

The largest natural history museum in Canada known for: nature inspiration and engagement; Arctic knowledge and exploration; species discovery and change; and a 10.5 million specimen collection housed at a 76 hectare research campus.

# **2015-2016 ANNUAL REPORT**





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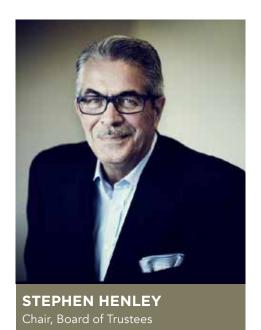
# message from the chair

In my role as Chair of a national museum, I often hear positive comments on how important it is for these venerable institutions to provide a window on our past. While true, there is much more to national museums, and our museum in particular - as a national research and educational institution that not only learns from the past, but also applies that learning to the present, in order to guide our future actions.

After all, environmental change over time is not only a fact of the past, but also the challenge of our present. What changes are humans causing? What changes are natural? What are the impacts? And how can we manage them? This museum is deeply involved in these questions, through its exhibitions and educational programs, and its two areas of scientific leadership: Centres of Excellence in Arctic Knowledge and Exploration, and Species Discovery and Change.

The Museum, for example, is a leader in documenting the biodiversity and geological record of Canada, including our Arctic. Our world-class collections of Arctic flora and fauna serve as a vardstick by which environmental change can be measured in this critical region of the planet. Data from the collection are shared with experts around the world through specimen loans or digital downloads, aided through participation in international associations such as the Global Biodiversity Information Facility (GBIF). In 2015-16, digital downloads of the Museum's specimens through GBIF and our own website surpassed 100 million.

The Museum represents Canada in numerous international environmental organizations such as the International Union for the Conservation of Nature



(IUCN). In testimony to this, I am pleased that Museum President and CEO Margaret Beckel also assumed the role of President of the IUCN's Canadian Committee this year. National recognition also came to the Museum itself -- given its scientific and public engagement role with respect to the Arctic, the Museum was pleased that Prime Minister Justin Trudeau held the inaugural Climate Summit First Ministers Meeting at the Museum in November 2015.

The national natural history collection, and the research of its experts, also serves as a source of knowledge for public engagement. In 2015-16 planning progressed on the Museum's new Arctic Gallery, which will open on June 23, 2017 as the Museum's contribution to Canada's 150th anniversary of Confederation. This permanent gallery will create a sense of curiosity and intrigue, engaging visitors to develop a sense of communal ownership and responsibility for the Arctic.



The Museum also progressed on development of its first outdoor living exhibit, the Landscapes of Canada Gardens, which will open in June 2016. This area on the Museum's property features three distinct ecozones: boreal forest, prairie grassland, and Arctic Tundra, with the tundra dominated by a stainless steel sculpture inspired by icebergs created by artist and adventurer William Lishman.

With biodiversity the core theme of public engagement in 2015-16, more than 100,000 visitors marvelled at the special summer exhibition, Body Worlds: *Animal Inside Out*, while *Bugs Outside the Box* focussed a lens on insects, an essential group of organisms to the planet's biodiversity. These exhibitions boosted museum attendance, which at over 480,000, was up 20% in 2015-16 relative to the year prior, resulting in a positive impact to revenues.

That said, sustaining audiences demands

finding new ways of connecting visitors with nature. The Museum is achieving this through its extremely popular Nature Nocturne program aimed at millenials and other experimental programs such as Nature Tastes, which was introduced this year, offering a natural history take on wine, beer and spirit tastings.

Overall, the Museum's sustainability plan of achieving 5% commercial revenue growth while holding costs to below 1%, embarked on last year, was again surpassed in this, its second year of implementation. With this performance, for the medium term at least, the Museum's course is secure.

But the future focus of the Museum is perhaps best epitomized not in what it does itself, nor in how it engages visitors, but rather in how it recognizes the efforts of others. With the Nature Inspiration Awards, the Museum acknowledges individuals and organizations that have demonstrated initiative in encouraging

Canadians to take an interest in natural history, create links with nature and contribute to its preservation. Seventy nominations were received in only the program's second year with a new lifetime achievement award presented to Cornelia Hahn Oberlander for her contribution to creating sustainable natural landscapes.

The amazing efforts that our Nature Inspiration Award nominees, finalists, and winners are making today give me confidence that we, as a society, will rise to the challenge to successfully manage our natural future. I feel privileged that the Canadian Museum of Nature forms a part of that mission.

# message from the president and chief executive officer

# Annual Reflection on 2015-2016 Accomplishments:

A year of Arctic Exploration, Species Discovery, Nature Inspiration, collections digitization, specimen acquisition, public engagement and global dialogue. A year filled with activity that advanced the mission and mandate of Canada's national museum of natural sciences and natural history.

**X-rays of Arctic fish**: a natureART exhibit with back-lit photographs of x-rays of our arctic fish collection.

Arctic Natural History Museums meet in Washington: a gathering of museum leaders seeking new ways to collaborate on Arctic research and global dialogue about the current and future challenges we face.

Science by Night: an engaging public event featuring our scientists and curators at our public museum site. Over 1,700 people participated in one evening!

**NatureSCOOP:** an entertaining and informative video experience for media, members, government and the general public.

NatureNocturne: continues to rock the castle. Each year we host new themes with new partners from the National Capital Region. From gallery programming to DJs and special beverages, there is something for everyone from 8 p.m. to midnight. This year we hosted a special pre-Canada Day Nocturne!

Animal Inside Out: over 45% of our visitors chose to see this spectacular exhibit from BodyWorlds. Visitor satisfaction and recommendation exceeded our target of 90%! A great visitor experience supported by compelling marketing!

**School Programs**: amid all the disruptions to the school year, our school programs team exceeded targets for attendance, revenue and satisfaction!

**Field Season**: another productive field season by our research and collections team. From Arctic botany to Cambodian minerals, it was a productive and inspiring season of exploration and discovery.

Collections Acquisition and Care: you can never have too many insects as long as they are deceased or contained! We received a great gift of insects to our collections. Our conservation team kept the "pest" variety at bay!

Nature Inspiration Awards: an inspiring second annual event featuring truly amazing individuals and organizations dedicated to creative and innovative nature inspiration and engagement.

Bugs, Bugs. Bugs... Outside the Box: as well as inside our exhibit hall! Over 50% of our visitors are choosing to see this beautiful and buggy exhibit. Even the cricket vending machine has been busy!

Landscapes of Canada Gardens: the Boreal forest, Prairie Grasslands and the Canadian Tundra are planted and waiting to be unveiled next year. A sight to behold.

**Lishman Iceberg**: yes, there is an iceberg in downtown Ottawa installed in the tundra section of the Landscapes of Canada Gardens. A magnificent sculpture created by William Lishman (Father Goose).

**Data Management**: work began on a replacement data management system for our admissions and our collections data. Very complex and important for the future of the Museum.



MARGARET BECKEL
President and Chief Executive Officer

**Group Sales**: our reach into the tourist market has really taken hold, as demonstrated by tremendous growth in both **number and revenues for this program.** 

**Sustainable Museum Enterprise 5 and** 1: a path to a sustainable future with a plan to grow earned revenues each year by 5% and grow expenses by only 1%. Our finance team keeps us on track and supports the institutional effort to grow revenues and contain costs.

**250 Field Days**: spent in the field across Canada and around the world advancing our role as a creator of knowledge about the natural world.

**90 Publications**: sharing knowledge of the plants, animals, fossils and minerals of the natural world to inspire understanding and respect for nature.

Approximately 10,000 new specimens: specifically, two gifts from private collections adding to our insect collection.



4 million touchpoints onsite, offsite, online: the increasing reach of our visitor, knowledge, social and civic destination experiences.

**153** million digital downloads of our collections data: the reach and impact of our collections-based knowledge is growing each year.

**1410** media mentions: the Museum was in the news and generating buzz locally, nationally and internationally.

25 full-page colour ads: we were thrilled to see 25 full-page colour ads in the Globe and Mail promoting our exhibits, our national reach, the Nature Inspiration Awards and our research Centres of Excellence.

**21,300** members: our visitors recognize the value of membership and the joy of being an active part of the life and future of this great museum.

\$7.1 million committed to the life and future of the Canadian Museum of

**Nature**: cash, collections and in-kind support of the Museum continues to grow as we tell our story to a broader audience.

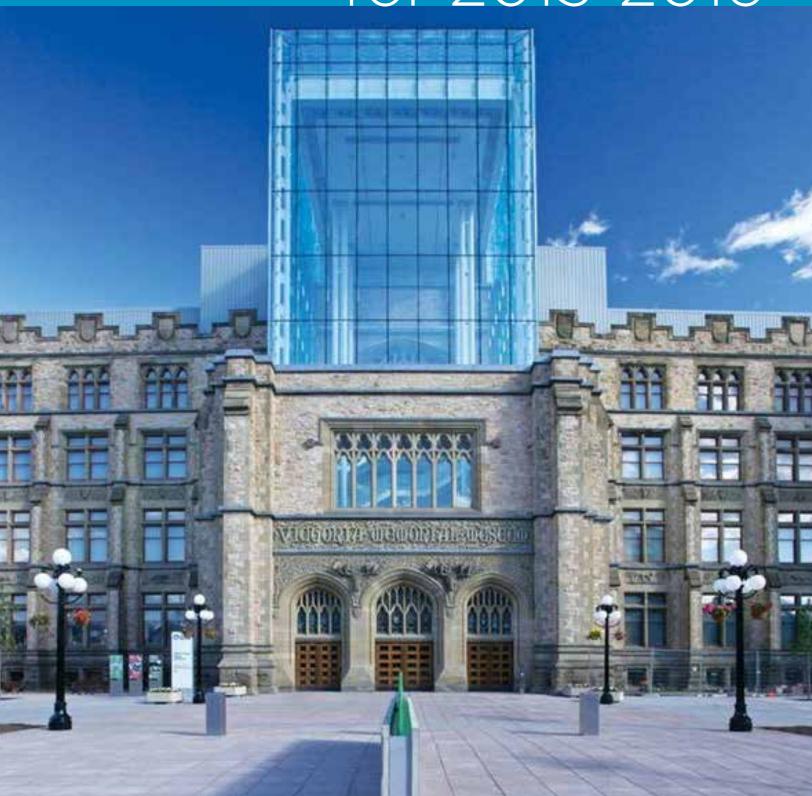
**15 innovations piloted**: new approaches to the design, development and delivery of visitor experiences that engage and have impact. Some will become part of our core offering, whereas others will be redesigned or set aside for another day.

**131 individual staff**: demonstrated their passion for our purpose with courage, commitment and capability.

230 volunteers: committed their time, talent and treasures to help advance the mission and mandate of the Museum, ensuring we continue to inspire understanding and respect for nature for a better Canada.

Thank you for playing your part.

# assessment of results for 2015-2016



In 2014-2015, the Museum began to advance a new strategic plan that leverages its research and collections strengths in Arctic knowledge and species discovery. New approaches to the design and delivery of visitor experiences will enable the Museum to attract and inspire new audiences. These new engaging experiences will lead to higher memberships, higher membership renewal and will provide a foundation for enhanced fundraising. Overall higher levels of engagement will lead to a better understanding of and connection with Canada's natural world.

# Strategic Objective #1:

Create a Centre for Arctic Knowledge and Exploration that **transforms people's understanding of Canada's Arctic** and its relationship with Canada as a country in a 21st century global context.

**Strategies:** Advance a five year program to enhance and advance the research, collections, education and exhibition programs focussed on Canada's Arctic within a national and global context.

• Launch the newly formulated Centre for Arctic Knowledge and Exploration: In the spring of 2015 the Centre and its Director were promoted at the annual Arctic Science Summit Week in Toyoma Japan, at the annual Arctic Cocktail evening at the Victoria Memorial Museum Building (VMMB), at the annual Open House at our Natural Heritage Campus (NHC) in Gatineau and at our annual Research & Collections Ignite session. In addition the Centre was profiled at the annual meeting of Arctic Net in Vancouver and again at Arctic Science Summit Week in Fairbanks Alaska in March 2016. As a result, the Director of the Centre was invited to speak at these same events and conferences.

Outcome #1: Be a global museum leader in Arctic Knowledge and Exploration.

Outcome	Measure	2015-2016 Performance Target	2015–2016 Performance Actual
e a global museum leader in Arctic Knowledge and Exploration	Number of participants in Arctic themed experiences: gallery, exhibit, program, digital	• 500,000	• 776,579
	<ul> <li>Funds raised supporting Arctic research, collections and engagement programming</li> </ul>	• \$250,000	• \$1,696,500
	Number of contacts with the Museum of Nature and its experts and collections for Arctic related content, expertise and collaboration	• 7	• 114
	Awareness of the Museum's Arctic content and expertise as measured by media mentions, stories, etc.	• 160 stories and mentions	• 198 stories and mentions

# Strategic Objective #2:

Create a Centre for Species Discovery and Change that transforms people's understanding of the relevance of species diversity to their lives now and in the future.

