Disclaimer

This presentation and subsequent discussion, contains certain forward-looking information, forecasts, projections, goals and strategies (the “forward-looking information”) with respect to revenues, funding, expenses, the financial condition, results of operation and business of the City of Vancouver (the “City”). This forward-looking information represents the City’s expectations or beliefs concerning future events and involves known and unknown risks and uncertainty that could cause actual results, performance or events to differ materially from those expressed or implied in such statements. Past performance cannot be relied on as a guide to future performance. Any content within this presentation interpreted as micro-aggressions are unintentional and purely coincidental. This material is for information purposes only.
The pride of our Investment Proposition

1. High quality credit ratings
2. Thriving and robust economy
3. Stable revenue sources and property tax base
4. Strong fiscal management
5. Commitment to regular issuance
City of Vancouver maintains the highest quality credit ratings

S&P Global Ratings

AAA (Stable)
February 11, 2021

“stable economy and prudent financial management”

“exceptional levels of liquidity, continued strong budgetary performance will remain rating strengths”

“forecast Vancouver will maintain healthy operating balances”

Moody’s Investors Service

Aaa (Stable)
November 25, 2020

“Exceptional liquidity coupled with high debt affordability backed by stable revenue sources and strong economic growth underpinned by a diverse economy and long-term strength”

“strong debt affordability and robust governance and financial management”

“Strong governance and fiscal management, and supportive institutional framework”
Vancouver has a thriving and robust economy

**+4.9%**
Metro Vancouver 2021 GDP growth (up from -4.0% in 2020)
Conference Board of Canada, Mar 2021

**80,620**
# of Metro Vancouver’s business that recovered since pre-COVID
Vancouver Economic Commission, 2020

**$1.7B**
High Impact Investment into Vancouver (facilitated by VEC)
Vancouver Economic Commission, 2020

**Top 25**
Startup Ecosystem in the World
Startup Genome, 2020

**$203M**
Venture capital deal flow into Vancouver companies YTD Q1 2021 (Ranked #3 for deal flow)
CVCA, Q1 2021

**#1**
VFX & Animation Hub in the world, 2020
Vancouver Economic Commission, 2020

**#1**
Large Americas Cities of the Future 2020-2021, Top 10, Overall
FDI Intelligence

**#1**
City for COVID economic recovery in Canada
Vancouver Economic Commission, 2021

**1 in 15**
Jobs is a Green Job Up 35% from 2010-2017
Vancouver Economic Commission, 2021

**#3**
Film & TV Production Hub Largest in North America, 2019
Vancouver Economic Commission, 2020

*Source: //www.vancouvereconomic.com/economic-snapshot/*
In 2020, $16 million in pandemic recovery funding received from the provincial and federal governments. And approximately $34 million was drawn from city’s revenue stabilization reserve to balance the 2020 budget.

The City has always operated in a prudent manner and will continue to be disciplined in 2021 to ensure the City’s financial position in future years remains balanced and strong.

The 2021 Operating Budget is $1.6B and is 1% less than the 2020 Budget

- Property tax rates set by Council
  - Limit 2021 property tax increase to 5.0%
- Utility fees are based on
  - Full cost recovery
  - Primarily driven by Metro Vancouver
- Fee-based revenues
  - More variable
  - Economic cycles can impact development driven revenue streams (e.g., building permits)
  - Use of services (civic theatres) and weather can impact revenue.

*Source: https://vancouver.ca/files/cov/2021-budget-highlights.pdf
The City will continue to exercise strong and prudent fiscal management and discipline to maintain a balanced budget for 2021 and beyond based on these 5 principles:

1. Focus on alignment to Council priorities
2. Stay flexible to adjust to expected ongoing uncertainty
3. Assess opportunities in 2021 and future years
4. Develop options to respond to lower 2021 revenue scenarios
5. Prioritize resources designated for 2020 initiatives that were deferred

*Source: 2020-07-08 Council Presentation 2021-2025 Budget Outlook
For 2021, Council has approved to increase property tax by 5%.

