>						
Prime	48	48	48	48	192	180.5
Fringe Subttl	21.5	19	22	21	83.5	39.75
EM	2	3	3	4	12	3
LA	10	9	10	9	38	25.75
LE	9.5	7	9	8	33.5	11
Prime/Fringe	69.5	67	70	69	275.5	220.3
Non Prime	0	20.5	17	10	47.5	32.0
<b>Total</b>	<b>69.5</b>	<b>87.5</b>	<b>87</b>	<b>79</b>	<b>323</b>	<b>252.3</b>
<b>% of capacity</b>						
Prime	100%	100%	100%	100%	100%	94%
Fringe (all)	57%	50%	58%	55%	55%	26%
EM	14%	21%	21%	29%	21%	5%
LA	100%	90%	100%	90%	95%	64%
LE	68%	50%	64%	57%	60%	20%
Prime/Fringe	81%	78%	81%	80%	80%	64%
Non Prime		59%	49%	29%	45%	23%
<b>Total</b>	<b>81%</b>	<b>72%</b>	<b>72%</b>	<b>65%</b>	<b>72%</b>	<b>52%</b>
<b>Net Available</b>						
Prime	-	-	-	-	-	11.5
Fringe (all)	16.5	19.0	16.0	17.0	68.5	112.3
EM	12.0	11.0	11.0	10.0	44.0	53.0
LA	-	1.0	-	1.0	2.0	14.3
LE	4.5	7.0	5.0	6.0	22.5	45.0
Prime/Fringe	16.5	19.0	16.0	17.0	68.5	123.8
Non Prime	-	14.5	18.0	25.0	57.5	108.0
<b>Total</b>	<b>16.5</b>	<b>33.5</b>	<b>34.0</b>	<b>42.0</b>	<b>126.0</b>	<b>231.8</b>

C.E. Oliver  
Dec 30, 2011



Halifax Regional Municipality  
Arena Operations Assessment Report

<b>Table 4a Schedule Comparison</b>						
<b>WINTER 2011 - 2012 Sample Week</b>						
	<b>Devon</b>	<b>Lebrun</b>	<b>Bowles</b>	<b>Gray</b>	<b>Total</b>	<b>BMO</b>
<b>Capacity</b>						
Prime	46	48	48	48	190	192
Fringe	31	38	38	38	145	152
EM	14	14	14	14	56	56
LA	8	10	10	10	38	40
LE	9	14	14	14	51	56
Prime/Fringe	77	86	86	86	335	344
Non Prime	0	35	35	35	105	140
<b>Total</b>	<b>77</b>	<b>121</b>	<b>121</b>	<b>121</b>	<b>440</b>	<b>484</b>
<b>Used</b>						
Prime	46	48	48	48	190	183.75
Fringe Subttl	12.5	20	22	20	74.5	66.5
EM	0	2	4	4	10	15.5
LA	8	9	10	8	35	32.25
LE	4.5	9	8	8	29.5	18.75
Prime/Fringe	58.5	68	70	68	264.5	250.25
Non Prime	0	20.5	17	10	47.5	39.25
<b>Total</b>	<b>58.5</b>	<b>88.5</b>	<b>87</b>	<b>78</b>	<b>312</b>	<b>289.5</b>
<b>% of capacity</b>						
Prime	100%	100%	100%	100%	100%	96%
Fringe (all)	40%	53%	58%	53%	51%	44%
EM	0%	14%	29%	29%	18%	28%
LA	100%	90%	100%	80%	92%	81%
LE	50%	64%	57%	57%	58%	33%
Prime/Fringe	76%	79%	81%	79%	79%	73%
Non Prime		59%	49%	29%	45%	28%
<b>Total</b>	<b>76%</b>	<b>73%</b>	<b>72%</b>	<b>64%</b>	<b>71%</b>	<b>60%</b>
<b>Net Available</b>						
Prime	-	-	-	-	-	8.3
Fringe (all)	18.5	18.0	16.0	18.0	70.5	85.5
EM	14.0	12.0	10.0	10.0	46.0	40.5
LA	-	1.0	-	2.0	3.0	7.8
LE	4.5	5.0	6.0	6.0	21.5	37.3
Prime/Fringe	18.5	18.0	16.0	18.0	70.5	93.8
Non Prime	-	14.5	18.0	25.0	57.5	100.8
<b>Total</b>	<b>18.5</b>	<b>32.5</b>	<b>34.0</b>	<b>43.0</b>	<b>128.0</b>	<b>194.5</b>

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

### 3.3 Revenues and Expenses

#### 3.3.1 HRM Facilities

Table 5 summarizes monthly revenues and direct expenses for the 4 HRM facilities. Hours used and square footage were used to assess results on a monthly basis. An initial review of results by facility suggested that the utility costs for Lebrun were understated. Expenses for Lebrun were developed based on the size of the arena as a percentage of the overall facility. At the suggestion of HRM staff, Lebrun utility costs were increased to Devonshire's to bring them in line with those of the other arenas.

Annual repair and maintenance costs exceeded \$100,000 per arena and reflect the costs associated with operating aging facilities. Some of these may be capital related.

Despite attempts to allocate expenses into the months in which they were incurred, the fluctuations among the months were significant. Some of the fluctuation can be attributed to differences in operating schedules and weather. However, even during a relatively stable operating period, fluctuations were still evident. For example, the average cost per hour used for all facilities for the period November 2010 to March 2011 ranged from \$145.50 to \$101.83. Average cost per sq. ft. per month ranged from \$1.99 to \$1.38. Average revenue per hour used exhibited a smaller range from \$122.17 to \$118.17.