**Strategies:** Advance a five year program to advance and disseminate the research, collections, education and exhibition programs explaining Canada's species diversity aligned with the United Nations Convention on Biodiversity 2020 program.

- Launch the newly formulated Centre for Species Discovery and Change: the Centre and its Director were introduced to the media, the general public and the scientific community during the run of *Animal Inside Out*, the Museum's summer blockbuster exhibit. The Director was interviewed across Canada and in the capital as a result of this profile. The Centre confirmed a presentation for the September 2016 IUCN World Congress, participation in the 2017 Canada Bioblitz and holds a leadership role on the Board of the Global Biodiversity Information Facility based in Copenhagen.
- Unveil the Regions of Canada Gardens at the VMMB: the first phase of the gardens were completed in the fall of 2015 including plantings and the Iceberg Sculpture in the tundra section. The public unveiling will be held in spring 2016 along with associated public programming.

Outcome #2: Be a national leader and global influencer in advancing and sharing knowledge about species discovery and change.

Outcome	Measure	2015–2016 Performance Target	2015–2016 Performance Actual
global influencer in advancing and sharing knowledge about species discovery and change	Number of publications	• 50	• 53
	Number of new species described by the Museum	• 20	• 34
	Number of collaborators involved in the work the Museum does	• 115	• 171
	<ul> <li>Number of new experts being guided by the Museum</li> </ul>	• 25	• 35
	Number of collections acquired	• 22,000	• 11,800
	Amount of collections data shared digitally over the internet	• 5 million	• 70 million
	Percentage of GBIF memberships funded	• 10% of members funded	In discussion

# Strategic Objective #3:

Create a Centre for Nature Inspiration and Engagement that transforms people's expectations of the Canadian Museum of Nature as a destination for discussion, connection and exploration with nature's past, present and future that advances understanding and respect for Canada's natural world.

Strategies: Advance a five year program of inspiration and engagement activities on-site and off-site that deliver a different and compelling approach to connection and engagement with nature.

- Launch the Nature Inspiration Centre (NIC) as a place for piloting new experiences with new and existing audiences.
- Launch a National Salon Series in collaboration with a major partner giving nature a voice across Canada: the first annual Nature Salon (now called natureTALKS) was postponed due to the fall 2015 election. The first event will be held in the spring of 2016 in partnership with the Economic Club of Canada targeting community and corporate leaders in Toronto first and then other major cities across Canada.

Outcome #3: Be a national leader in nature inspiration experiences on-site and off-site.

Outcome	Measure	2014–2015 Performance Target	2015–2016 Performance Actual
Be a national leader in nature inspiration experiences on-site and off-site	Number of visitors attending the VMMB and NHC generated experiences	• 1.5 million	• 1.4 million
	Change in the holding power of the Museum visitor experiences	• Increase hold by 20%	Not measured
	Change in membership renewal rate and total memberships	• 5,000 and 60% renewal	• 5,414 and 51%
	Change in reach of museum expertise demonstrated by number of collaborations, conference presentations and workshop	• 30 events	• 73 events
	Number of organizations collaborating with the Museum for content and experience creations	• 75 collaborators	• 39 collaborators
	Funds raised in support of nature inspiration, content and experiences	• \$300,000 annually	• \$672,300

# Strategic Objective #4:

Position the Natural Heritage Campus as a centre of excellence in collections management and knowledge creation, advancement and sharing by becoming a collections collaborator with institutions around the world seeking to collect, preserve, digitize and disseminate specimens that document the nature of Canada.

**Strategies:** Advance a five year program that positions the Campus as a globally excellent research, collections, administration and experience site that advances understanding and respect for nature.

• Launch the collections digitization and access project aligned with the Museum's role with GBIF thus leveraging its technology in providing greater online access to its collections and knowledge: the decision to invest in a new collections data management system was confirmed and will be converted by 2017. The updated approach for tracking digital data downloads was applied in fiscal 2015-16 resulting in confirmed data downloads through GBIF of over 100 million plus an additional data retrievals through nature.ca-collections online of over 4 million.

Outcome #4: Be a global museum leader in natural heritage collections storage, study, preservation, digitization and dissemination.

Outcome	Measure	2015–2016 Performance Target	2015–2016 Performance Actual
in natural heritage collections storage, study, preservation, digitization and dissemination	Number of roles in national and international collections management and research bodies	• 25	• 40
	Growth of collections through new signature public and private sources gifted to the Canadian Museum of Nature	• 2%	• 0.5%
	<ul> <li>Access to NHC on-site and digitally through the Museum and third party created experiences</li> </ul>	• 25 million	• 153 million
	Position relative to Alliance of Natural History Museums of Canada collections for # of Canadian collections digitized	• 800,000	• 800,000 5 <sup>th</sup> in Canada

# Strategic Objective #5:

Create a sustainable business enterprise model of operation that leverages the Museum's strategic imperatives: knowledge and discovery, inspiration and engagement, presence, performance and advancement.

Strategies: Advance a five year program of continuous innovation in all aspects of the Museum operation in order to create a financial and operational model that sustains the Museum now and into the future.

- Launch a fundraising program in support of the Arctic and species discovery initiatives: the Arctic and species discovery case for support were completed and used in the cultivation of new ambassadors for the Museum's future fundraising campaign. Cash and in-kind support will again surpass \$5 million this fiscal.
- · Launch a program to develop the skills/competencies and human capacity needed to advance and maintain a sustainable museum enterprise: a new performance management program aligned with a comprehensive succession plan has resulted in new training, coaching and recruitment approaches resulting in greater confidence to do the work essential to success. The approach applies to individuals, teams and all staff depending on the skill or knowledge base needed.
- Continue to leverage the Council of CEO's with collaborative procurement, profile raising and exhibit planning coordination. The focus this year was on collaborative long term exhibit planning, national profile raising exhibits in Vancouver and Ottawa and continued work on a new museum passport for the capital region. The efforts have resulted in a new collaborative approach among senior marketing officers, senior financial officers and senior procurement officers.

Outcome #5: Be a national leader in sustainable museum enterprise operations within an international best practice context.

Outcome	Measure	2015–2016 Performance Target	2015–2016 Performance Actual
Be a national leader in sustainable museum enterprise operations within an international best practice context.	Earned revenue as % of total budget	• 20%	• 30%
	Penetration of tourist market	• 12%	• 15.4%
	Advancement revenue as % of earned revenue	• 17%	• 21%
	Number of experience connections per FTE and per dollar spent	<ul><li>25,000</li><li>\$10.00</li></ul>	<ul><li>22,254</li><li>\$11.00</li></ul>
	Conversion of connections to stakeholders relationships	• 20,000	• 21,656
	Number of media mentions	• 1,200 annual	• 1410 annual
	Align the performance management and succession plans to support the enterprise model and the skills and human resources needed.	Apply new succession plan – year two	• Fully active

our people

# Board of Trustees

The Board of Trustees is the Museum's governing body, responsible to Parliament through the Minister of Canadian Heritage. The 11 members are Governor-in-Council appointees from all regions of Canada. Through accountability and strategic policy and planning frameworks, the Board provides corporate direction and delegates authority to the President and CEO for the management of the Museum. In 2015–2016, the Board met four times, either in person, by conference call or by videoconference. Ten meetings of the Committees of the Board were held.

# Standing Committees

**Executive Committee** Stephen Henley, Chair

Mandate: The Executive Committee's sole purpose is to act for the Board on urgent matters arising between regular Board meetings in cases where it is not possible to convene a meeting of the Board, and to do other things as delegated by the Board to the Committee

# Audit and Finance Committee Ron Calderoni, Chair

Mandate: The Audit and Finance Committee is responsible for overseeing the Canadian Museum of Nature's standards of integrity and behaviour, the integrity and credibility of the Canadian Museum of Nature's financial reports, and the systems and practices of internal control.

# Governance and Nominating Committee

Nicholas Offord, Chair

Mandate: The Governance and Nominating Committee is responsible for monitoring when terms of office for members of the Board of Trustees expire and for recommending to the Board individuals to be nominated for appointment or reappointment as Trustees and to undertake annually the President's performance review.

# **Board of Trustees**

#### Stephen Henley

Chairperson St. John's, Newfoundland (06-Jun-2013 - 05-Jun-2017)

#### **Nicholas Offord**

Vice-Chairperson Toronto, Ontario (30-Sep-2010 - 11-Dec-2018)

#### Ron Calderoni

Boucherville, Québec (05-Apr-2012 - 04-Apr-2016)

#### **Doug Feasby**

Ottawa, Ontario (06-Mar-2014 - 05-Mar-2018)

#### Martin Joanisse

Gatineau, Quebec (27-Jun-2006 - 26-Jun-2013)

#### Susan Knott

Vancouver, British Columbia (10-Apr-2014 - 09-Apr-2018)

#### Reg Manhas

Dallas, Texas (01-Mar-2012 - 29-Feb-2016)

#### Alice McCarron

Halifax, Nova Scotia (21-Dec-2010 - 20-Dec-2013)

# **Byron Neiles**

Calgary, Alberta (20-Oct-2011 - 19-Oct-2015)

#### Erin Rankin Nash

London, Ontario (24-Feb-2008 - 29-Feb-2016)

#### **Corporate Secretary**

Irene Byrne

# Executive staff

# Margaret Beckel

President and Chief Executive Officer

#### Ailsa Barry

Vice President, Experience and Engagement

#### Mark Graham

Vice President, Research and Collections

#### **Charles Bloom**

Interim Vice President, Corporate Services and Director Information Management and Information Technology

# Management Team

#### Carol Campbell

Director, Content

# Kathleen Conlan

Section Head, Zoology

#### **Scott Ercit**

Section Head, Mineralogy

# Robyn Gilchrist

Director, Human Resources

#### Ellen Ewert

Interim Director, Advancement

# Angeline Laffin

Director, Visitor Experience

#### Martin Leclerc

Director, Facilities and Protection

#### Michel Poulin

Section Head, Botany

#### Kathlyn Stewart

Section Head, Palaebiology

#### John Swettenham

Director, Marketing and Media Relations

#### Ikram Zouari

Interim Director, Finance

communicating research results



# Research and Collections Staff

Museum staff published 53 articles in refereed journals – which have other scientists review all articles submitted before they are accepted for publication – and 25 in non-refereed publications. Museum staff also published a selection of books, reports and other papers. A complete list follows (names in boldface are Museum staff members). Publications are listed in the language in which they are written.

# Refereed publications (53)

Webster, R.P., R.S. Anderson, V.L. Webster, C.A. Alderson, C.C. Hughes, J.D. Sweeney. 2016. New Curculionoidea records from New Brunswick, Canada with an addition to the fauna of Nova Scotia. Zookeys, 573:367-386.

Anderson, R.S. 2016. A taxonomic revision of the genus Lymantes Schoenherr 1838 in the United States of America (Coleoptera; Curculionidae; Molytinae; Lymantini). The Coleopterists Bulletin, 70(1):111-124.

Anderson, R.S. 2015. Pereskiophaga brasiliensis, a new genus and species of Cryptorhynchinae (Coleoptera: Curculionidae) associated with primitive cacti of the genus Pereskia Miller (Cactaceae) in Brazil. The Coleopterists Bulletin, 69:670-673.

Yoshitake, H. and R.S. Anderson. 2015. A review of the genus Orchestomerus Dietz (Curculionidae; Ceutorhynchinae; Cnemogonini) of the USA. The Coleopterists Bulletin, 69:565-578.

Anderson, R.S. and C. Wright. 2015. Asperosoma echinatum (Fall) (Coleoptera: Curculionidae, Ceutorhynchinae): First record from USA. The Coleopterists Bulletin, 69(2):272-273.

Anderson, R.S. and M.A. Ivie. 2015. Two new species of metallic green Pandeleteius Schönherr (Coleoptera; Curculionidae; Entiminae; Tanymecini) from the West Indies. The Coleopterists Bulletin, 69(2):319-323.

Jouladeh R., E. Arash, E. Soheil, R. Hamid, B.W. Coad and N. Bogutskaya. 2016. A molecular approach to the genus Alburnoides using COI sequences data set and the description of a new species, A. damghani, from the Damghan River system (the Dasht-e Kavir Basin, Iran) (Actinopterygii: Cyprinidae). ZooKeys, 579:157-181.