Utility fees increase at average 5.4%.

User fees follow inflation.

Increases in operating budget to cover expenditure pressures.

Increases in Operating Revenues, $M per year.
City of Vancouver maintains strong liquidity

Consolidated Reserves, $M – excludes sinking fund

14 year cumulative growth of $1 billion of reserves (+296%)

*Source: 2020 Annual Financial Report City of Vancouver
City of Vancouver keeps debt at manageable levels

Debt Servicing as % of Operating Revenue

Source: 2019-2022 Capital Plan
Consistent and established debenture program

Issuance Amount, $M

- Fixed rate bullet debenture are more broadly marketable
- Debt financing only for capital infrastructure, cannot be used for operational deficits
- City Council establishes limits for public utilities and Electorate approves other borrowing limits
- 100% funded from Operating Budget
- Repayment of the City’s debentures are funded by the City of Vancouver’s ability to levy taxes & fees.
- As at Dec 21, 2020:
  - Gross outstanding debentures $1,054M
  - Less: Sinking fund reserves $459M
  - Net long-term debt $595M
- Council has approved up to $100M inaugural Sustainability Bond this fall.
City of Vancouver Sustainability Bond Framework
June 2020

- Part of the City’s established debenture program
- Supersedes the City’s 2018 Green Bond Framework
- Single framework that gives flexibility to issue Green Bonds, Social Bonds or Sustainability Bonds depending on the eligible green and social capital projects that the City is seeking financing.

Second Party Opinion
provided by Sustainalytics

Credible, impactful and aligns with Green Bond Principles 2018, Social Bond Principles 2020, and Sustainability Bond Guidelines 2018, as administered by ICMA

Eligible categories will lead to positive environmental or social impacts and advance the UN Sustainable Development Goals, specifically SDGs 6, 7, 10, 11, 12, 13, and 15.

IR website
vancouver.ca/investors
In Nov 2020, Council approved the Climate Emergency Action Plan (CEAP)

THE WORLD IS ON TRACK FOR 3-4°C WARMING by the end of the century. To avoid catastrophic climate change, the United Nation’s Intergovernmental Panel on Climate Change warns that we must limit warming to 1.5°C. This means slashing carbon pollution globally by 45% below 2010 levels by 2030, and reaching net zero by 2050.

VANCOUVER HAS SET BOLD TARGETS to cut carbon pollution in half by 2030, and to be carbon neutral before 2050. This means cutting our carbon pollution faster than ever before.

Vancouver’s Carbon Pollution

-9%

2030 Target -50%

Information on CEAP – vancouver.ca/climateemergency


2021 Inaugural Sustainability Bond

**Deal Structure**

- The City’s inaugural Sustainability Bond
- $100 million in Canadian Dollars
- 10 year bullet maturity
- Encourage participation from sustainable and conventional investors, preference can be given to the sustainable investors
- Book build process for issuance with BMO Capital Markets acting as Senior Lead; CIBC and TD Bank sharing exempt list coverage as Co-Leads
- Emphasis on secondary market making by including participation of 8 dealers in Vancouver’s underwriting syndicate

**Key Features**

- Same financial and legal characteristics of other Vancouver bonds
- Sustainability Bond ranks equally with all other bonds issued by Vancouver
- Bond proceeds will be used for eligible green and social capital projects under the City’s Sustainability Bond Framework
- Annual disclosures on projects and related metrics to be provided
### 2021 Inaugural Sustainability Bond