**Table 5 HRM Arenas 2010 - 2011**

	November	December	January	February	March	April	May	June	July	August	September	October	TOTAL
Total Ice Revenue	\$170,362	\$141,685	\$169,753	\$159,048	\$161,717	\$45,618	\$15,025	\$0	\$0	\$0	\$61,107	\$163,371	\$1,087,686
Dry Revenues	\$0	\$0	\$0	\$0	\$0	\$3,648	\$17,810	\$19,761	\$11,442	\$3,388	\$90	\$0	\$56,139
Advertising	\$957	\$0	\$900	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,857
Facility Rentals	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$1,673	\$544	\$0	\$0	\$0	\$2,217
Vending Revenue	\$100	\$100	(\$1,030)	\$1,421	\$100	\$0	\$915	\$0	\$0	\$0	\$0	\$0	\$1,605
Misc	\$223	\$345	\$683	\$563	\$0	\$317	\$427	\$0	\$0	\$0	\$0	\$164	\$2,722
<b>TOTAL REVENUES</b>	<b>\$171,642</b>	<b>\$142,130</b>	<b>\$170,306</b>	<b>\$161,032</b>	<b>\$161,817</b>	<b>\$49,583</b>	<b>\$34,177</b>	<b>\$21,434</b>	<b>\$11,986</b>	<b>\$3,388</b>	<b>\$61,197</b>	<b>\$163,535</b>	<b>\$1,152,226</b>
Wages - Front Desk	\$1,011	\$234	\$901	\$1,015	\$2,203	\$0	\$0	\$0	\$5,387	\$1,589	\$1,148	\$1,322	\$14,809
Wages- Plant Mtce	\$134,332	\$82,832	\$74,426	\$64,400	\$80,757	\$27,961	\$67,015	\$44,453	\$34,443	\$49,956	\$67,349	\$65,893	\$793,816
Repairs & Mtce	\$25,443	\$21,627	\$18,929	\$32,227	\$43,374	\$12,637	\$37,661	\$27,796	\$18,071	\$43,676	\$84,943	\$60,285	\$426,667
Utilities	\$42,809	\$44,624	\$47,237	\$55,610	\$49,531	\$41,551	\$19,695	\$14,845	\$11,212	\$9,808	\$24,920	\$43,480	\$405,322
Security	\$1,057	\$0	\$0	\$0	\$0	\$0	\$731	\$8,626	\$0	\$4,002	\$873	\$50	\$15,339
<b>TOTAL DIRECT EXP</b>	<b>\$204,653</b>	<b>\$149,316</b>	<b>\$141,493</b>	<b>\$153,251</b>	<b>\$175,865</b>	<b>\$82,149</b>	<b>\$125,102</b>	<b>\$95,720</b>	<b>\$69,113</b>	<b>\$109,031</b>	<b>\$179,233</b>	<b>\$171,029</b>	<b>\$1,655,953</b>
<b>Net Surplus (Deficit)</b>	<b>(\$33,011)</b>	<b>(\$7,186)</b>	<b>\$28,813</b>	<b>\$7,781</b>	<b>(\$14,048)</b>	<b>(\$32,566)</b>	<b>(\$90,925)</b>	<b>(\$74,286)</b>	<b>(\$57,127)</b>	<b>(\$105,643)</b>	<b>(\$118,036)</b>	<b>(\$7,494)</b>	<b>(\$503,727)</b>
# Ice hours	1,407	1,199	1,390	1,333	1,341	338	105	-	-	-	425	1,270	8,806
# Dry Hours	-	-	-	-	-	70	354	414	218	68	2	-	1,125
<b>Total Hours</b>	<b>1,407</b>	<b>1,199</b>	<b>1,390</b>	<b>1,333</b>	<b>1,341</b>	<b>407</b>	<b>459</b>	<b>414</b>	<b>218</b>	<b>68</b>	<b>427</b>	<b>1,270</b>	<b>9,931</b>
<b>Avg Rev/ice hour</b>	<b>\$121.12</b>	<b>\$118.17</b>	<b>\$122.17</b>	<b>\$119.32</b>	<b>\$120.64</b>	<b>\$135.16</b>	<b>\$143.78</b>				<b>\$143.78</b>	<b>\$128.64</b>	<b>\$123.52</b>
<b>Av Cost/hour</b>	<b>\$145.50</b>	<b>\$124.53</b>	<b>\$101.83</b>	<b>\$114.97</b>	<b>\$131.19</b>	<b>\$201.84</b>	<b>\$272.85</b>	<b>\$231.49</b>	<b>\$317.03</b>	<b>\$1,603.39</b>	<b>\$419.75</b>	<b>\$134.67</b>	<b>\$166.75</b>
<b>Cost/sq.ft.</b>	<b>\$1.99</b>	<b>\$1.46</b>	<b>\$1.38</b>	<b>\$1.49</b>	<b>\$1.71</b>	<b>\$0.80</b>	<b>\$1.22</b>	<b>\$0.93</b>	<b>\$0.67</b>	<b>\$1.06</b>	<b>\$1.75</b>	<b>\$1.67</b>	<b>\$16.14</b>
<b>Utilities/sq.ft</b>	<b>\$0.42</b>	<b>\$0.43</b>	<b>\$0.46</b>	<b>\$0.54</b>	<b>\$0.48</b>	<b>\$0.41</b>	<b>\$0.19</b>	<b>\$0.14</b>	<b>\$0.11</b>	<b>\$0.10</b>	<b>\$0.24</b>	<b>\$0.42</b>	<b>\$3.95</b>

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Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

### **Indirect Costs**

A total of \$108,650 in additional staff costs were identified in scheduling, and in administrative and maintenance supervisory and management positions. Insurance costs of \$20,000 were also identified.

### **Capital**

One capital related item was identified for the Gray Centre totalling \$38,044.

### **Total Costs**

Total Annual Revenue and Expense for the HRM facilities are summarized in Table 6. The total net estimated deficit was \$670,000.