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Esmaeili, H.R., S. Babai, A. Gholamifard, A. Pazira, A. Gholamhosseini and B.W. Coad. 2015. Fishes of the Persis region of Iran: an updated checklist and ichthyogeography. Iranian Journal of Ichthyology, 2(3):201-223.

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Coad, B.W. 2015. Review of the milkfishes of Iran (Family Chanidae). Iranian Journal of Ichthyology, 2(2):65-70.

Sayyadzadeh, G., H.R. Esmaeili, K. Abbasi and B.W. Coad. 2015. Re-validation of Gonorhynchus adiscus and G. diplochilus (Teleostei: Cyprinidae) using morphological and molecular data. Zoology in the Middle East, 61(4):349-361.

Coad, B.W. 2015. Review of the sticklebacks and pipefishes of Iran (Families Gasterosteidae and Syngnathidae). Iranian Journal of Ichthyology, 2(3):133-147.

Coad, B.W. 2015. Review of the spiny eels of Iran (Family Mastacembelidae). Iranian Journal of Ichthyology, 2(1):1-12.

Coad, B.W. 2015. Review of the freshwater catfishes of Iran (Order Siluriformes). Iranian Journal of Ichthyology, 1(4) (2014):218-257.

Coad, B.W. 2016. Contribution to the knowledge of the snakeheads of Iran (Family Channidae). Iranian Journal of Ichthyology, 3(1):65-72.

Conlan, K.E., D.R. Currie, S. Dittmann, S.J. Sorokin, E. Hendrycks. 2015. Macrofaunal patterns in and around du Couedic and Bonney submarine canyons, South Australia. PLoS ONE, 10(11): e0143921. DOI:10.1371/journal.pone.0143921.

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Génier, F. and P. Arnaud. 2016. Dendropaemon Perty, 1830: taxonomy, systematics and phylogeny of the morphologically most derived phanaeine genus (Coleoptera: Scarabaeidae, Scarabaeinae, Phanaeini). Zootaxa, 4099(1):1-125. DOI: 10.11646/ zootaxa.4099.1.1.

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Pla-Rabes, S., P.B. Hamilton, E. Ballesteros, M. Cavrilo, A.M. Friedlander and E. Sala. 2016. The structure and diversity of freshwater diatom assemblages from Franz Josef Land Archipelago: a northern outpost from freshwater diatoms. PeerJ, 4:e1705.

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Coad, B.W. 2015. [Abstract]. The fishes of Sa`dī's Tomb. The Third Iranian Conference of Ichthyology, Abstract Booklet, p. 1-7, Shiraz, 6-7 May.

Conlan, K.E. and E. Hendrycks. 2015. [Abstract]. An ampeliscid amphipod hotspot provides a Canadian Arctic destination for the Pacific gray whale (Eschrichtius robustus). 16th International Colloquium on Amphipoda. Aveiro, Portugal, September 7-11.

Godfrey, S. and L.J. Gillespie. 2015. [Abstract]. Systematics and Phylogeography of Parrya (Brassicaceae) in the North American Arctic. Talk presented at Botany 2015, Edmonton, Alberta, 7-11 July.

Cardinal-McTeague, W.M. and L.J. Gillespie. 2015. [Abstract]. Evolution of pollen morphology in tribe Plukenetieae (Euphorbiaceae). Botany 2015. Edmonton, Alberta, 7-11 July.

**Hamilton. P.B.**, K.E. Lefebvre and **R.D. Bull** 2015. [Abstract]. A comprehensive approach to diatom taxonomic genetic studies and barcoding from single cell PCR amplifications using fresh and preserved samples. 23<sup>rd</sup> North American Diatom Symposium, Beaver Island, Michigan. 9-13 September.

Hamilton. P.B., K.E. Lefebvre and R.D. Bull 2015. [Abstract]. A comprehensive approach to diatom taxonomic genetic studies and barcoding from single cell PCR amplifications using fresh and preserved samples. Speciation in Ancient Lakes 7 (SIAL), Windsor, Ontario. 17-20 August.

Lefebvre, K.E. and **P.B. Hamilton** 2015. [Abstract]. Morphology and molecular studies on large *Neidium* species of North America, including an examination of Ehrenberg's types. 23<sup>rd</sup> North American Diatom Symposium, Beaver Island, Michigan. 9-13 September.

Lefebvre, K.E. and **P.B. Hamilton** 2015. [Abstract]. Morphology and molecular studies on large *Neidium* species of North America, including an examination of Ehrenberg's types. Phycological Society of America, Philadelphia, Pennsylvania. 10-13 August.

Cvetkoska, C., **P.B. Hamilton** and Z. Levkov 2015. [Abstract]. *Surirella prespanensis* sp. nov. and *Surirella hinziae* sp. nov., two new diatom (Bacillariophyceae) species from ancient Lake Prespa (Macedonia/Albania/Greece. Speciation in Ancient Lakes 7 (SIAL), Windsor, Ontario. 17-20 August.

Tantu, F.Y., G.D. Haffner, **P.B. Hamilton**, J.S. McKinnon and J. Nilawati 2015. [Abstract]. Fisheries activity, alien species introduction and extinction threats on the endemic aquatic biotas from Sulawesi ancient lakes, Indonesia. Speciation in Ancient Lakes 7 (SIAL), Windsor, Ontario. 17-20 August.

**Hamilton, P.B.** 2015. [Abstract] Eutrophication, simple modelling. 1st Sino-Canada Workshop on Plateau lakes Research. Kunming, China, 21–24 June.

**Hamilton, P.B.** 2015. [Abstract]. Climate, natural disasters and humans: a cross-roads for temporal and spatial pollution. 4<sup>th</sup> Non-Point Source Pollution and Water Management Workshop Summarizing Ontario-China Research and Innovation Funding the Three Gorges Reservoir. Chongqing, China, 14–17 June.

**Hendrycks, E.A.** 2015. [Abstract]. A new species of the rarely collected deep-sea genus *Vemana* (Amphipoda: Vitjazianidae) from the DIVA-2 cruise in the southeast Atlantic. 16<sup>th</sup> International Colloquium on Amphipoda, Aveiro, Portugal, 7-11 September.

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**Saarela, J.M.** 2016. [Abstract] The critical role of natural history collections in documenting biodiversity of the Arctic in the past, present and future. Arctic Science Summit Week and Arctic Observing Summit, Fairbanks, Alaska.

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**Saarela, J.M.** and **S.** Asensio. 2015. [Abstract]. The role of natural history collections data in documenting the biological and geological diversity of the Arctic, with examples from the Canadian Museum of Nature. Polar Data Forum II, University of Waterloo, Waterloo, Ontario. 27-29 October.

LeDrew, E.F., J.E. Friddell and **J.M. Saarela**. Canadian Polar Data Workshop Participants (including J.M. Saarela). 2015. [Abstract]. A national consultation for coordination of the Canadian Polar Data Management community. Polar Data Forum II, University of Waterloo, Waterloo, Ontario. 27-29 October.

# Reports and other (24)

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# Research/Museum Associates

Dr. George Argus, Merrickville, ON

Dr. Ed Bousfield, Mississauga, ON

Dr. Fenja Brodo, Ottawa, ON

Dr. Irwin Brodo, Ottawa, ON

Dr. Michael Caldwell, Edmonton, AB

Dr. Francis Cook, North Augusta, ON

Dr. François Chapleau, Ottawa, ON

Dr. Steve Cumbaa, Ottawa, ON

Mr. Gerald Fitzgerald, Ottawa, ON

Mr. Colin Freebury, Ottawa, ON

Mr. Robert Gault, Clayton, ON

Dr. Joel Grice, Ottawa, ON

Dr. Richard Harington, Ottawa, ON

Dr. Sanja Hinić-Frlog, Gatineau, QC

Dr. Robert Holmes, Edmonton, AB

Mrs. Anne Howden, Victoria, BC

Mr. Jean Lauriault, Gatineau, QC

Dr. Danna Leaman, Ottawa, ON

Dr. Geoff Levin, Chelsea, QC

Mr. Chris Lewis, Lakefield, ON

Dr. Hillary Maddin, Ottawa, ON

Dr. Peter Outridge, Ottawa, ON

Dr. Jarmila Kukalavà-Peck, Ottawa, ON

Dr. Stewart Peck, Ottawa, ON

Dr. Claude Renaud, Orleans, ON

Dr. Dale Russell, California, USA

Dr. Michael Ryan, Cleveland, OH

Dr. Natalia Rybczynski, Chelsea, QC

Dr. Tamaki Sato, Tokyo, Japan

Dr. Frederick Schueler, Bishop Mills, ON

Dr. Andrew Smith, Ottawa, ON

Dr. Robin Smith, Calgary, AB

Dr. Julian Starr, Gatineau, QC

Dr. Valerie Tait, Ottawa, ON

Dr. Kyo Tanoue, Fukuota, Japan

Dr. Robert Waller, Ottawa, ON

Mrs. Willow Wight, Ottawa, ON

# Refereed publications (32)

**Brodo, I.M.** and J.C. Lendemer. 2015. A revision of the saxicolous, esorediate species of *Ainoa* and *Trapelia* (Baeomycetaceae and Trapeliaceae, lichenized Ascomycota) in North America, with the description of two new species. *Bryologist*, 118:385-399.

**Brodo, I.M.** 2016. Keys to Lichens of North America: Revised and Expanded. Yale University Press, New Haven. xi + 425 pp.

Simões, T.R., **M.W. Caldwell,** A. Palci and R.L. Nydam. 2016. Squamate phylogeny and giant taxon-character matrices: Quality of character constructions remains critical regardless of size. *Cladistics*, DOI: 10.1111/cla.12163 (1-22).

Simões, T.R., R.L. Nydam, **M.W. Caldwell**, G. Funston, M. Doschak. 2016. Reacquisition of the lower temporal bar in lizards provides a rare case of convergent evolution. *Scientific Reports*, 6:24087. DOI: 10.1038/srep24087 (1-12).

Jimenez-Huidobro, P. and **M.W. Caldwell.** 2016. Reassessment and reassignment of the early Maastrichtian mosasaur *Hainosaurus bernardi* Dollo, 1885 to *Tylosaurus* Marsh, 1872. *Journal of Vertebrate Paleontology*. DOI: 10.1080/02724634.2016.1096275.

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**Grice, J.D., R. Rowe** and **G. Poirier**. 2015. Garronite-Na, IMA 2015-015. CNMNC Newsletter No. 26 page 944; *Mineralogical Magazine*, 79:941-947.

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Grice, J.D., R. Rowe and G. Poirier. 2015. Bussyite-(Y), a new beryllium silicate mineral species from Mont Saint-Hilaire, Quebec. Canadian Mineralogist, 53:235-248.

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Waterway, M.J., K.A. Ford, M. Luceño, S. Martín-Bravo, J.R. Starr, K.L. Wilson, O. Yano, S. R. Zhang, E.H. Roalson, W.S. Alverson, L.P. Bruederle, J.J. Bruhl, K.-S. Chung, T.S. Cochrane, M. Escudero, B.A. Ford, S. Gebauer, B. Gehrke, M. Hahn, A.L. Hipp, M.H. Hoffmann, T. Hoshino, P. Jiménez-Mejías, X.-F. Jin, J. Jung, S. Kim, E. Maguilla, T. Masaki, M. Miguez, A. Molina, R.F.C. Naczi, A.A. Reznicek, P.E. Rothrock, D.A. Simpson, D. Spalink, W.W. Thomas, T. Villaverde. 2015. Making Carex monophyletic (Cyperaceae, tribe Cariceae): a new broader circumscription. Botanical Journal of the Linnean Society, 179:1-42.

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- Our travelling exhibits reach over 1M people each year.
- We research and collaborate in over 110 cities around the world.
- Our collections are loaned to organizations in over 70 cities around the world.

Collaborators are organizations such as universities, research institutes, museum or government agencies that work with the Museum on a range of projects including research activities, programming and exhibitions. These affiliations are part of the Museum's regional, national and international network, allowing the Museum to share its resources with others and enhance its effectiveness in connecting people with nature.