#### Eligible Capital Projects & Use of Proceeds

<table>
<thead>
<tr>
<th>Project</th>
<th>Eligible Categories as per Vancouver Sustainability Bond Framework</th>
<th>2019-2022 Plebiscite Debt Category per Council Approval – Debenture 2021 June 24 2021</th>
<th>Amount to be allocated</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sewers main renewal &amp; upgrades</td>
<td>F. Sustainable Water and Wastewater Management (Green) J. Access to affordable basic infrastructure – Sewers (Social)</td>
<td>Sewers</td>
<td>$70,284,220</td>
</tr>
<tr>
<td>Renewal of Sunset Yard</td>
<td>C. Green Buildings (Green)</td>
<td>Civic facility renewal projects</td>
<td>$9,000,000</td>
</tr>
<tr>
<td>Fire Hall #12 Seismic Upgrades</td>
<td>J. Access to affordable basic infrastructure – public safety services (Social)</td>
<td>Civic facility renewal projects</td>
<td>$5,844,000</td>
</tr>
<tr>
<td>Street &amp; Bridge Infrastructure</td>
<td>D. Clean Transportation (Green) J. Access to affordable basic infrastructure – Transport (Social)</td>
<td>Sidewalk Rehabilitation &amp; Pedestrian Curb Ramp &amp; Bike Signal Program</td>
<td>$6,855,530</td>
</tr>
<tr>
<td>Energy Optimization Program</td>
<td>C. Green Buildings (Green)</td>
<td>Facility renovation and upgrades programs</td>
<td>$2,810,000</td>
</tr>
<tr>
<td>Accessibility Program</td>
<td>K. Access to essential services (Social)</td>
<td>Facility renovation and upgrades programs</td>
<td>$2,080,000</td>
</tr>
<tr>
<td>Climate Emergency Response Program</td>
<td>D. Clean Transportation (Green) J. Access to affordable basic infrastructure – Transport (Social)</td>
<td>Facility renovation and upgrades programs</td>
<td>$2,025,000</td>
</tr>
<tr>
<td>Seawall Maintenance Program</td>
<td>D. Clean Transportation (Green) H. Climate Change Adaptation (Green)</td>
<td>Park maintenance, renewal and upgrade programs</td>
<td>$1,101,250</td>
</tr>
<tr>
<td><strong>TOTAL:</strong></td>
<td></td>
<td></td>
<td><strong>$100,000,000</strong></td>
</tr>
</tbody>
</table>
Further information on the selected capital projects
Project Description – Separating sewage from rainwater

- We are working toward the Province of BC’s environmental goal to eliminate sewage overflows by 2050. As we replace combined sewer systems with separated sewer systems, properties will also need to have separated sewer systems.

- Replacing pipes in Vancouver’s sewer system to maintain proper working condition and separates sanitary and storm water systems, as opposed to combined pipes under the former approach. A dedicated sanitary pipe system achieves a more efficient inflow to Iona wastewater treatment plant hence mitigating the risk of combined sewer overflow.

- In a two-pipe separated sewer system, storm water is collected through storm drains. It travels through different pipes than household sewage and other wastewater. There are two sewer separation programs running concurrently. The overall sewer mains are being separated so that storm drains carry storm water runoff separately from other wastewater.

Status:
- 54.6% of system is separated (per 2020 Service Plan)
- 6.5km of pipe replaced in 2020 (per 2020 Service Plan)
  from 4.9 km in 2019.

Environmental & Social benefits:
- Eliminates combined sewer overflow
- Prevents flooding by increasing capacity
- Allows storm water to be used as a resource
- Length of pipe replaced
Renewal of Sunset Service Yard

Project Description

$9M is allocated for the renewal of Sunset Service Yard. This service yard is operated by the Park Board and located at Main Street and 51st Avenue in south-central Vancouver. The buildings and structures at the yard are aging and need to be renewed. Given the size of the service yard, the project will be completed in phases.

The Sunset Nursery and Operations Yard master plan design locates the new buildings at the edges of the site, leaving the middle of the site for the works yard and heavy machinery. This strategy creates a buffer for the surrounding residential neighborhood and facilitates free movement within the site for fleet and staff. Nursery operations are located on the west side of the site, and the new Park Operations building is placed on the east side of the site. Its position length wise across the site and parallel to the arena allows for unobstructed views across the works yard. It also provides views from the operations building into the works yard itself.

Upgrades are required to accommodate:

- 13,000 sf new operations building that includes offices, change rooms, and workshops.
- 23,500 sf new greenhouse building including headhouse.
- New works yard including staff and fleet parking.