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Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

Pages

**Table 6 HRM Arenas Summary**

	Direct	Indirect	Total
<b>Revenue</b>			
Ice Revenue	\$1,087,686		\$1,087,686
Dry Revenues	\$56,139		\$56,139
Advertising	\$1,857		\$1,857
Facility Rentals	\$2,217		\$2,217
Vending Revenue	\$1,605		\$1,605
Misc	\$2,722		\$2,722
<b>TOTAL REVENUES</b>	<b>\$1,152,226</b>		<b>\$1,152,226</b>
Wages - Front Desk/Adm	\$14,809	\$108,650	\$123,459
Wages- Plant Mtce	\$793,816		\$793,816
Total Staff Costs	\$808,625	\$108,650	\$917,275
Repairs & Mtce/Capital	\$426,667	\$38,044	\$464,711
Insurance		\$20,000	\$20,000
Utilities	\$405,322		\$405,322
Security	\$15,339		\$15,339
<b>TOTAL EXP</b>	<b>\$1,655,953</b>	<b>\$166,694</b>	<b>\$1,822,647</b>
<b>Net Surplus (Deficit)</b>	<b>(\$503,727)</b>		<b>(\$670,421)</b>
<b>% Recovery</b>	<b>70%</b>		<b>63%</b>
# ice hours	8,806		
# Dry Hours	1,125		
Total Hours	9,931		
Av Rev/ice hour	\$123.52		
Av Cost/hour	\$166.75		\$183.53
Cost/sq.ft.	\$16.14		\$17.77
Utilities/sq.ft	\$3.95		

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Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

### 3.3.2 BMO

In order to create a more realistic comparison and to partially offset the lower repair and maintenance expenses incurred at BMO in its first year of operation, capital reserve and management fees were included in the BMO expenses.

Table 7 provides a review of BMO results by month.

	November	December	January	February	March	April	May	June	July	August	Sept	Oct	TOTAL
Ice Revenues	\$163,523	\$171,713	\$193,467	\$166,439	\$189,286	\$149,078	\$91,961	\$26,298	\$36,870	\$87,207	\$71,768	\$194,143	\$1,541,753
Dry Revenue								\$5,500	\$5,803	\$5,362			\$16,665
Volleyball										\$1,190	\$139		\$1,329
Advertising	\$4,167	\$4,583	\$6,102	\$5,838	\$14,730	\$10,400	\$7,200	\$10,696	\$7,971	\$8,612	\$8,592	\$8,592	\$97,483
Facility rentals		(\$43)	\$663	\$686	\$713	\$100	\$325	\$575	\$113	\$0	\$388	\$900	\$4,420
Other leases		\$333	\$333	\$333	\$2,137	\$3,226	\$3,204	\$3,597	\$1,210	\$2,482	\$4,369	\$3,396	\$24,620
Vending			\$2,473			\$3,636	\$975	\$63	\$1,802	\$0	\$0	\$1,144	\$10,093
Misc			(\$1)			\$1,513	(\$4)	\$18	\$501	\$2	\$3	(\$18)	\$2,014
<b>TOTAL REVENUES</b>	<b>\$167,690</b>	<b>\$176,586</b>	<b>\$203,037</b>	<b>\$173,296</b>	<b>\$206,866</b>	<b>\$167,953</b>	<b>\$108,661</b>	<b>\$46,747</b>	<b>\$54,270</b>	<b>\$104,855</b>	<b>\$85,259</b>	<b>\$208,157</b>	<b>\$1,698,377</b>
Salaries	\$55,241	\$63,181	\$64,734	\$58,898	\$69,244	\$60,215	\$62,696	\$51,860	\$51,724	\$49,199	\$51,040	\$57,311	\$695,343
Repairs & Mtce	\$1,494	\$15,894	\$10,556	\$9,759	\$11,799	\$9,148	\$7,528	\$6,240	\$11,841	\$2,701	\$5,195	\$4,635	\$96,790
Utilities	\$46,746	\$31,745	\$54,171	\$43,689	\$44,018	\$41,335	\$39,003	\$31,117	\$32,198	\$36,826	\$41,291	\$46,604	\$488,743
Other	\$12,863	\$20,890	\$15,883	\$11,248	\$21,913	\$10,922	\$14,477	\$13,598	\$9,865	\$12,929	\$10,225	\$10,784	\$165,597
<b>Total Expenses</b>	<b>\$116,344</b>	<b>\$131,710</b>	<b>\$145,344</b>	<b>\$123,594</b>	<b>\$146,974</b>	<b>\$121,620</b>	<b>\$123,704</b>	<b>\$102,815</b>	<b>\$105,628</b>	<b>\$101,655</b>	<b>\$107,751</b>	<b>\$119,334</b>	<b>\$1,446,473</b>
<b>Net before (1), (2), &amp; (3)</b>	<b>\$51,346</b>	<b>\$44,876</b>	<b>\$57,693</b>	<b>\$49,702</b>	<b>\$59,892</b>	<b>\$46,333</b>	<b>(\$20,043)</b>	<b>(\$56,068)</b>	<b>(\$51,358)</b>	<b>\$3,200</b>	<b>(\$22,492)</b>	<b>\$88,823</b>	<b>\$251,904</b>
Managmt Fee & COI	\$16,667	\$18,417	\$20,144	\$18,228	\$18,574	\$18,811	\$18,464	\$17,584	\$20,697	\$18,074	\$17,667	\$18,007	\$221,334
Capital Reserve Fund <sup>(2)</sup>	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$16,667	\$200,004
Concessions (Net profit) <sup>(3)</sup>						(\$7,000)	(\$3,338)	(\$3,209)	(\$4,808)	(\$2,731)	(\$3,630)	\$3,107	(\$21,609)
<b>Profit (Loss)</b>	<b>\$18,012</b>	<b>\$9,792</b>	<b>\$20,882</b>	<b>\$14,807</b>	<b>\$24,651</b>	<b>\$3,855</b>	<b>(\$58,512)</b>	<b>(\$93,528)</b>	<b>(\$93,530)</b>	<b>(\$34,272)</b>	<b>(\$60,456)</b>	<b>\$57,256</b>	<b>(\$191,043)</b>
<b>% Recovery</b>	<b>112%</b>	<b>106%</b>	<b>111%</b>	<b>109%</b>	<b>114%</b>	<b>102%</b>	<b>63%</b>	<b>32%</b>	<b>35%</b>	<b>75%</b>	<b>57%</b>	<b>137%</b>	<b>90%</b>
# Ice hours	873	1,025	1,113	1,069	1,142	838	675	278	379	550	507	1,205	9,654
# Dry Hours								51	91	145	51		337
Total Hours	873	1,025	1,113	1,069	1,142	838	675	329	470	695	558	1,205	9,991
Av revenue / ice hour	\$187.31	\$167.52	\$173.82	\$155.70	\$165.75	\$177.90	\$136.24	\$94.60	\$97.28	\$158.56	\$141.55	\$161.11	\$159.70
Av cost per hour (before 1)	\$133.27	\$128.50	\$130.59	\$115.62	\$128.70	\$145.13	\$183.27	\$312.98	\$224.74	\$146.37	\$193.28	\$99.03	\$144.78
Av cost per hour (net of 1)	\$171.45	\$162.73	\$163.66	\$148.26	\$159.56	\$179.11	\$230.37	\$407.48	\$294.01	\$192.46	\$248.35	\$130.39	\$184.80
Av Cost/sq.ft.	\$1.04	\$1.16	\$1.26	\$1.10	\$1.26	\$1.04	\$1.08	\$0.93	\$0.96	\$0.93	\$0.96	\$1.09	\$12.79
Utilities/sq.ft.	\$0.32	\$0.22	\$0.38	\$0.30	\$0.30	\$0.29	\$0.27	\$0.22	\$0.22	\$0.26	\$0.29	\$0.32	\$3.38