# International

Akvaplan-NIVA, Fram Centre for Climate and the Environment, Tromsø, Norway

American Museum of Natural History, New York, New York

Arizona State University, Tempe, Arizona

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Arkansas State University, Jonesboro, Arkansas

Auburn University, Auburn

Austin Peay State University, Clarksville

Australian Museum, Sydney, Australia

Black Hills Institute, Hill City, South Dakota

California Academy of Sciences

California State University, Los Angeles, California

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Central Michigan University, Mt. Pleasant, Michigan

Charles University, Prague, Czech Republic

Chinese Academy of Sciences, Shanghai, China

Ciudad Universitaria, Copilco, Coyoacan, Mexico City, Mexodi

Clemson University, Clemson

Cleveland Museum of Natural History, Cleveland, Ohio

Colorado Plateau Museum of Arthropod, Flagstaff

Cornell University, Ithaca, New York

Curtin University, Bentley, Australia

Dankook University, Yongin-si, South Korea

**Duke University, Durham** 

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Florida Department of Agriculture and Consumer Services, Gainesville, Florida

Florida State University Coastal and Marine Laboratory,

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Fort Hays State University, Hays

GHD, Doha, Qatar

Global Biodiversity Information Facility, Copenhagen,

Denmark

Hungarian Natural History Museum, Budapest, Hungary

Icelandic Institute of Natural History, Akureyri, Iceland

Indian River Research and Education Centre, Ft. Pierce

Indiana University - Purdue University Fort Wayne,

Fort Wayne, Indiana

Institute of Technology Cambodia, Phnom Penh, Cambodia

Instituto Nacional de Pesquisas da Amazonia, Manaus, Brazil

Karl-Franzens-Univesitat Graz, Graz, Austria

Kutztown University, Kutztown

Lindblad Expeditions, New York, New York

Louisiana State University, Baton Rouge

Macquarie University, North Ryde, Australia

Michigan State University, East Lansing

Midwestern University, Glendale, Arizona

Ministry of Mines and Energy, Phnom Penh, Cambodia

Missouri Botanical Garden, St. Louis, Missouri

Montana State University,, Bozeman

Moss Landing Marine Laboratories, California State University,

Moss Landing, Australia

Musée national d'histoire naturelle, Paris, France

Museo Nacional de Historia Natural, Rio de Janeiro, Brazil

Museum für Naturkunde, Berlin, Germany

Muséum national d'histoire naturelle, Paris, France

Museum of Comparative Zoology, Harvard University,

Cambridge, Massachusetts

Museum of China, Beijing, China

National Institute for Agro-Environmental Sciences,

Tsukuba, Japan

National Museum, Prague, Czech Republic

National Museum of Natural History Naturalis,

Leiden, Netherlands

Natural History Museum, London, United Kingdom

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Royal Botanical Garden, Edinburgh, United Kingdom

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San Bernardino County Museum, Redlands, California

Scripps Institution of Oceanography, San Diego, California

Senckenberg Forschungsinstitut und Naturmuseum, Frankfurt, Germany

Senckenberg Museum of Natural History Görlitz, Görlitz, Germany

Senckenberg Institute and Museum, Wilhelmshaven, Germany

Shiraz University, Shiraz, Iran

Smithsonian Institution, Washington, D.C.

Smithsonian's National Museum of Natural History, Washington, DC

Society for the Preservation of Natural History Collections, New York City, New York

South Dakota Geological Museum, Rapid City, South Dakota

Southern Illinois University, Carbondale, Illinois

Staatliche Naturhistorische Sammlungen, Dresden, Germany

State University of New York College of Environmental Science and Forestry, Syracuse, New York

Stephen F. Austin State University, Nacogdoches, Texas

Sternberg Museum of Natural History, Fort Hays State University, Hays, Kansas

Swedish Museum of Natural History, Stockholm, Sweden

TDWG - Biodiversity Information Standards, San Francisco, California

Texas Natural Science Center, Austin, Texas

The Field Museum, Chicago, Illinois

The Morton Arboretum, Lisle, Illinois

The Natural History Museum, London, United Kingdom

The New York Botanical Garden, New York City, New York

Tokyo Gakugei University, Tokyo, Japan

Tulane University (FishNet), New Orleans, Louisiana

Universidad Autónoma de Queréaro

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University of Bergen, Bergen, Norway

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University of Oslo, Oslo, Norway

University of Tasmania, Hobart, Tasmania

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University of Wisconsin, Madison, Wisconsin

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University of Uppsala, Uppsala, Sweden

University of Washington, Seattle, Washington

University of Wisconsin, Madison, Wisconsin

University of Wrocklaw, Wrocklaw, Poland

Uppsala University, Uppsala, Sweden

Western Kentucky Unviersity, Bowling Green, Kentucky

Western Washington University, Bellingham, Washington

Zoologisches Forschungsmuseum Alexander Koenig,

Bonn, Germany

University of Kentucky, Lexington, Kentucky

University of Michigan, Ann Arbor, Michigan

University of Mississippi, Oxford, Mississippi

University of New Mexico, Albuquerque, New Mexico

University of Oslo, Oslo, Norway

University of Tasmania, Hobart, Tasmania

University of Tokyo, Merguro, Tokyo, Japan

University or Torino, Torino, Italy

University of Uppsala, Uppsala, Sweden

University of Washington, Seattle, Washington

University of Wisconsin, Madison, Wisconsin

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Uppsala University, Uppsala, Sweden

Victoria Museum, Melbourne, Australia

Western Kentucky Unviersity, Bowling Green, Kentucky

Western Washington University, Bellingham, Washington

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Bonn, Germany

# **National**

Alberta

Angkor Gold Corporation, Sexsmith

Esplanade Arts and Heritage Centre, Medicine Hat

Pipestone Creek Dinosaur Initiative, Clairmont

Provincial Museum of Alberta, Edmonton

Royal Alberta Museum, Edmonton

Royal Tyrrell Museum of Palaeontology, Drumheller

Stuart MacPherson Public Library, Lac la Biche

University of Alberta, Edmonton

University of Calgary, Calgary

British Columbia

Bamfield Marine Science Centre, Bamfield

**Beaty Biodiversity Museum** 

Geological Survey of Canada, Vancouver

Ministry of Environment and BC Parks - Victoria

Qualicum Beach Museum, Qualicum Beach

Royal British Columbia Museum, Victoria

The Exploration Place, Prince George

University of British Columbia, Vancouver

Vancouver Aquarium, Vancouver

Manitoba

**Arctic Climate Change Youth Forum** 

Build Films, Winnipeg

Canadian Museum for Human Rights, Winnipeg

Fisheries & Oceans Canada, Winnipeg

The Manitoba Museum, Winnipeg

University of Manitoba, Winnipeg

New Brunswick

Fisheries and Oceans Canada, Moncton

New Brunswick Provincial Museum, St. John

Université de Moncton, Campus d'Edmundston, Edmundston

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Johnson Geo Centre, St. John's

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St. Francis Xavier University, Antigonish

Nunavut

Government of Nunavut

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Ontario

Agriculture and Agri-Foods Canada, Ottawa

Algonquin College, Ontario

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Cambridge Butterfly Conservator, Cambridge

Canada Council for the Arts, Ottawa

Canada Science and Technology Museum, Ottawa

Canadian Association for Conservation, Ottawa

Canadian Biodiversity Information Facility, Ottawa

Canadian Conservation Institute, Ottawa

Canadian Committee of the International Union for the

Conservation of Nature, Ottawa

Canadian Forest Service, Ottawa

Canadian Geographic

Canadian Mining Hall of Fame, Toronto

Canadian Wildlife Federation. Ottawa

Canadian Wildlife Service, Ottawa

Canterbury High School, Ottawa

Carleton University, Ottawa

Committee on the Status of Endangered Wildlife in Canada,

Ottawa

Creative Nature Studio. Cornwall

Environment Canada, Ottawa

Feheley Fine Arts, Toronto

Fleming College, Peterborough



Foreign Affairs, Trade and Development, Ottawa

Inuit Circumpolar Council, Ottawa

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Land Force Central Training Centre, Meaford

Lateral Office. Toronto

Laurentian University, Sudbury

Meet the North, Ottawa

Mining Association of Canada, Ottawa

Ministry of Natural Resources, Ottawa

National Arts Centre, Ottawa

National Capital Commission, Ottawa

National Committee on Inuit Education, Ottawa

National Gallery of Canada, Ottawa

Nipigon Historical Museum, Nipigon

Nunavut Sivuniksavut, Ottawa

Oceans North, Ottawa

Ontario Field Naturalists, Ottawa

Ontario Ministry of Environment and Climate Change (MOECC), Ottawa

Ontario Ministry of Natural Resources, Pembroke

Ottawa Catholic School Board, Ottawa

Ottawa Field Naturalists' Club, Ottawa

Ottawa Riverkeeper, Ottawa

Past Recovery Archaeological Services Inc., Maberly

Peel Art Gallery, Brampton

Peterborough Centennial Museum and Archives, Peterborough

Polar Continental Shelf Program, Ottawa

Polar Knowledge Canada, Ottawa

Queen's University, Kingston

Royal Botanic Gardens, Hamilton

Royal Norwegian Embassy, Ottawa

Royal Ontario Museum, Toronto

Science North, Sudbury

St. Lawrence Islands National Park, Mallorytown

Story Centre Canada, Toronto

Toronto Zoo, Scarborough

University of Guelph, Guelph

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University of Toronto, Toronto

University of Western Ontario, London

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Ministère des ressources naturelles et de la faune du

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Montreal Biodome, Montreal

Montreal Insectarium, Montreal

**Montreal Space for Life** 

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Musée d'histoire naturelle de Miguasha, Nouvelle

Musée du Fjord, Saguenay

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Parks Canada, Gatineau

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Quality Engineering Test Establish, Gatineau

Redpath Museum, Montreal

Société Québécoise de bryologie, Saint-Valérien-de-Rimouski

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Université de Montréal (Canadensys), Montréal

Université du Québec à Rimouski, Rimouski

Université du Québec à Chicoutimi, Saguenay

#### Saskatchewan

International Centre for Northern Governance and Development, University of Saskatchewan, Saskatoon

Royal Saskatchewan Museum, Regina

Strasbourg and District Museum, Strasbourg

T. Rex Discovery Centre, Eastend

#### Yukon

NatureServe Yukon, Yukon Department of the Environment, Whitehorse

Yukon Arts Centre, Whitehorse

Yukon Beringia Interpretive Centre, Whitehorse



The Canadian Museum of Nature's (the "Museum") primary objective is to fulfill its national mandate as described in the Museums Act, within the context of the governance and accountability regime established in that Act and Part X of the Financial Administration Act. To this end, the Museum's Board of Trustees and Management are committed to managing the public and private funds invested in the Museum in a transparent, accountable manner and to optimizing the value of the contribution the Museum makes to Canadians and to Canadian society.

# Management Discussion and Analysis Financial overview

The Museum has made significant progress towards achieving financial sustainability through a combination of revenue generation and expenditure reduction measures implemented over the past six years. In order to maintain financial sustainability, the Museum will strive to increase self-generated revenues by 5% annually while limiting increases in expenditures to 1% annually. To enable that outcome, the Museum is shifting from an appropriation based operating model to a sustainable museum enterprise operating model. This shift is meant to foster innovation and calls for new skills and accountabilities for staff and volunteers. The challenge for the Museum is ensuring this shift happens at the required pace through recruitment, training and performance management.

An example of this shift to a sustainable museum enterprise operating model is the success of the Animal: Inside Out temporary exhibition which was opened at the Museum from May 2015 to September 2015 and the Bugs: Outside the Box exhibition which was opened at the Museum from October 2015 to March 2016. A strong special temporary exhibition program along with an effective marketing and media relations campaign explains in part the significant year over year increase in attendance and revenues. Again this year, programs such as Nature Nocturne evenings have also contributed to the significant increase in attendance and the revenues - these adult only evenings have seen sold out crowds and a new perspective on the Museum as a place for young adults. The aforementioned revenue generation measures are in addition to those initiated in the previous three years such as the introduction of a new pricing structure for admissions, surcharges for major temporary exhibitions, value based pricing for education programs, new programming such as the 3D Theatre, aggressive membership marketing and automated parking. Other important initiatives were the revenues generated from collections storage and management service fees and facility leasing fees to fund strategic investments in the Centre for Arctic Knowledge & Exploration and the Centre for Species Discovery & Change. In 2015-2016 the Museum generated revenue excluding specimen donations and inkind sponsorships equivalent to 30 percent of base operating costs, compared to 24 percent in the previous year, well above its target of 20 percent.

An important element of a current and relevant visitor experience will be an ongoing improvement and enhancement of the Museum's Fossil gallery that will house the newly acquired 'Judith', fossils of a new species of ceratopsian dinosaur from the cretaceous period. For the permanent display of Judith, a second new exhibit featuring a Judith replica with digital enhancements will be placed in the Fossil Hall.