Expected benefits (available upon completion of project):
- Reduce GHG emissions
- Potential passive zero emission targets
- Meet Green Building certifications

C. Green Buildings (Green)

Source:
Project Description

- Approximately $6M is allocated to provide for the seismic upgrade of Fire Hall #12 in Kitsilano community located at 8th Ave. & Balaclava St. in Vancouver.

- This fire hall was selected because it is in the right age group (approximately 30 years old) and covers a relatively large geographic area (west of Arbutus Street) where no fire hall meets current seismic standards.

- Structural seismic upgrade of Fire Hall 12 to meet an “Enhanced” retrofit level. Additionally, any building systems and elements that are impacted by the seismic upgrade work and determined to be end-of-life will be replaced. Potentially, building improvements that would positively improve or enhance energy performance could also be undertaken. Enclose mezzanine level overlooking apparatus bay for separation and move door between the entry and the vestibule so that bays can be separated from the downstairs functions (office, kitchen, recreation room).

- Currently in detailed design phase; proceeding to construction phase by the end of 2021

Expected Benefits:

- Reduce GHG emissions
- Meet Green Building certifications

C. Green Buildings (Green)

Expected Benefits:

- Number of households covered under fire and rescue

J. Access to affordable basic infrastructure – public safety services (Social)

Expected Benefits (available upon completion of project):

- Number of households covered under fire and rescue

Rendering of the exteriors.
Street & Bridge Infrastructure

Project Description

- Pedestrian curb ramp program - Installation of curb ramp across the City’s sidewalk network to improve accessibility and availability of the active transportation network.
- Sidewalk rehabilitation - Keep the City’s sidewalks in a state of good repair and encourage residents to walk thereby helping the City achieve its overall transportation targets.
- Pedestrian & bike signal rehabilitation - Maintain proper working condition for pedestrian and bike signal, ensuring rehabilitation and technology improvement. This technological resource allows the traffic, and data monitoring team to survey, collect, and analyze patterns to implement safer traffic flow strategies.

Expected Benefits:

D. Clean Transportation (Green)

- Reduce GHG emissions

J. Access to affordable basic infrastructure – safe transport (Social)

- Implement safer traffic flow strategies
- Street and sidewalk improvements

Quebec Street – Before and After Improvement
Project Description

The Climate Emergency Action Plan is part of the city’s initial implementation of accelerated action initiatives and integration of six “Big Move” sustainability objectives into Vancouver Plan and is a multi faceted program that focuses on delivering services through various groups:

- Transportation Planning Studies: Focusing on increased active travel, transit reliability, reduced emissions/noise, increased road reallocation, efficient and effective planning, development, and review process
- Transport Pricing: 5 Year planning including assessment of feasibility of transport pricing in the metro core of Vancouver
- Active Transportation Promotion: Promoting active transportation, reduce GHG emissions, and improve the road network such that the City can continue to track towards the Climate Emergency Action Plan target (by 2030, two thirds of all trips in Vancouver will be made by foot, bike or transit).

**D. Clean Transportation (Green)**  
**J. Access to affordable basic infrastructure – transport (Social)**

**Expected Benefits:**  
- Reduce GHG emissions  
- Two thirds of all trips in Vancouver will be made by foot, bike or transit.

**Expected Benefits:**  
- Improved road networks

Energy Optimization Program

Project Description

- The energy optimization program consists of building energy retrofit projects and building control optimization projects that reduce energy consumption and greenhouse gas emissions within city owned buildings. Project deliverables include consultant continuous optimization investigation reports, building control systems modifications, and construction of energy efficient lighting upgrades, HVAC energy retrofits, and renewable energy projects.

- To highlight one of the major projects we’ve been working on this year: Heating and Cooling System Replacement at the Vancouver Police Department Annex, located at 236 E Cordova (see image below)
  - The chiller plant for 236 E. Cordova will be replaced with an air-source heat pump located on the roof to provide chilled water and heating water to the building. The heat pump will be able to switch from cooling to heating mode seasonally. A greenhouse gas reduction analysis was completed and it was determined that an annual GHG reduction of 77.3 Tonnes of CO2e could be achieved per year. Over the 25 year life expectancy of the systems proposed that results in a 1,932.5 Tonnes of CO2e reduction.