As would be expected in a first year operation there was a fair amount of fluctuation in monthly operating results. Monthly results reflect changes in the number of operating days, weather, schedule and staffing adjustments. First year operations typically generate higher than normal staff costs as management adapts to developing patterns of use.

Due to the organizational structure, fixed costs and the configuration of the facility's mechanical systems, the average monthly difference between operating two and four ice surfaces was only about 23 cents per square foot. This combined with lower demand and competition from other facilities meant that the percentage of operating costs recovered fell dramatically during the months when only two ice surfaces were in operation. The facility operated 4 ice surfaces in September however anticipated demand was eroded by competition from other facilities. The average cost per square foot in October was \$1.09 which may reflect changes in staffing and operating procedures. Additional data is required before conclusions can be drawn.

C.E. Oliver  
Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

### 3.4 Operating Results Comparison

Table 8 compares the overall operating results of the BMO Centre with the 4 HRM facilities.

All expenses included, during its first full year of operation the BMO Centre cost \$479,000 less to operate than the HRM facilities. Management fees included for BMO, staff costs were almost identical between the two operations. Utility costs were higher for BMO as a result of the larger square footage of the building and more robust mechanical systems of a modern facility, however cost per square foot were lower than those in the HRM facilities. Repairs and Maintenance costs for BMO including capital reserve were considerably less than HRM facilities reflecting the higher costs of maintaining aging facilities, lower costs for a first year operation and economies inherent in a multi pad facility. Insurance costs were much higher for BMO as compared with the HRM facilities reflecting the economies of scale for HRM.

Other costs were much higher for BMO as compared with HRM. The \$115,209 for BMO included the following:

Audit fees	\$17,000
Credit card charges	\$13,902
Office Expenses	\$30,000
Communications	\$19,988
Travel & accommodations	\$5,134
Advertising Production Costs	\$14,034
Sales & Marketing	\$4,189
Training	\$3,931
Uniforms	\$4,160
Interest & Bank Charges	\$2,253

Some of these costs would be higher than those in the HRM facilities due to the logistics of a first year operation and some would be due to the nature of a private sector operation. Although HRM staff attempted to include all comparable costs there may be additional costs in these areas or some may be included in Repairs and Maintenance.

Average revenue generated per Ice hour used was \$160.00 for BMO as compared with \$124.00 for the HRM facilities. This can be attributed to the differences in fee schedules between the two (see Table 9). This average amount can be expected to decrease in future years for BMO as the facility rents more non-prime, fringe hours and summer hours.

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Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

**Table 8 Comparison of Operating Results**

	BMO	HRM	BMO/HRM Var	%
<b>Revenue</b>				
Ice	\$1,541,753	\$1,087,686	\$454,067	42%
Dry	\$16,665	\$56,139	-\$39,474	-70%
Other	\$139,959	\$8,400	\$131,559	1566%
Canteen Net	-\$21,609		-\$21,609	
Total	\$1,676,768	\$1,152,225	\$524,543	46%
<b>Expense</b>				
Salaries & Wage/ Mgmt Fees	\$916,676	\$917,281	-\$605	0%
Utilities	\$488,743	\$405,322	\$83,421	21%
Repairs & Mtce/Capital Reserve	\$296,793	\$464,709	-\$167,916	-36%
Insurance	\$50,388	\$20,000	\$30,388	152%
Other	\$115,209	\$15,339	\$99,870	651%
Total	\$1,867,809	\$1,822,651	\$45,158	2%
Net Profit/Loss	\$ (191,041)	\$ (670,426)	\$479,385	
% Recovery of costs	90%	63%		
Ice Hours	9,653	8,806	848	10%
Dry Hours	336	1,125	(789)	-70%
Total Hours Used	9,989	9,931	59	1%
Av Revenue/Ice Hour	\$160	\$124	\$36	29%
Av Cost/Hour used	\$187	\$184		
Av Cost/hour used ex Capital	\$167	\$180		
% of Av Winter wk capacity 2010	52%	72%		
% of Av Winter wk capacity 2011	60%	71%		
Area	144,402	102,587		
Costt/sqft	\$12.93	\$17.77		
Utilities/sq.ft.	\$3.38	\$3.95		

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Dec 30, 2011

Halifax Regional Municipality  
Arena Operations Assessment Report

Table 9 Fee Schedule HST inc					
	NonPrime	Shoulder	Prime	Affiliated	Summer Regular
Devonshire	n/a	\$141.00	\$159.00	\$159.00	
Bowles/Gray/ Bedford	\$100.00	\$149.00	\$178.00	\$178.00	
BMO	\$143.75	\$235.75	\$264.75	\$212.75	\$235.75
Net BMO/Bowles,Gray, Bed	\$43.75	\$86.75	\$86.75	\$34.75	
% var	44%	58%	49%	20%	

## 4.0 Summary

The first year operating results for the BMO Centre as compared with those of the 4 HRM facilities amply demonstrate the economies inherent in multi-pad ice facilities as compared with single pad arenas. As indicated by the October results, the net operating results for BMO in Year 2 should show a considerable improvement over Year 1.