The Museum continuously reviews its programs, its means of delivery and its supporting activities to ensure they remain relevant to Canadians. Given the expenditure reduction measures implemented in previous years and recognizing the financial pressures of many museums across the country, the Museum embarked on collaboration with Science North to share equally in the costs of developing a traveling exhibition on the Arctic. Through the collaboration both institutions were able to

build a larger and more content rich show than they would have been able to do alone. The collaboration to co-create Arctic Voices was initiated in June 2013, and initially opened at Science North in March 2014 and subsequently opened at the Museum in December 2014. This exhibition is a forerunner for a new permanent Arctic gallery at the Museum to open in 2017 in celebration of Canada's 150th anniversary of Confederation. In addition the Museum is developing an outdoor exhibit area featuring the "Regions of Canada Garden" on its grounds. The first phase of the gardens were completed in the fall of 2015 including plantings and installation of the Arctic sculpture in the tundra section. The public unveiling will be held in June 2016 along with associated public programming. In 2015-2016 there was another successful collaboration, this one with Canadian Geographic to create the Arctic Alive Giant Floor Map that reached 20,000 school kids. This collaboration model reflects a direction the Museum will continue to pursue to leverage scarce resources to best effect.

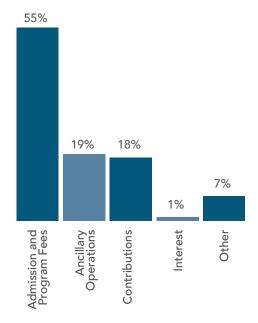
The Museum continued to identify and act on opportunities for collaboration with the national museums that improve effectiveness and efficiency. The Museums now have a systematic approach for identifying and advancing coprocurement projects, cooperative exhibit scheduling and cooperative marketing projects. Over the last two years the Museum collaborated with other national museums on two requests for proposals that resulted in combined annual savings to the Museum of approximately \$129,000.

Building a high performance advancement operation focussed on developing a pipeline of annual, sponsorship and major gifts prospects and donors is an important element of the sustainable museum enterprise operating model and to the success of the Museum in the future. During the prior year a new advancement strategy focused on building support from individual, corporate and foundation donors was launched that included a Patron Circle fundraising program and a National Nature Council to raise the Museum's profile and raise funds in support of the Museum's position as a leader in Arctic research and discovery. The Museum was successful in significantly expanding its pipeline of potential donors, while acknowledging that much more work needs to be done to achieve a robust group of prospective supporters to support the \$25 million overall fundraising goal. In 2015-2016, the Museum received support from individual and corporate donations, sponsorships, memberships, collaborations, and in-kind support for research and collections and from the media totalling \$7.1 million, exceeding the annual goal of \$5.0 million. These cash and inkind commitments secured through the Museum's fundraising activities are broader in scope than the Contributions recognized on the Museum's Statement of Operations.

In spite of the progress towards achieving financial sustainability, addressing the financial pressures related to operating the two facilities under its stewardship remains as the most critical issue facing the Museum as it is still vulnerable to the impact of inflation on key inputs such as utilities and property taxes. In 1996, Treasury Board approved a management regime that devolved the responsibility for funding non-discretionary fixed costs related to facilities from Public Works and Government Services Canada (PWGSC) to individual organizations. Unlike PWGSC and the Department of National Defence, most departments, agencies and Crown corporations did not receive the authority to seek annual adjustments in their appropriation to reflect increases in non-discretionary fixed costs related to facilities. At the time, it was anticipated that this could eventually pose challenges to small cultural organizations like museums. The Museum has in place a number of strategies designed to manage both known and anticipated pressures. An enterprise risk management approach is being used to manage these strategies and pressures in support of the vision to inspire understanding and respect for nature.

#### Revenue

(Excluding parliamentary appropriations)



# **Financial Performance**

### Revenue and parliamentary appropriations

Revenue and parliamentary appropriations decreased to \$39.9 million in 2015-2016 from \$42.5 million in 2014-2015 with appropriations representing 78 percent of the total in 2015-2016 compared to 79 percent in 2014-2015.

The Museum has established a target of generating revenue excluding specimen donations and in-kind sponsorships equivalent to 20 percent of base operating costs. In 2015-2016, with attendance reaching 485,154 (410,293 in 2014-2015), the Museum surpassed its target with revenue excluding specimen donations and in-kind sponsorships equivalent to 30 percent of base operating costs (24 percent in 2014-2015).

#### **Parliamentary Appropriations**

On an accrual basis, parliamentary appropriations decreased by \$2.4 million to \$31.0 million in 2015-2016 from \$33.4 million in 2014-2015. The reduction was due to a decrease of the year over year difference in the amount of \$2.6 million due to the variation in deferred capital appropriations which is mainly attributable to the decrease in amortization of deferred capital funding. This decrease is a result of changes in 2015-2016 to the estimated useful life of the building improvements and leasehold improvements asset classes, offset by an increase in the amount of the appropriations received or receivable, including supplementary appropriations received or receivable for the severance benefits paid during the year of \$0.2 million, as \$0.3 million in supplementary appropriations was recognized in 2015-2016 compared to \$0.1 million in 2014-2015.

#### **Admission and Program Fees**

Revenue associated with admission and program fees, increased by \$0.9 million to \$4.9 million in 2015-2016 from \$4.0 million in 2014-2015 and is consistent with the attendance levels of 485,154 in 2015-2016 and 410,293 in 2014-2015 substantially due to memberships and admission fees, including surcharges related to the Museum's major temporary exhibitions which in 2015-2016 included Animal: Inside Out and Bugs: Outside the Box.

Fees from programs delivered at the VMMB have totaled \$0.6 in 2015-16, the same as 2014-2015 as a result of the continuous success of Nature Nocturne evenings.

### **Ancillary Operations**

Revenue associated with ancillary operations includes rentals of facilities, boutique and cafeteria leases, and parking. Revenue from ancillary operations increased by \$0.2 million to \$1.7 million in 2015-2016 from \$1.5 million in 2014-2015. The \$0.2 million increase is due to parking revenue and boutiques and cafeteria leases increase of \$0.1 million each.

#### **Contributions**

Contributions recognized as revenues vary from year to year based upon the resources required to fund research, collections and public education programs including installing new permanent galleries. Contributions including cash contributions and sponsorships, in-kind sponsorships and specimen donations decreased by \$1.1 million to \$1.7 million in 2015-2016 from \$2.8 million in 2014-2015. Of the \$1.1 million decrease \$0.8 million is due to specimen donations and \$0.3 million is due to decrease in

contributions. The Museum has been building its fundraising capacity since 2012 by hiring new professionals, cultivating a pipeline of prospective supporters and packaging attractive projects to support. The individual major gift program has been the most challenging to date. Most donors have asked for government matching funds, as they are used to such programs associated with their other personal priorities.

#### Interest

Interest revenue on cash and restricted cash held in our bank account totaled \$0.1 million in 2015-2016, the same as 2014-2015.

#### Other

Other revenue totaled \$0.6 million in 2015-2016, the same as 2014-2015. Included in other are revenues generated from collections storage and management service fees, travelling exhibitions, publishing and facility leasing fees at the Natural Heritage Campus.

### Expenses

Expenses decreased by \$1.8 million to \$39.0 million in 2015-2016 from \$40.8 million in 2014-2015.

#### **Inspiration and Engagement**

Inspiration and engagement increased to \$9.5 million in 2015-2016 from \$9.3 million in 2014-2015. The \$0.2 increase is mainly attributable to exhibitions expenses which increased by \$0.1 million due to the major temporary exhibitions Animal: Inside Out and Bugs: Outside Box. Marketing and media relations expenses increased by \$0.3 million due to the advertising of major temporary exhibitions. Expenses related to guest services and admission increased by \$0.1 million while personnel costs and professional and special services expenses related to inspiration and engagement decreased by \$0.3 million.

#### **Collections Care and Access**

Collections care and access decreased to \$2.8 million in 2015-2016 from \$3.1 million in 2014-2015. The \$0.3 million decrease is mainly attributable to specimen donations which decreased by \$0.8 million offset by the new fossils acquisition 'Judith' of \$0.5 million.

#### Research and Discovery

Research and discovery decreased to \$4.0 million in 2015-2016 from \$4.2 million in 2014-2015 due to the expenditure reduction measures implemented during the year to address the Museum's financial pressures.

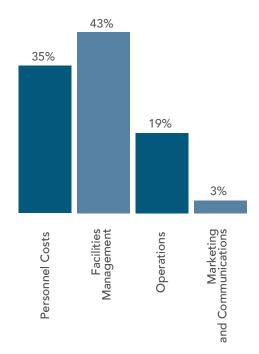
#### **Internal Support Services**

Internal support services totaled \$4.8 million in 2015-2016 the same as 2014-2015. The expenditure reduction measures implemented over the past three years to address the Museum's financial pressures have been maintained.

#### **Buildings and Grounds**

Expenses related to the Museum's buildings and grounds decreased to \$17.8 million in 2015-2016 from \$19.4 million in 2014-2015. Amortization of buildings and grounds

#### **Expenses**



represents \$6.9 million of the total in 2015-2016 and \$7.9 million in 2014-2015 and accounts for the majority of the year over year decrease. The decrease in amortization is a result of changes in 2015-2016 to the estimated useful life of the building improvements and leasehold improvements asset classes. The remaining costs are associated with managing the Museum's two buildings. The new museum-standard environmental control systems and additional space that must now be maintained at the renovated VMMB have placed an additional pressure on the Museum's operating budget. The Museum continues to explore additional facilities cost reduction and control measures in order to minimize the financial impact on its programs.

# Net Results of Operations

The net results of operations resulted in a surplus of \$0.9 million in 2015-2016 which can be attributed to the following:

- Excluding specimen donations the Museum recorded \$1.8 million in revenues in excess of plan, as contributions excluding specimen donations, admission and program fees, and ancillary operations were respectively \$0.7 million, \$1.0, million, and \$0.1 million higher than planned.
- The Museum recorded \$0.3 million in supplementary appropriations received or receivable for severance benefits paid during the year. The payments were the result of collective bargaining and consistent with the Government of Canada's approach, whereby effective April 1, 2012, employees no longer accumulate severance pay upon resignation or retirement. The accumulated severance recorded as an accrued benefit obligation was recognized in prior years and in part paid during the year as per the terms of the collective agreement. Therefore, this resulted in a timing difference between the accrued benefit obligation recognized in prior years and the supplementary appropriations recognized during the year.
- Partially offsetting the surplus is \$0.3 million in expenses due to the accounting treatment related to the Museum's Natural Heritage Campus located in Gatineau, Quebec which is recorded on the Statement of Financial Position as an obligation under capital lease. This accounting treatment will keep the Museum's accumulated deficit in a deficit position for many years due to the interest expense on the capital lease obligation being higher in the earlier years than in the years closer to the end of the lease term. Accordingly, the accumulated deficit related to this accounting treatment will begin to reverse in 2019-2020 until it is fully eliminated by the end of the lease term in 2031. This does not impact the Museum's cash flow or financial stability in any way.
- The Museum recorded \$0.6 million in expenses as a result of the new fossils acquisition "Judith" and the refreshment program of the west side of the Museum and the Fossil Hall.
- The Museum recorded \$0.3 million in expenses attributable to a timing difference between in the recognition of parliamentary appropriations for operating expenditures that are recognized in the fiscal year that they are approved and expenses that are recognized in the fiscal year they are incurred. Specifically, these funds were used to commit and to prepay for major temporary exhibitions and other public education programmes delivered during the year.

### Financial Situation

#### Assets

Cash increased by \$1.0 million to \$8.4 million in 2015-2016 from \$7.4 million in 2014-2015 and is consistent with the increase in attendance levels and revenue associated with admission and program fees

Prepaid expenses of \$0.8 million remained stable year over year. The current year balance includes \$0.3 million for prepaid real property taxes and \$0.3 million used to commit and prepay for major temporary exhibitions.

Capital assets decreased by \$5.1 million to \$189.1 million in 2015-2016 from \$194.2 million in 2014-2015 due to amortization expense of \$7.8 million offset by acquisition of capital assets of \$2.7 million.

#### Liabilities

Deferred revenues, contributions and parliamentary appropriations decreased by \$0.6 million to \$1.0 million in 2015-2016 from \$1.6 million in 2014-2015 due to restricted parliamentary appropriation and restricted contributions spent to acquire capital assets and restricted contributions spent for public education programming.

Deferred capital funding decreased by \$ 4.0 million to \$173.2 million in 2015-2016 from \$177.2 million in 2014-2015 as deferred capital funding is recognized as revenue at the same pace as the amortization of the corresponding capital assets.

#### **Accumulated Deficit**

The accumulated deficit of \$7.9 million as at March 31, 2016, is mainly due to the accounting treatment related to the Museum's Natural Heritage Campus located in Gatineau, Quebec as explained previously under Net Results of Operations. This does not impact the Museum's cash flow or financial stability in any way.