C. Green Buildings (Green)

Expected Benefits:
  - Reduce GHG emission
Project Description

- The Accessibility Program is a City-wide program to improve accessibility in civic facilities, particularly for highly utilized public venues. Special consideration must be given to ensure civic facilities are barrier-free as well as be open and welcoming to all citizens. Universal and inclusive design involves everything from handicapped accessibility, to an understanding of the multicultural citizen base, and the LGBTQ2+ community. The City has taken significant steps forward on inclusive-focused recommendations, continuing to move towards equality for all.

- To ensure the City achieves the greatest impact for accessibility outcomes and future planning, a Feasibility Study was completed by a consultant. The scope of this study involves reviewing existing Accessibility Audits of 30 City-owned facilities, including City Hall, to identify and prioritize work required to renovate, upgrade and remove barriers and to improve accessibility and provide universal and inclusive design. As part of this work, the City and its consultant, HCMA, are currently engaging representatives from PWDAC and SAC as well as the Transgender community, and staff from other departments (who are working on various aspects of accessibility across the City), to develop a ‘prioritization matrix’. The suggested recommendations and improvements coming from the Feasibility Study are then prioritized through this matrix with the top priority projects then executed.

- To highlight a couple projects under this program: (i) Installation of a Middle Railing on the South Stair to City Hall & (ii) Gathering Place Community Centre – Existing Ramp Modification

Expected Benefits (available upon completion of project):
- Number of ramps improved
- Number of wheel chair access points

K. Access to essential services (Social)
Seawall Maintenance Program

Project Description

- Vancouver has the world's longest uninterrupted waterfront path. The 28 km Seaside Greenway is an uninterrupted pathway, including the Stanley Park Seawall, that extends from the Vancouver Convention Centre to Spanish Banks Park. Perfect for a walk, cycle, or jog, it is the most popular recreational spot in the city. The Seawall is divided into two clearly marked sections – one for walkers and joggers (closest to the water), and one for cyclists and inline skaters (inside path).

- The seawall is subject to seasonal battering, as well as large storms, which cause damage and deterioration to the structure. Vancouver Park Board did a comprehensive assessment of the seawall in 2013 and 2016 to identify and prioritize the work for this restoration project. The Stanley Park Seawall restoration project includes filling holes, replacing stone, stabilizing foundations, and installing material to protect against water erosion at priority locations between Brockton Point and Sunset Beach.

- With deep foundations and renewed surfacing, the restored seawall can withstand the tides for many years to come.

Expected Benefits

*(Available upon completion of project)*

- Improved resilience to current and future climate-related impacts

D. Clean Transportation (Green)
H. Climate Change Adaptation (Green)
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**MORE INFORMATION**

**Investors Relations**  *including Sustainability Bond Framework and Second Party Opinion*

- Climate Emergency Action Plan
- Greenest City Action Plan
- 2019-2022 Capital Plan Recalibration (Sep 16 22, 2020)
- 2021 Debenture Council Report (July 2021)
- 2021 – 2025 Budget Outlook (July 8, 2020)
- COVID-19 – Financial Mitigation and Restoration of City Services (May 26, 2020)
- 2020 Budget and 5 year Plan
- Vancouver Charter

**vancouver.ca/investors**

- vancouver.ca/climateemergency
- vancouver.ca/greenestcity
- council.vancouver.ca/20200916/documents/cfsc1presentation.pdf
- council.vancouver.ca/20210720/regu20210720ag.htm
- council.vancouver.ca/20200708/documents/cfsc2.pdf
- council.vancouver.ca/20200526/documents/p1presentation.pdf
- council.vancouver.ca/20200414/documents/r1presentation.pdf
- vancouver.ca/files/cov/2020-budget-book.PDF
- www.bclaws.ca/civix/document/id/complete/statreg/vanch_00