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Dec 30, 2011



## **APPENDIX D2**

BMO Financials 03/31/12

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**BMO Centre  
Financial Package  
For the period ending Mar. 31, 2012**

**BMO Centre  
Variance Report  
For the period ending Mar. 31, 2012**

**DRAFT**

	Actual	Budget	Variance	
<b>Gross Revenues</b>				
Ice rentals	188,270	216,968	(28,698)	low rentals during March break, expected more provincial tournaments
Volleyball Courts	-	-	-	
Shinny / Public Skate	6,462	5,000	1,462	
Contracted Advertising	18,904	10,500	8,404	catch up on one advertising contract, plus one time production costs
Room rentals	413	500	(88)	
Other Leases	6,110	3,145	2,965	
Vending	-	2,375	(2,375)	
Miscellaneous	93	-	93	
<b>Total Revenue</b>	<b>220,251</b>	<b>238,488</b>	<b>(18,237)</b>	
<b>Expenses</b>				
Salaries	44,890	66,782	21,892	combined Scheduler/admin manager positions maximized roles of existing staff cost recovery on Oval expenses
Training	75	500	425	
Uniforms	(236)	250	486	
Travel & Accommodation	(326)	417	743	
Sales & Marketing	713	625	(88)	
Advertising Production Costs	548	-	(548)	
Repairs & Maintenance	11,681	15,042	3,361	Cleaning Supplies 1,689 Zamboni mntnce and fuel 2,421 Snow removal 5,000 HVAC maintenance 940 Waste removal 976 Other misc repairs 655
Utilities	45,360	46,800	1,440	
Insurance	3,996	4,583	587	
Fee on COI's	1,083	2,100	1,017	
Office Expenses	1,177	1,283	106	
Communications	1,559	1,708	149	
Management Fees	16,667	16,667	0	
Legal and Audit	1,000	1,000	-	
Interest & Bank Charges	272	360	88	
Credit Card Charges	1,627	833	(794)	
Bad Debt	(5)	-	5	
<b>Total Expenses</b>	<b>130,082</b>	<b>158,950</b>	<b>28,868</b>	
<b>Profit (loss) before Concessions</b>	<b>90,169</b>	<b>79,538</b>	<b>10,631</b>	
Canteen	261	3,420	(3,159)	
<b>Profit (loss) before Capital Expenditures</b>	<b>90,430</b>	<b>82,958</b>	<b>7,472</b>	
Capital Reserve	50,000	16,667	(33,333)	
Capital Expenditures	-	-	-	
Transfer from Capital Reserve	-	-	-	
<b>Profit (loss)</b>	<b>40,430</b>	<b>66,291</b>	<b>(25,861)</b>	

**BMO Centre**  
**Income Statement**  
**For the period ending Mar. 31, 2012**

**DRAFT**

	Current Month					Year to Date				
	Actual	Budget	% of Budget	Prior Yr	% of Prior Yr	Actual	Budget	% of Budget	Prior Yr	% of Prior Yr
<b>Gross Revenues</b>										
Ice rentals	188,270	216,968	87%	185,572	101%	1,616,177	1,932,723	84%	866,345	187%
Volleyball Courts	-	-	0%	-	0%	1,329	35,000	4%	-	0%
Shinny / Public Skate	6,462	5,000	129%	3,714	174%	58,226	30,000	194%	18,083	322%
Contracted Advertising	18,904	10,500	180%	14,730	128%	119,373	126,000	95%	35,420	337%
Room rentals	413	500	83%	713	58%	5,138	6,000	86%	2,021	254%
Other Leases	6,110	3,145	194%	2,137	286%	48,290	34,554	140%	3,136	1540%
Vending	-	2,375	0%	-	0%	9,880	18,000	55%	2,473	400%
Miscellaneous	93	-	0%	-	0%	2,117	-	0%	(1)	-211717%
<b>Total Revenue</b>	<b>220,251</b>	<b>238,488</b>	<b>92%</b>	<b>206,866</b>	<b>106%</b>	<b>1,860,530</b>	<b>2,182,277</b>	<b>85%</b>	<b>927,477</b>	<b>201%</b>
<b>Expenses</b>										
Salaries	44,890	66,782	67%	69,244	65%	647,270	760,448	85%	311,298	208%
Training	75	500	15%	-	0%	2,736	6,000	46%	3,040	90%
Uniforms	(236)	250	-94%	222	-106%	4,547	3,000	152%	3,975	114%
Travel & Accommodation	(326)	417	-78%	208	-157%	5,871	5,004	117%	1,421	413%
Promotions & Marketing	713	625	114%	-	0%	1,827	7,500	24%	3,075	59%
Advertising Production Costs	548	-	0%	12,315	4%	5,795	-	0%	12,315	47%
Repairs & Maintenance	11,681	15,042	78%	11,799	99%	112,808	148,208	76%	49,502	228%
Utilities	45,360	46,800	97%	44,018	103%	507,226	477,000	106%	220,369	230%
Insurance	3,996	4,583	87%	4,199	95%	49,377	54,996	90%	20,995	235%
Fee on COI's	1,083	2,100	52%	1,907	57%	19,471	25,200	77%	8,695	224%
Office Expenses	1,177	1,283	92%	1,585	74%	26,320	15,396	171%	12,454	211%
Communications	1,559	1,708	91%	1,092	143%	17,969	20,496	88%	10,277	175%
Management Fees	16,667	16,667	100%	16,667	100%	200,000	200,004	100%	83,335	240%
Legal and Audit	1,000	1,000	100%	-	0%	14,510	12,000	121%	10,000	145%
Interest & Bank Charges	272	360	76%	364	75%	3,286	4,320	76%	665	494%
Credit Card Charges	1,627	833	195%	1,928	84%	18,824	9,996	188%	4,580	411%
Bad Debt	(5)	-	0%	-	0%	115	-	0%	-	0%
<b>Total Expenses</b>	<b>130,082</b>	<b>158,950</b>	<b>82%</b>	<b>165,548</b>	<b>79%</b>	<b>1,637,951</b>	<b>1,749,568</b>	<b>94%</b>	<b>755,996</b>	<b>217%</b>
<b>Profit (loss) before Concession</b>	<b>90,169</b>	<b>79,538</b>	<b>113%</b>	<b>41,318</b>	<b>218%</b>	<b>222,578</b>	<b>432,709</b>	<b>51%</b>	<b>171,481</b>	<b>130%</b>
Canteen	261	3,420	8%	-	0%	(24,456)	10,341	-236%	-	0%
<b>Profit (loss) before Cap Expenc</b>	<b>90,430</b>	<b>82,958</b>	<b>109%</b>	<b>41,318</b>	<b>219%</b>	<b>198,123</b>	<b>443,050</b>	<b>45%</b>	<b>171,481</b>	<b>116%</b>
Capital Reserve	50,000	16,667	300%	16,667	300%	250,000	200,004	125%	83,335	300%
Capital Expenditures	-	-	0%	-	0%	-	-	0%	-	0%
Transfer from Capital Reserve	-	-	0%	-	0%	-	-	0%	-	0%
<b>Profit (loss)</b>	<b>40,430</b>	<b>66,291</b>	<b>61%</b>	<b>24,651</b>	<b>164%</b>	<b>(51,877)</b>	<b>243,046</b>	<b>-121%</b>	<b>88,146</b>	<b>-59%</b>