### Objectives for 2016-2017 and Beyond

In 2016-2017, the Museum will advance year three of a new strategic plan that leverages its research and collections strengths in Arctic Knowledge and Species Discovery. New approaches to the design and delivery of visitor experiences will enable the Museum to attract and inspire new audiences. These new engaging experiences will lead to higher memberships, higher membership renewal and will provide a foundation for enhanced fundraising. Overall higher levels of engagement will lead to a better understanding of and connection with Canada's natural world.

The 2016-2017 to 2020-2021 Corporate Plan sets out five strategic objectives:

- To Create a Centre for Arctic Knowledge and Exploration that transforms people's understanding of Canada's Arctic and its relationship with Canada as a country in a 21st century global context.
- To Create a Centre for Species Discovery and Change that transforms people's understanding of the relevance of species diversity to their lives now and in the future.
- To Create a Centre for Nature Inspiration and Engagement that transforms people's expectations of the Canadian Museum of Nature as a destination for discussion, connection and exploration with nature's past, present and future that advances understanding and respect for Canada's natural world.
- To position the Natural Heritage Campus as a centre of excellence in collections management and in knowledge creation, advancement and sharing.
- To create a sustainable museum enterprise model of operation that leverages the Museum's strategic imperatives: knowledge and discovery, inspiration and engagement, presence, performance and advancement.

The strategic directions for the Museum acknowledge the intent to be a leading source of natural history knowledge and scientific inquiry for scientists and the public, thus contributing a distinctly Canadian perspective to the global body of knowledge. The Museum will disseminate the results of this scientific inquiry, thus helping inspire Canadians to act conscionably about the natural environment. As a public institution, the Museum also wishes to continue to demonstrate accountability, value and fiscal effectiveness through achieving measurable, meaningful results.

These measures, combined with the continuing support of the Government of Canada and a highly motivated and skilled team, will allow the Museum to continue to fulfill its mandate to "...increase throughout Canada and internationally, interest in, knowledge of and appreciation and respect for the natural world..."

# Management's responsibility for financial reporting

Management is responsible for establishing and maintaining a system of books, records, internal controls and management practices to provide reasonable assurance that: reliable financial information is produced; the assets of the Corporation are safeguarded and controlled; the transactions of the Corporation are in accordance with the relevant legislation, regulations and by-laws of the Corporation; the resources of the Corporation are managed efficiently and economically; and the operations of the Corporation are carried out effectively.

Management is also responsible for the integrity and objectivity of the financial statements of the Corporation. The accompanying financial statements were prepared in accordance with Public Sector Accounting Standards. The financial information contained elsewhere in this annual report is consistent with that in the financial statements.

The Board of Trustees is responsible for ensuring that management fulfils its responsibilities for financial reporting and internal control. The Board exercises its responsibilities through the Audit and Finance Committee, which includes a majority of members who are not officers of the Corporation. The Committee meets from time to time with management, the Corporation's internal auditors and the Office of the Auditor General of Canada to review the manner in which these groups are performing their responsibilities and to discuss auditing, internal controls, and other relevant financial matters. The Board of Trustees has reviewed the financial statements with the Office of the Auditor General of Canada and has approved them.

The financial statements have been audited by the Auditor General of Canada. His report offers an independent opinion on the financial statements to the Minister of Canadian Heritage.

Margaret Beckel

President and Chief Executive Officer

Ikram Zouari, CPA, CGA

Memforaci

Interim Director of Finance

June 23, 2016 Ottawa, Canada



#### INDEPENDENT AUDITOR'S REPORT

To the Minister of Canadian Heritage

#### Report on the Financial Statements

I have audited the accompanying financial statements of the Canadian Museum of Nature, which comprise the statement of financial position as at 31 March 2016, and the statement of operations, statement of changes in accumulated deficit and statement of cash flows for the year then ended, and a summary of significant accounting policies and other explanatory information.

Management's Responsibility for the Financial Statements

Management is responsible for the preparation and fair presentation of these financial statements in accordance with Canadian public sector accounting standards, and for such internal control as management determines is necessary to enable the preparation of financial statements that are free from material misstatement, whether due to fraud or error.

#### Auditor's Responsibility

My responsibility is to express an opinion on these financial statements based on my audit. I conducted my audit in accordance with Canadian generally accepted auditing standards. Those standards require that I comply with ethical requirements and plan and perform the audit to obtain reasonable assurance about whether the financial statements are free from material misstatement.

An audit involves performing procedures to obtain audit evidence about the amounts and disclosures in the financial statements. The procedures selected depend on the auditor's judgment, including the assessment of the risks of material misstatement of the financial statements, whether due to fraud or error. In making those risk assessments, the auditor considers internal control relevant to the entity's preparation and fair presentation of the financial statements in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the entity's internal control. An audit also includes evaluating the appropriateness of accounting policies used and the reasonableness of accounting estimates made by management, as well as evaluating the overall presentation of the financial statements.

I believe that the audit evidence I have obtained is sufficient and appropriate to provide a basis for my audit opinion.

#### Opinion

In my opinion, the financial statements present fairly, in all material respects, the financial position of the Canadian Museum of Nature as at 31 March 2016, and the results of its operations and its cash flows for the year then ended in accordance with Canadian public sector accounting standards.

#### Report on Other Legal and Regulatory Requirements

As required by the Financial Administration Act, I report that, in my opinion, the accounting principles in Canadian public sector accounting standards have been applied on a basis consistent with that of the preceding year.

Further, in my opinion, the transactions of the Canadian Museum of Nature that have come to my notice during my audit of the financial statements have, in all significant respects, been in accordance with Part X of the Financial Administration Act and regulations, the Museums Act and regulations, the by-laws of the Canadian Museum of Nature, and the directive issued pursuant to section 89 of the Financial Administration Act described in Note 1 to the financial statements.

Etienne Matte, CPA, CA

Principal

for the Auditor General of Canada

23 June 2016 Ottawa, Canada

### Statement of Financial Position as at March 31

(in thousands of dollars)	2016	2015
Assets		
Current		
Cash (Note 3)	8,444	7,440
Restricted cash (Note 3)	775	855
Accounts receivable		
Trade	519	429
Government departments and agencies (Note 16)	527	201
Prepaid expenses	770	746
	11,035	9,671
Collections (Note 4)	1	1
Capital assets (Note 5)	189,136	194,210
	200,172	203,882
Liabilities		
Current		
Accounts payable and accrued liabilities		
Trade	2,573	2,038
Government departments and agencies (Note 16)	449	3
Obligation under capital lease (Note 6)	791	717
Deferred revenues, contributions and parliamentary appropriations (Note 7)	950	1,593
Employee future benefits (Note 8)	319	388
	5,082	4,739
Obligation under capital lease (Note 6)	26,845	27,636
Deferred capital funding (Note 9)	173,154	177,224
Employee future benefits (Note 8)	2,980	3,075
	208,061	212,674
Accumulated Deficit		
Unrestricted	3,765	2,575
Investment in capital assets (Note 11)	(11,654)	(11,367)
	(7,889)	(8,792)
	200,172	203,882

Contractual Obligations and Contingencies (Note 17 and 18).

The accompanying notes form an integral part of the financial statements.

Approved by the Board of Trustees:

**Stephen Henley**Chair of the Board of Trustees

Ron Calderoni, CPA, CA Chair of the Audit and Finance Committee Recommended by Management:

Meg Beckel
President and Chief
Executive Officer

Ikram Zouari, CPA, CGA
Interim Director of Finance

### Statement of Operations for the year ended March 31

(in thousands of dollars)	2016	2015
Revenue		
Admission and program fees (Note 13)	4,902	4,010
Ancillary operations (Note 14)	1,667	1,533
Contributions (Note 15)	1,649	2,780
Interest	112	109
Other	628	596
	8,958	9,028
Expenses (Note 20)		
Inspiration and engagement	9,543	9,345
Collections care and access	2,806	3,063
Research and discovery	4,037	4,196
Internal support services	4,817	4,799
Buildings and grounds	17,823	19,398
	39,026	40,801
Net result of operations before government funding	(30,068)	(31,773)
Parliamentary appropriations (Note 12)	30,971	33,422
Net result of operations	903	1,649

The accompanying notes form an integral part of the financial statements.

### Statement of Changes in Accumulated Deficit for the year ended March 31

(in thousands of dollars)	Unrestricted	Invested in Capital Assets	2016	2015
Accumulated deficit, beginning of year	2,575	(11,367)	(8,792)	(10,136)
Net result of operations	903	-	903	1,649
Transfer of endowment (Note 10)	-	-	-	(305)
Net change in investment in capital assets (Note 11)	287	(287)	-	-
Accumulated deficit, end of year	3,765	(11,654)	(7,889)	(8,792)

The accompanying notes form an integral part of the financial statements.

A statement of remeasurement gains and losses has been excluded as there have been no remeasurement gains or losses.

### Statement of Cash Flows for the year ended March 31

(in thousands of dollars)	2016	2015
Operating activities		
Cash receipts - customers	8,165	7,330
Cash receipts - parliamentary appropriations	26,143	26,327
Cash disbursements - employees	(13,714)	(14,502)
Cash disbursements - suppliers	(13,648)	(14,061)
Interest received	111	119
Interest paid	(2,787)	(2,851)
Cash provided by operating activities	4,270	2,362
Capital activities		
Acquisition of capital assets	(2,641)	(2,417)
Disposition of capital assets	12	-
Cash used in capital activities	(2,629)	(2,417)
Financing activities		
Obligation under capital lease	(717)	(649)
Transfer of endowment	-	(305)
Cash used in financing activities	(717)	(954)
Increase (decrease) in cash and restricted cash	924	(1,009)
Cash, beginning of year	7,440	7,888
Restricted cash, beginning of year	855	1,416
Cash and restricted cash, end of year	9,219	8,295
Cash, end of year	8,444	7,440
Restricted cash, end of year	775	855
Cash and restricted cash, end of year	9,219	8,295

The accompanying notes form an integral part of the financial statements.

# Notes to the Financial Statements for the year ended March 31, 2016

### 1. Authority and Mission

The Canadian Museum of Nature (the "Corporation") was established by the *Museums Act* on July 1<sup>st</sup>, 1990. It is an agent Crown corporation named in Part I of Schedule III of the *Financial Administration Act* (FAA) and is not subject to the provisions of the *Income Tax Act*. The Corporation is classified as a government not-for-profit organization (GNPO).

The Corporation's mission is to increase, throughout Canada and internationally, interest in, knowledge of and appreciation and respect for the natural world by establishing, maintaining and developing for research and posterity a collection of natural history objects, with special but not exclusive reference to Canada, and by demonstrating the natural world, the knowledge derived from it and the understanding it represents.

Brief descriptions of the Corporation's activities are as follows:

#### • Inspiration and engagement

The Corporation develops and maintains exhibitions, programs, the **nature.ca** website, electronic and print publications, revenue generating activities and other activities to foster an understanding of, and respect for, nature.

#### Collections care and access

The Corporation acquires, develops, preserves and makes accessible collections of natural history specimens, objects and information to meet the growing needs of the public and private sectors for research, education and informed decision-making about the natural world.

#### Research and discovery

The Corporation studies the past and helps Canadians prepare for the future by conducting systematics and applied research, and by developing and maintaining networks and linkages with Canadian and international science communities.

#### • Internal support services

The Corporation develops and implements the policies, processes and an accountability structure and processes to oversee the fulfilment of its mandate, including governance, strategic direction, corporate services, monitoring of corporate performance, and reporting to Parliament.

### • Buildings and grounds

The Corporation provides secure and functional facilities that meet all safety and building code requirements. Among these facilities is the renovated Victoria Memorial Museum Building that furthers the vision and mandate of the Corporation.

On July 16, 2015, the Corporation was directed by the Governor General in Council (P.C. 2015-1105) pursuant to Section 89 of the FAA to align its travel, hospitality, conference and event expenditure policies, guidelines and practices with Treasury Board policies, directives and related instruments on travel, hospitality, conference and event expenditures in a manner that is consistent with its legal obligations, and to report on the implementation of this directive in the Corporation's next corporate plan. To fulfill this reporting requirement, and in order to ensure compliance with the directive, the Corporation reviewed and revised its policies, guidelines and practices to align with Treasury Board instruments. As at March 31, 2016, the Corporation is in the process of finalizing the alignment of its policies, guidelines and practices with Treasury Board instruments. Reporting on the implementation of this directive was included in the 2016-2017 to 2020-2021 Corporate Plan.

# 2. Significant Accounting Policies

#### A) Basis of Presentation

The financial statements have been prepared in accordance with Canadian Public Sector Accounting Standards (PSAS), and reflect the application of the Section 4200 series for GNPOs.