**BMO Centre**  
**Income Statement - Canteen**  
**For the period ending Mar. 31, 2012**

**DRAFT**

	Current Month					Year to Date				
	Actual	Budget	% of Budget	Prior Yr	% of Prior Yr	Actual	Budget	% of Budget	Prior Yr	% of Prior Yr
Gross Revenues										
Food	2,508	5,000	50%	-	0%	25,173	37,000	68%	-	0%
Beer	5,988	10,000	60%	-	0%	38,157	80,500	47%	-	0%
Soft Drinks	3,228	2,000	161%	-	0%	29,695	19,000	156%	-	0%
Sales Discounts	(20)	-	0%	-	0%	(114)	-	0%	-	0%
Total Revenue	11,704	17,000	69%	-	0%	92,911	136,500	68%	-	0%
Expenses										
Food	2,143	1,650	130%	-	0%	17,716	12,210	145%	-	0%
Beer	1,843	4,500	41%	-	0%	18,616	36,225	51%	-	0%
Soft Drinks	1,419	750	189%	-	0%	11,626	7,125	163%	-	0%
Total Cost of Goods Sold	5,405	6,900	78%	-	0%	47,958	55,560	86%	-	0%
Gross Margin	6,299	10,100	62%	-	0%	44,954	80,940	56%	-	0%
Salaries & Wages	5,270	5,150	102%	-	0%	57,046	58,188	98%	-	0%
Marketing and Promotion	-	-	0%	-	0%	1,447	-	0%	-	0%
Cleaning Chemicals	-	-	0%	-	0%	42	126	33%	-	0%
Paper Supplies	550	1,530	36%	-	0%	6,238	12,285	51%	-	0%
Delivery Charges	-	-	0%	-	0%	68	-	0%	-	0%
Licenses	-	-	0%	-	0%	91	-	0%	-	0%
Repairs and Maintenance	94	-	0%	-	0%	96	-	0%	-	0%
Smallwares	-	-	0%	-	0%	2,400	-	0%	-	0%
Spillage	66	-	0%	-	0%	808	-	0%	-	0%
Uniforms	-	-	0%	-	0%	444	-	0%	-	0%
Cell Phones	59	-	0%	-	0%	727	-	0%	-	0%
Credit Charges	-	-	0%	-	0%	2	-	0%	-	0%
Total Expenses	6,039	6,680	90%	-	0%	69,410	70,599	98%	-	0%
Profit (loss) before Dep.	261	3,420	8%	-	0%	(24,456)	10,341	-236%	-	0%
Cost % of Revenue										
Total	46.2%	40.6%	113.8%	0.0%	0.0%	51.6%	40.7%	126.8%	0.0%	0.0%
1 Food & Concessions	85.5%	33.0%	259.0%	0.0%	0.0%	70.4%	33.0%	213.3%	0.0%	0.0%
1 Beer	30.8%	45.0%	68.4%	0.0%	0.0%	48.8%	45.0%	108.4%	0.0%	0.0%
1 Soft Drinks	44.0%	37.5%	117.2%	0.0%	0.0%	39.2%	37.5%	104.4%	0.0%	0.0%

1 Sales Discounts are not factored into these calculations.

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BMO Centre  
Income Statement - Projected Forecast  
For year ending March 31, 2012

Run: 03-May-12  
Prepared By: Nustadia Recreation inc.

	Actual												Total	Original Budget	% of Org Budget	Actuals 2011
	Apr	May	June	July	Aug	Sep	Oct	Nov	Dec	Jan	Feb	Mar				
<b>Gross Revenues</b>																
Ice rentals	145,852	88,488	28,712	38,572	89,084	68,556	190,452	198,449	185,535	197,058	197,139	188,270	1,816,177	1,932,723	84%	868,345
Volleyball Courts	-	-	-	-	1,180	139	-	-	-	-	-	-	1,329	35,000	4%	-
Shimmy / Public Skate	3,228	3,473	3,088	4,101	3,475	3,212	3,691	5,381	6,333	8,272	7,513	6,482	58,228	30,000	194%	18,083
Contracted Advertising	10,400	7,200	10,898	7,971	8,612	8,592	8,582	9,233	9,871	8,987	10,537	18,904	119,373	128,000	95%	35,420
Room rentals	100	325	575	113	-	388	900	363	1,288	363	313	413	5,138	6,000	86%	2,021
Other Leases	3,228	3,204	3,597	1,210	2,482	4,389	3,398	5,834	4,928	4,923	5,011	6,110	48,290	34,554	140%	3,138
Vending	3,638	975	63	1,802	-	-	1,144	-	-	2,260	-	-	9,880	18,000	55%	2,473
Miscellaneous	1,513	(4)	18	501	2	3	(18)	(1)	(1)	7	5	93	2,117	-	0%	(1)
<b>Total Revenue</b>	<b>167,952</b>	<b>103,662</b>	<b>48,747</b>	<b>54,271</b>	<b>104,858</b>	<b>85,258</b>	<b>208,158</b>	<b>219,258</b>	<b>207,752</b>	<b>221,849</b>	<b>220,518</b>	<b>220,251</b>	<b>1,860,530</b>	<b>2,182,277</b>	<b>85%</b>	<b>927,477</b>
<b>Expenses</b>																
Salaries	60,215	62,898	51,880	51,724	49,199	51,040	57,311	55,801	51,528	55,803	55,202	44,890	647,270	760,448	85%	311,298
Training	228	480	-	-	122	-	61	1,710	61	-	-	75	2,738	6,000	46%	3,040
Uniforms	-	-	-	-	-	40	145	-	878	3,720	-	(236)	4,547	3,000	152%	3,975
Travel & Accommodation	808	89	1,339	712	141	451	175	441	383	-	1,680	(328)	5,871	5,004	117%	1,421
Sales & Marketing	-	225	-	243	-	648	-	-	-	-	-	713	1,827	7,500	24%	3,075
Advertising Production Costs	165	530	-	330	-	(250)	944	708	80	944	1,798	548	5,795	-	0%	12,315
Repairs & Maintenance	9,148	7,528	8,240	11,841	2,701	5,185	4,835	15,438	14,478	11,188	12,741	11,881	112,808	148,208	76%	49,502
Utilities	41,335	39,003	31,117	32,198	36,828	41,291	48,604	51,531	50,792	48,770	44,399	45,380	507,228	477,000	106%	220,389
Insurance	4,199	4,199	4,199	4,199	4,199	4,199	4,199	3,998	3,998	3,998	3,998	3,998	49,377	54,998	90%	20,995
Fee on COI's	2,144	1,797	917	4,030	1,407	1,000	1,340	1,000	1,000	1,681	2,073	1,083	19,471	25,200	77%	8,695
Office Expenses	2,307	4,927	2,098	1,489	3,739	1,587	1,948	1,895	1,947	1,856	1,550	1,177	26,320	15,398	171%	12,454
Communications	1,072	1,083	1,191	1,082	3,140	1,070	1,073	1,167	1,178	922	3,433	1,559	17,989	20,498	88%	10,277
Management Fees	16,667	16,667	16,667	16,667	16,666	16,667	16,667	16,667	16,667	16,667	16,667	16,667	200,000	200,004	100%	83,335
Legal and Audit	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	1,000	3,510	1,000	1,000	14,510	12,000	121%	10,000
Interest & Bank Charges	75	674	17	7	9	358	450	237	252	355	579	272	3,288	4,320	76%	685
Credit Card Charges	1,070	1,270	3,756	732	579	1,126	789	949	2,598	1,887	2,444	1,827	18,824	9,998	188%	4,580
Bad Debt	-	-	-	71	-	-	-	49	-	-	-	(5)	115	-	0%	-
<b>Total Expenses</b>	<b>140,432</b>	<b>142,168</b>	<b>120,400</b>	<b>126,328</b>	<b>119,729</b>	<b>125,418</b>	<b>137,340</b>	<b>152,388</b>	<b>146,832</b>	<b>149,297</b>	<b>147,540</b>	<b>130,082</b>	<b>1,837,951</b>	<b>1,749,568</b>	<b>94%</b>	<b>755,996</b>
<b>Operating Profit (loss) before Concessions</b>	<b>27,520</b>	<b>(38,506)</b>	<b>(73,653)</b>	<b>(72,055)</b>	<b>(14,873)</b>	<b>(40,160)</b>	<b>70,818</b>	<b>66,870</b>	<b>60,919</b>	<b>72,551</b>	<b>72,978</b>	<b>90,169</b>	<b>222,578</b>	<b>432,709</b>	<b>51%</b>	<b>171,481</b>
Canteen	(7,000)	(3,338)	(3,209)	(4,808)	(2,731)	(3,630)	3,107	711	(2,575)	(891)	(552)	261	(24,458)	10,341	-236%	-
<b>Profit (loss) before Capital Expend.</b>	<b>20,521</b>	<b>(41,844)</b>	<b>(76,862)</b>	<b>(76,864)</b>	<b>(17,604)</b>	<b>(43,790)</b>	<b>73,925</b>	<b>67,580</b>	<b>58,344</b>	<b>71,661</b>	<b>72,425</b>	<b>90,430</b>	<b>198,123</b>	<b>443,050</b>	<b>45%</b>	<b>171,481</b>
Capital Reserve	16,667	16,667	16,667	16,667	16,667	16,667	16,667	16,667	16,667	29,167	20,833	50,000	250,000	200,004	125%	83,335
Capital Expenditures	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0%	-
Transfer from Capital Reserve	-	-	-	-	-	-	-	-	-	-	-	-	-	-	0%	-
<b>Net Profit / (Loss)</b>	<b>3,854</b>	<b>(58,511)</b>	<b>(93,528)</b>	<b>(93,530)</b>	<b>(34,270)</b>	<b>(60,457)</b>	<b>57,258</b>	<b>50,914</b>	<b>41,678</b>	<b>42,694</b>	<b>51,592</b>	<b>40,430</b>	<b>(51,877)</b>	<b>243,046</b>	<b>-121%</b>	<b>88,146</b>
<b>YTD Profit (loss)</b>	<b>3,854</b>	<b>(58,511)</b>	<b>(148,185)</b>	<b>(241,716)</b>	<b>(275,988)</b>	<b>(336,443)</b>	<b>(279,185)</b>	<b>(228,271)</b>	<b>(186,594)</b>	<b>(143,900)</b>	<b>(92,307)</b>	<b>(51,877)</b>				

**BMO Centre  
Balance Sheet  
As at Mar. 31, 2012**

**DRAFT**

	<u>Mar 12</u>	<u>Feb 12</u>	<u>Mar 11</u>
<b>Assets</b>			
Current Assets			
Cash	325,378	235,151	133,422
Accounts Receivable	61,500	26,442	84,368
Due from HRM	-	-	120,000
Prepaid Expenses	27,974	65,304	29,395
<b>Total Current Assets</b>	<u>414,852</u>	<u>326,897</u>	<u>367,186</u>
Inventory	4,982	4,763	
<b>Total Assets</b>	<u>419,834</u>	<u>331,660</u>	<u>367,186</u>
<b>Liabilities</b>			
Current Liabilities			
Accounts Payable	132,785	171,941	131,857
Due to HRM	-	-	-
Deferred Revenue	250,777	163,876	147,178
<b>Total Liabilities</b>	<u>383,562</u>	<u>335,817</u>	<u>279,035</u>
<b>Equity</b>			
Retained Earnings	88,150	88,150	-
Current Earnings	(51,877)	(92,307)	88,150
<b>Total Equity</b>	<u>36,273</u>	<u>(4,157)</u>	<u>88,150</u>
<b>Total Liability and Equity</b>	<u>419,834</u>	<u>331,660</u>	<u>367,186</u>

Note:

A capital reserve fund exists for future capital purchases.