#### B) Measurement Uncertainty

The preparation of financial statements in accordance with PSAS requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities at the date of the financial statements and the reported amounts of revenue and expenses for the year. Employee future benefits, the estimated useful lives of capital assets, and the fair market value of specimens donated to the collections are the most significant items for which estimates are used. Actual results could differ significantly from those estimated. These estimates are reviewed annually and as adjustments become necessary, they are recorded in the financial statements in the fiscal year in which they become known.

### C) Collections

The Corporation holds and preserves invaluable collections of natural history specimens for the benefit of Canadians, present and future. The collections are shown as an asset on the Statement of Financial Position at a nominal value of \$1,000 due to practical difficulties in determining a meaningful value for these assets. Specimens purchased for the collections are recorded as an expense in the year of acquisition.

#### D) Capital Assets

- Capital assets are recorded at cost, including material, equipment and other expenses acquired for the purpose of the design and the development of permanent exhibitions.
- Assets recorded as capital leases are initially recorded at the present value of the minimum lease payments at the inception of the lease.
- Land and building owned by the Government of Canada and that are under the control of the Corporation are recorded at their estimated cost.

Amortization is calculated on the straight-line method using rates based on the estimated useful life of the assets, except for leasehold improvements which are amortized on a straight line basis over the shorter of the term of the lease agreement and the asset's useful life.

When conditions indicate that an asset no longer contributes to the Corporation's ability to provide its services, the cost of the asset is written down to its residual value, if any.

Asset	Useful life
Victoria Memorial Museum Building	40 years
Property under capital lease	35 years
Collection cabinets and compactors	35 years
Furnishings and office equipment General equipment Permanent exhibitions Research equipment	10 years
Building improvements	5 to 25 years
Leasehold improvements	5 to end of lease term
Computer equipment	3 years

### E) Employee Future Benefits

#### i) Pension benefits

Substantially all of the employees of the Corporation are covered by the public service pension plan (the "Plan"), a contributory defined benefit plan established through legislation and sponsored by the Government of Canada. Contributions are required by both the employees and the Corporation to cover current service cost. Pursuant to legislation currently in place, the Corporation has no legal or constructive obligation to pay further contributions with respect to any past service or funding deficiencies of the Plan. Consequently, contributions are recognized as an expense in the year when employees have rendered service and represent the total pension obligation of the Corporation.

#### ii) Severance benefits

Employees are entitled to severance benefits up to March 31, 2012, as provided for under labor contracts and conditions of employment.

The severance benefit obligation for employees who retire or resign, that accrued up to March 31, 2012 and remains unpaid, is measured using the projected benefit method. The actuarial gains and losses are amortized over the expected average remaining service life of the related employee group.

Other event driven termination benefits are recognized in the period when the event that obligates the Corporation occurs.

#### iii) Sick leave benefits

The Corporation provides sick leave benefits for employees that accumulate but do not vest. The Corporation recognizes a liability and an expense for sick leave in the period in which employees render services in return for the benefits. The cost of the accrued benefit obligations related to sick leave entitlement earned by employees is actuarially determined using the projected benefit method prorated on service and management's best estimate of inflation, discount rate, employee demographics and sick leave usage of active employees. Actuarial gains (losses) are recognized on a systematic basis over the remaining service life of active employees covered by these sick leave benefits.

### F) Revenue Recognition

#### i) Admission and program fees, ancillary operations and other revenues

Revenues from admission and program fees, ancillary operations, and other revenues are recognized when persuasive evidence of an arrangement exists between the two parties, goods have been delivered or services have been provided to the customers, price is fixed and determinable and collection is reasonably assured. The Corporation also records deferred revenue when amounts are received in advance of providing goods and services.

#### ii) Contributions

Contributions are comprised of donations received from individuals, foundations and corporations. The Corporation applies the deferral method to recognize its contributions as applicable for not-for-profit organizations.

Unrestricted contributions are recognized as revenue in the Statement of Operations when received or receivable if the amount to be received can be reasonably estimated and collection is reasonably assured.

Contributions externally restricted for specific projects or expenses are deferred in the Statement of Financial Position and recognized as revenue in the Statement of Operations in the fiscal year in which the related expenditures are incurred.

Investment income related to restricted contributions is first recorded in the Statement of Financial Position as deferred revenues and then recognized as revenue in the Statement of Operations in the fiscal year in which the related expenses are incurred.

#### iii) In-kind sponsorships and specimen donations

In-kind sponsorships involve obtaining non-financial support for a project, activity or product in return for substantial public relations benefit. An in-kind sponsorship is recognized if the contributed good or service is used in the normal course of operations and would otherwise have been purchased, and once the exchange has taken place. In-kind sponsorships are recorded at their fair market value as contributions with an offset to the related expense on the Statement of Operations.

Specimens donated to the collections are recorded as contributions with an offsetting expense to collections care and access at fair market value, when the following three criteria are met: i) a fair market value has been established for the specimen; ii) the acquisition has been approved; and iii) transfer of the specimen's title to the Corporation has taken place.

#### iv) Parliamentary appropriations

The Government of Canada provides financing to the Corporation through parliamentary appropriations.

The parliamentary appropriations for operating expenditures are recognized as revenue in the fiscal years for which they are approved.

The parliamentary appropriations for the purchase of depreciable capital assets are recorded as deferred revenues, contributions and parliamentary appropriations on the Statement of Financial Position. When the depreciable capital assets are purchased, the portion of the parliamentary appropriations used for acquisition of these capital assets is then reclassified as deferred capital funding on the Statement of Financial Position and recognized as revenue on the Statement of Operations on the same basis as the amortization of the corresponding capital assets.

Parliamentary appropriations for specific expenses are recorded as deferred revenues, contributions and parliamentary appropriations on the Statement of Financial Position and recognized as revenue in the Statement of Operations in the fiscal year in which the related expenses are incurred.

The Corporation is required to report on the spending of appropriations in its annual report.

#### G) Volunteer Services

Volunteers contribute a significant number of hours every year. Due to the difficulty of determining their fair value, those contributed services are not recognized in the financial statements.

#### H) Financial Instruments

The Corporation's financial assets and financials liabilities are measured at cost. Financial assets include cash, restricted cash, and accounts receivable while financial liabilities include accounts payable and accrued liabilities.

Financial instruments are tested annually for impairment at the financial statements date, and any permanent impairment is reported in the Statement of Operations.

Transaction costs are added to the carrying value of items in the cost when they are initially recognized.

#### I) Allocation of Expenses

The Corporation does not apply the method of allocating costs for the purpose of distributing expenses between functions.

### 3. Cash and Restricted Cash

Cash and restricted cash consist of balances with banks.

Restricted cash includes deferred contributions. Restricted cash accounts are managed in accordance with the donor's wishes and are invested in accordance with the Investment Policy of the Corporation.

As per the Corporation's Investments Policy, operating funds are invested in short-term money market instruments that are rated AA or better and guaranteed by the Government of Canada, a provincial government or the Canadian Imperial Bank of Commerce (CIBC). The investment vehicles consist of banker's acceptances, promissory notes and term deposits. During this fiscal year, the Corporation did not invest and did not earn interest on investment (2015 - nil), the entire amount was held in cash.

The Corporation holds in trust funds on behalf of the Alliance of Natural History Museums of Canada. As of March 31, 2016, these funds represented \$65,840 (2015 - \$69,103), however they are not recorded in the financial statements.

### 4. Collections

The natural history collections consist of over 10.5 million specimens and grew by 11,056 this fiscal year (2015 – 54,060). These are exceptional scientific resources that are available nationally and internationally for research, exhibits and education.

The Corporation maintains multiple collection groupings, with the major collections as noted below divided into four disciplinerelated groups:

- the Earth Sciences collection (minerals, rocks, gems, fossils),
- the Vertebrates collection (mammals, birds, fish, amphibians and reptiles),
- the Invertebrates collection (molluscs, insects, crustaceans, parasites, annelids), and
- the Botany collection (algae, vascular plants, bryophytes, lichens).

The collections are managed and cared for through a collections risk assessment process that seeks to preserve the value of collections and uses a rational process for the establishment of priorities for their care. The Corporation has incurred \$2.7 million in 2016 (2015 – \$2.9 million) for the management, protection and conservation of its collections.

In this fiscal year, the Corporation purchased \$475,202 (2015 – \$39,647), and acquired through donation \$65,204 (2015 – \$928,983), of specimens for the collections.

There were no sales of specimens related to the collections during the year (2015 - nil).

## 5. Capital Assets

(in thousands of dollars)			March 31 2016			March 31 2015
	Cost	Accumulated amortization	Net book value	Cost	Accumulated amortization	Net book value
Land	627	-	627	627	-	627
Victoria Memorial Museum Building	204,727	43,920	160,807	204,727	38,905	165,822
Property under capital lease	35,040	19,833	15,207	35,040	18,839	16,201
Leasehold improvements	9,630	5,932	3,698	9,557	5,501	4,056
Permanent exhibitions	4,024	1,693	2,331	4,001	1,289	2,712
Building improvements	3,747	1,678	2,069	3,141	1,295	1,846
Collection cabinets and compactors	3,840	2,070	1,770	3,840	1,959	1,881
Computer equipment	1,742	1,312	430	1,143	1,017	126
Furnishings and office equipment	1,490	1,135	355	1,462	1,099	363
Research equipment	2,290	2,028	262	2,280	1,981	299
General equipment	357	150	207	317	121	196
Work in progress - Exhibitions	1,373	-	1,373	81	-	81
	268,887	79,751	189,136	266,216	72,006	194,210

The amortization expense for the year amounts to \$7,790,000 (2015 – \$8,598,000). During the year, the Corporation sold an asset with a recorded cost of \$35,000 in the category of furnishings and office equipment for \$12,000. As the asset was fully amortized, this resulted in a gain of \$12,000. In addition, the Corporation retired an asset in the category of furnishings and office equipment with a recorded cost of \$12,000 and accumulated amortization of \$10,000 resulting in a loss of \$2,000. During the prior year, the Corporation also retired capital assets with a recorded cost of \$4,973,000 and accumulated amortization of \$4,960,000, resulting in a loss of \$13,000.

# 6. Obligation Under Capital Lease

The Natural Heritage Campus houses the Corporation's natural history collections and administrative functions, on the Corporation's site in Gatineau, Quebec. The Corporation is acquiring the building through a lease purchase agreement with a term of 35 years. It is committed to pay rent under all circumstances and in the event of termination of the lease, at the Corporation's option or otherwise, pay sufficient rent to repay all financing on the building. Management intends to completely discharge its obligation under the lease and obtain free title to the building in 2031, after the Corporation uses its right to purchase the building for ten dollars.

Future minimum lease payments in aggregate, under the financing obligation are as follows:

(in thousands of dollars)		March 31, 2016	March 31, 2015
Total minimum future payments	(1)	54,250	57,750
Deduct: Imputed interest		(26,614)	(29,397)
Present value of financing obligations	(2)	27,636	28,353
Current portion		791	717
Long term portion		26,845	27,636
		27,636	28,353

<sup>1)</sup> The amounts payable under the capital lease are based on the fixed interest rate of 9.88%, for a period of 35 years, established at the time of signing the lease

Future minimum lease payments, by year under the financing obligation are as follows:

(in thousands of dollars)	2017	2018	2019	2020	2021	thereafter
Future minimum payments	3,500	3,500	3,500	3,500	3,500	36,750

# 7. Deferred Revenues, Contributions and Parliamentary Appropriations

Deferred revenues, contributions and parliamentary appropriations during the year were as follows:

(in thousands of dollars)	2016	2015
Deferred contributions from non-government sources	604	681
Deferred parliamentary appropriations	-	516
Total deferred contributions and parliamentary appropriations	604	1,197
Deferred revenues – goods and services	346	396
	950	1,593

<sup>2)</sup> The present value of the capital lease obligation based on a current market interest rate of 8.75% is estimated at \$30 million.

Changes in the deferred revenues, contributions and parliamentary appropriations during the year were as follows:

(in thousands of dollars)	2016	2015
Balance, beginning of year	1,593	3,283
Add:		
Restricted contributions received	552	150
Deferred revenue for the provision of goods and services	772	1,030
	1,324	1,180
Less:		
Restricted contributions recognized	(629)	(510)
Restricted parliamentary appropriations spent	(516)	(1,523)
Deferred revenue for the provision of goods and services recognized	(822)	(837)
	(1,967)	(2,870)
Balance, end of year	950	1,593

## 8. Employee Future Benefits

#### i) Pension benefits

The Corporation and all eligible employees contribute to the public service pension plan. This pension plan provides benefits based on years of services and average earnings at retirement. The benefits are fully indexed to the increase in the Consumer Price Index. The Corporation's and employees' contributions to the plan during the year were as follows:

(in thousands of dollars)	2016	2015
Corporation's contributions	1,244	1,381
Employees' contributions	928	924

The President of the Treasury Board of Canada sets the required employer contributions based on a multiple of the employees' required contribution. The required employer contribution rate for 2016 was dependent on the employee's employment start date. For employment start dates before January 1, 2013, the Corporation's contribution rate effective at year end was 1.15 times (2015 – 1.28) the employee's contribution; and for employment start dates after December 31, 2012, the Corporation's contribution rate effective at year end was 1.11 times (2015 – 1.28) the employee's contribution.