Current balance in the fund is made up of the following:

2012 Opening Balance	83,333
2012 Additions	250,000
2012 FAC Approved Purchases	-
	<u>333,333</u>



## APPENDIX E

Community Facility Master Plan 06/30/08

[www.halifax.ca/facilities/CFMP/documents/CFMPFINALMay08.pdf](http://www.halifax.ca/facilities/CFMP/documents/CFMPFINALMay08.pdf)

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## **APPENDIX F**

Long Term Arena Strategy Steering Committee Terms of Reference

## **Terms of Reference**

### **Halifax Regional Municipality**

#### **Long Term Ice Arena Replacement Strategy Steering Committee**

#### **Background**

1. Regional Council approved the Community Facility Master Plan (CFMP) in May of 2008. The CFMP covered the provision of a wide range of community, recreation, sport, event and cultural facilities, both indoor and outdoor, in HRM. In particular, it focussed on the provision of municipally owned facilities as well as the role of HRM in partnership with other agencies such as the HRSB, the military, universities and Capital Health. Included under the Sports Facilities Category were several recommendations for a short range strategy to deal with an immediate deficit of ice arenas as well as a long range strategy to address the issue of existing aging facilities. The delivery of the new 4-pad arena facility in Bedford West off the Hammonds Plains Road is the result of the short term strategy for the immediate arena shortage. The next step is to develop a longer range strategy to deal with the remaining aging facilities.

Further reference can be made to the following recommendations in the Community Facility Master Plan:

- Recommendation #40 Arena Conversion Recommendations
- Recommendation #41 & 46 Expansion of Existing Arenas
- Recommendation #43 Recapitalization of Arenas
- Recommendation #47 Arena Replacement

Other more broad recommendations that deal with the whole HRM portfolio may also be reviewed for applicability.

#### **Purpose of Steering Committee**

HRM Community Development is encouraging the formation of a Long Term Ice Arena Replacement Strategy Steering Committee to:

- provide advice and direction to a staff resource team
- develop and make recommendations to Regional Council on a Long Term Ice Arena Strategy

#### **Role of Steering Committee**

The Committee's primary role is to develop and recommend a long term replacement strategy for the provision of municipally owned ice arenas in HRM. This strategy shall also consider the use of community

outdoor refrigerated ice rinks as a possible part of the replacement solution, and the 2011 Canada Games Legacy Rink. The Steering Committee will be supported by an HRM staff resource team and will direct requests and direction to this support team as needed to develop recommendations.

More specifically, the Committee will:

- review and refine a staff recommended project scope and time line
- develop with staff a public/stakeholder participation program in order to stimulate comment/consultation and gain further input. Recommend public meetings as required.
- advise on the need and priorities for background and studies and research
- review all available background information
- take into consideration usage and future plans of any non-municipally owned facilities and potential impacts
- determine which HRM owned facilities are best suited to be recapitalized, which ones should be considered for conversions to other indoor recreation usage, and which ones would be better suited to be replaced. Include siting options/recommendations for those replacement needs.
- consider community outdoor refrigerated as a part of a long term replacement strategy. Include siting options/recommendations for those as well.
- take into consideration the 2011 Canada Games Legacy arena opportunity and recommend siting options/recommendations for this project.
- recommend a multi-year implementation plan for the long term strategy, indicating with priorities should be implemented in order
- develop with the aid of staff a high level multi-year capital budget plan using industry standard costs/sq. ft. estimates.
- will take into consideration as part of the implementation strategy should the role of user fee cost recovery, cost sharing, fund-raising and use of area rates?
- will provide periodic progress reports and will make the final presentation and recommendation of a long term strategy to Regional Council

## **Membership**

Regional Council	(2)
Sport Nova Scotia	(1)
Recreation Nova Scotia	(1)
Ringette Nova Scotia	(1)
Skate Canada/NS	(1)
Speed Skate NS	(1)
Hockey Nova Scotia	(1)
Citizen at large (designation)	(1)
Citizen at large (recreation users)	(2)
Citizen at large (Lacrosse representative)	(1)

## **Selection of Membership**

Selection criteria will include:

- Willingness and ability to commit to the necessary time up to a one year period;
- Commitment and interest in the planning, development and decommissioning of facilities as they relate to the scope of work of the Master Plan
- Skills and experience related to roles and responsibilities in facility management and service delivery

## **Appointment**

The term of appointment shall be until the project is completed.

## **Resources**

- The Facility division of Community Development will provide staff resources to the Long Term Ice Arena Replacement Strategy Steering Committee including arranging meetings, agendas, note taking (summary and action items), distribution of materials and other administrative functions. Any budget requirements for this committee will be included within the budget of the project, subject to the normal review and approval process of the Business Unit.
- The Facility division of Community Development will work as an integrated group, represented on the Steering Committee by the Project Manager, to provide professional support, expertise, and deliverables as necessary to meet the time lines and scope of the project. This group will be expanded to include participation from TPW, IAM, Finance, Real Estate, and Legal Services as required.
- Documents available:
  - 2008 Community Facilities Master Plan
  - HRM Regional Plan
  - 2008 Update to HRM Arena Capacity Study
  - Current HRM 5 Year Capital Plan
  - Various Arena Strategy documents from other Canadian cities
  - Council reports and Preliminary research on community outdoor refrigerated ice rinks and
  - 2011 Canada Games Legacy arena

## APPENDIX G

Community Access Plan

[www.halifax.ca/facilities/CFMP/documents/CommunityAccessPlan.pdf](http://www.halifax.ca/facilities/CFMP/documents/CommunityAccessPlan.pdf)