The Government of Canada holds a statutory obligation for the payment of benefits relating to the Plan. Pension benefits generally accrue up to a maximum period of 35 years at an annual rate of 2 percent of pensionable service times the average of the best five consecutive years of earnings. The benefits are coordinated with Canada/Quebec Pension Plan benefits and they are indexed to inflation.

#### ii) Severance benefits

Since April 1, 2012, employees no longer accumulate severance benefits payable upon resignation or retirement. Employees were given the option to be paid the full or partial value of benefits earned at that date or to defer this payment until their departure from public service. The severance benefit liability represents the portion that employees chose to defer. This benefit plan is unfunded and thus has no assets, resulting in a plan deficit equal to the accrued benefit obligation. Benefits will be paid from future appropriations. The estimated average remaining service period of the employees is 7 years. The actuarial loss of severance benefits is amortized over 7 years.

Information about the plan, evaluated by an actuary at the Statement of Financial Position date, is as follows:

(in thousands of dollars)	2016	2015
Accrued severance benefits obligation, at the beginning of year	1,441	1,550
Interest cost on benefit obligation	18	33
Actuarial loss on obligation	5	-
Severance benefits paid during the year	(320)	(142)
Accrued severance benefits obligation, end of year	1,144	1,441
Short term portion	144	181
Long term portion	1,000	1,260
	1,144	1,441

Assumptions in the actuarial evaluation include a discount rate of 1.31% (2015 – 1.32%), as well as an inflation rate of 2% (2015 – 2%). Included in the severance benefits obligation is a non-amortized actuarial loss of \$7,084 (2015 – \$37,132).

#### iii) Sick leave benefits

The Corporation has recorded an obligation related to sick leave benefits for its employees. The estimated average remaining service period of the employees is 11.6 years. The Corporation amortizes the actuarial loss (gain) of sick leave over the 11.6 years.

Information on these benefits, evaluated by an actuary at the date of the Statement of Financial Position consists of the following:

(in thousands of dollars)	2016	2015
Sick leave obligations, at the beginning of year	2,022	1,927
Current service cost	158	139
Interest cost on benefit obligation	30	51
Actuarial (gain) loss on obligation	(7)	13
Sick leave used during the year	(48)	(108)
Sick leave benefits, end of year	2,155	2,022
Short term portion	175	207
Long term portion	1,980	1,815
	2,155	2,022

Assumptions in the actuarial evaluation include a discount rate of 1.57% (2015 – 1.56%) as well as an inflation rate of 2% (2015 – 2%). Included in the sick leave obligation is a non-amortized actuarial gain of \$497,595 (2015 - \$83,492).

# 9. Deferred Capital Funding

Deferred capital funding represents the portion of the parliamentary appropriations and contributions from non-government sources used to purchase depreciable capital assets.

The deferred capital funding consists of the following:

(in thousands of dollars)	2016	2015
Used for acquisitions:		
Deferred capital contributions from non-government sources	2,101	2,168
Deferred capital funding through parliamentary appropriations	171,053	175,056
	173,154	177,224

Changes in the deferred capital funding balance are as follows:

(in thousands of dollars)	2016	2015
Balance, beginning of year	177,224	183,001
Add: Capital asset acquisitions	2,718	1,832
Less: Capital asset disposals	(2)	(13)
	2,716	1,819
Less amounts recognized as revenue:		
Contributions	(326)	(324)
Parliamentary appropriations	(6,460)	(7,272)
	(6,786)	(7,596)
Balance, end of year	173,154	177,224

### 10. Endowment Restrictions

An endowment fund for Systematic Entomology was received from Anne and Henry Howden in the principal amount of \$305,000, as well as a significant entomological collection. The endowment was established to enable professional studies and research of entomological collections for the Corporation.

During the prior year, the principal amount of \$305,000 was transferred to the Community Foundation of Ottawa. The transfer was authorized by the donor. Annually, the Corporation will continue to receive the net investment income earned on this endowment.

The net investment income earned on resources held for endowment is \$12,990 (2015 – \$10,049). The total accumulated amount of deferred investment income earned on resources held for endowment is \$28,300 (2015 - \$20,309). This amount is available for activities related to systematic entomology. During the year, \$4,999 (2015 – nil) was recognized in the statement of operations.

In the event that the Corporation decides not to maintain entomological collections, the Systematic Entomology Endowment Fund shall be transferred, along with any entomological collections, to the Royal Ontario Museum.

# 11. Investment in Capital Assets

The investment in capital assets consists of the following:

(in thousands of dollars)	2016	2015
Capital assets	189,136	194,210
Less amounts financed by:		
Capital lease	(27,636)	(28,353)
Deferred capital funding	(173,154)	(177,224)
	(11,654)	(11,367)

The net change in investment in capital assets is calculated as follows:

(in thousands of dollars)	2016	2015
Net capital asset additions	2,716	1,819
Add: repayment of obligation under capital lease	717	649
Less: capital assets financed with deferred capital funding	(2,716)	(1,819)
Capital assets purchased with the Corporation's funds	717	649
Amortization of deferred capital funding	6,786	7,596
Amortization of capital assets	(7,790)	(8,598)
Net change in investment in capital assets	(287)	(353)

# 12. Parliamentary Appropriations

To achieve its mission, the Corporation relies on government funding. This government funding is comprised as follows:

(in thousands of dollars)	2016	2015
Appropriations received and receivable:		
Operating and capital budgets	26,129	26,127
Supplementary budgets	323	150
	26,452	26,277
Previous year's appropriations used in current period to complete specific projects	516	1,523
Appropriations used to purchase depreciable capital assets	(2,457)	(1,650)
Amortization of deferred capital funding	6,460	7,272
Appropriations recognized during the year	30,971	33,422

# 13. Admission and Program Fees

Admission and program fees are comprised as follows:

(in thousands of dollars)	2016	2015
Admission fees – general	2,945	2,428
Admission fees – temporary exhibitions	816	539
Programs	591	616
Memberships	550	427
	4,902	4,010

# 14. Ancillary Operations

Ancillary operations are comprised as follows:

(in thousands of dollars)	2016	2015
Parking	802	697
Rental of facilities	589	625
Boutique and cafeteria leases	276	211
	1,667	1,533

## 15. Contributions

Contributions are comprised as follows:

(in thousands of dollars)	2016	2015
Cash contributions and sponsorships	1,281	1,548
In-kind sponsorships	303	303
Specimen donations	65	929
	1,649	2,780

# 16. Related Party Transactions

The Corporation is related to all Government of Canada departments, agencies and Crown corporations. The Corporation conducted transactions with these entities in the normal course of operations, under the same terms and conditions that applied to outside parties and recorded at the exchange amount.

(in thousands of dollars)	2016	2015
Revenues from Government of Canada related parties:		
Admission and program fees	2	1
Ancillary operations	-	2
Other (1)	174	232
	176	235

Includes rental revenue from Bank of Canada for \$157,623 (2015 – \$164,083).

(in thousands of dollars)	2016	2015
Expenses with Government of Canada parties:		
Personnel costs	1,583	1,726
Real property taxes	1,333	1,711
Marketing and communications	21	5
Information management infrastructure and systems	11	10
Professional and special services	10	11
Operation and maintenance of buildings	8	5
Freight and cartage	4	1
Repairs and maintenance	1	1
Exhibits	-	2
	2,971	3,472

The following balances with Government of Canada related parties were outstanding at the end of year:

(in thousands of dollars)	2016	2015
Due from related parties	527	201
Due to related parties	449	3

The Corporation's related parties also include its key management personnel which consist of 4 members of its senior management team and 10 members of its Board of Trustees, and their immediate family members. Transactions with these individuals, excluding compensation arrangements, include contributions of \$74,249 (2015 – \$49,490).

## 17. Contractual Obligations

As of March 31, 2016, the Corporation has contracts for operation and maintenance of building, professional and special services, information management infrastructure and systems, marketing and communications, and exhibitions with a remaining value of \$5,075,437 (2015 – \$4,652,000). Estimated future minimum payments under these contracts for the next 5 years are as follows:

(in thousands of dollars)	2017	2018	2019	2020	2021
Future minimum payments	4,194	686	145	47	3

### 18. Contingencies

In the normal course of its operations, the Corporation becomes involved in various claims or legal actions. Some of these potential liabilities may become actual liabilities when one or more future events occur or fail to occur. To the extent that the future event is likely to occur or fail to occur, and a reasonable estimate of the loss can be made, an estimated liability and an expense are recorded in the Corporation's financial statements.

As of March 31, 2016 and March 31, 2015, there were no claims against the Corporation.

### 19. Financial Instruments

#### A) Financial Risk Management

To achieve its mandate, the Corporation uses an enterprise risk management approach to manage risks proactively and prudently. The Corporation's Board of Trustees and Management ensure that an accountability regime, a governance structure, and systems are in place to appropriately manage risks through the systematic consideration of risk at the functional level. Management, in a timely and proactive manner will identify, assess, mitigate and monitor risks that may prevent the Corporation from achieving its objectives and priorities. There has been no change to the level of risk compared to the prior year and no changes in the risk management practices used to manage risks.

All of the following risks have no significant impact on the Corporation's financial statements.

#### i) Credit risk

The credit risk is one party to a financial instrument that causes a financial loss for the other party by failing to meet its financial commitments.

#### Accounts receivable

The Corporation is exposed to credit risk, through its normal commercial activities, on its accounts receivable of \$1,046,498 (2015 – \$630,004). Accounts receivables from Government of Canada departments, agencies and Crown corporations comprise 50% (2015-47%) of the Corporation's accounts receivable, and no allowance has been provided for these amounts. In order to reduce this risk, the Corporation closely monitors the issuance of credit and collection of commercial clients, and the concentration of this risk is also minimized because the Corporation has a large and diverse customer base.

As at March 31, 2016, \$1,320 (2015 - \$25,039) of accounts receivable were past due and fully provisioned by an allowance for bad debt. The allowance for doubtful accounts is based on an account by account analysis that considers the aging of the account and the current creditworthiness of the customer. Accounts which have exceeded 120 days are considered past due.

#### Cash (unrestricted and restricted)

The Corporation is exposed to credit risk, through its operations of cash management. In order to reduce this risk, the Corporation has an investment policy that limits the Corporation to secure investments. The details of this policy are described in note 3 of these financial statements.

#### ii) Liquidity risk

Liquidity risk is the potential inability to meet financial obligations as they become due. The Corporation manages this risk by maintaining detailed cash forecasts, as well as long-term operating and strategic plans. The management of liquidity requires a constant monitoring of expected cash inflows and outflows which is achieved through a forecast of the Corporation's liquidity position, to ensure adequacy and efficient use of cash resources. The Corporation's financial liabilities are due within three months of the date of the Statement of Financial Position.

#### iii) Market risk

Market risk is the risk that the fair value or future cash flows of a financial instrument will fluctuate because of changes in market prices, whether those changes are caused by factors specific to the individual financial instrument of its issuer, or factors affecting all similar financial instruments traded in the market. Market risks comprise three types of risk: Currency risk, Interest rate risk, and Price risk. As the entire amount of cash (unrestricted and restricted) was held in cash at March 31, 2016 and March 31, 2015, the Corporation is not exposed to market risk.

#### B) Fair value

All financial instruments are measured at cost. The statement of remeasurement gains and losses has been excluded as there have been no remeasurement gains or losses.

# 20. Summary of Expenses by Object

(in thousands of dollars)	2016	2015
Personnel costs	13,716	14,488
Amortization of capital assets	7,790	8,598
Operation and maintenance of buildings	3,762	3,730
Interest on capital lease obligation	2,783	2,851
Real property taxes	2,540	2,850
Professional and special services	2,513	2,317
Information management infrastructure and systems	1,604	1,290
Marketing and communications	1,219	1,211
Exhibitions	1,198	1,181
Repairs and maintenance	821	766
Objects for collections	540	969
Travel	404	335
Freight and cartage	61	62
Other	75	153
	39,026	40,801

## 21. Comparative Figures

Certain comparative figures have been reclassified to conform to the current year's presentation.

**Canadian Museum of Nature** 

nature.ca

Victoria Memorial Museum Building

240 McLeod Street, Ottawa, Ontario

**Natural Heritage Campus** 

1740 Pink Road, Gatineau, Quebec

Information

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