



A Greener City for All

**AN EQUITY-FOCUSED REVIEW OF THE CITY OF VANCOUVER'S
DRAFT CLIMATE EMERGENCY ACTION PLAN**

AUGUST 2020

**REPORT PREPARED BY:
THE TORONTO ENVIRONMENTAL ALLIANCE (TEA)**

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1. SCOPE OF WORK

The Toronto Environmental Alliance (TEA) was contracted to provide an equity-focused review of the City of Vancouver's draft Climate Emergency Action Plan (herein referred to as "CEAP" or "the Plan"). The premise of this engagement was that TEA, which was not involved in CEAP's development as a stakeholder, would provide external feedback based on its experience in the area of climate policy and equity.

TEA is a registered Ontario environmental non-governmental organization (ENGO) with over 30 years of experience in municipal environmental policy development, coalition building and community organizing in the City of Toronto. We have done extensive work on environmental issues that intersect with social, racial and economic justice and have experience providing expert feedback to government as both an external stakeholder and consultant. The TEA staff team that conducted this review included Emmay Mah, TEA's Executive Director; Heather Marshall, TEA's Campaigns Director; and Michael Polanyi, TEA's Climate Campaigner. The three reviewers have many years of experience working on intersectional social equity campaigns and initiatives on topics such as Indigenous health, environmental justice and anti-poverty, and all have received anti-oppression training. Two of three reviewers played active roles in the City of Toronto's Modelling Advisory Group, a multidisciplinary expert group which provided in-depth analysis and feedback on Toronto's climate action plan, TransformTO, prior to its adoption in 2017.

Our review process included:

- A virtual meeting with City of Vancouver staff to discuss the scope of work
- Two virtual meeting exchanges with local Vancouver organization, Hua Foundation, which was also contracted to provide an equity-focused review of the Plan
- Review of the Plan by three TEA staff
- Email communication with City of Vancouver staff for additional documents and clarification
- Providing City of Vancouver staff with specific equity-focused comments directly in the draft Plan document covering feedback such as:
 - highlighting opportunities to use a particular climate action to improve equity or to go deeper on equity
 - identifying any areas/actions that show good equity consideration
 - sharing any concerns or apparent gaps related to addressing equity/climate justice
 - identifying any potential unintended equity-related impacts
- Providing City of Vancouver staff with a report (which follows) that provides deeper insight into the comments provided in the draft Plan document.

It is important to acknowledge that while TEA was requested to provide a summary report to clarify and contextualize our perspectives, we felt that given the importance and complexity of centering and integrating equity into the CEAP, we should provide a more in-depth analysis and explanation of our feedback. A summary is provided in Section 3.

2. LIMITATIONS OF THE REVIEW

The internal limitations of this review include both TEA's organizational knowledge and experience as well as individual reviewer perspectives.

As a Toronto-based organization, TEA is not very familiar with Vancouver's historical, social or political context. In order to fill in a number of gaps, we relied on our general knowledge of Vancouver and the City's current climate policy initiatives, rapid online research, and virtual exchanges with Hua Foundation staff that were very helpful in providing information and insight with which to contextualize our feedback. In addition, we should acknowledge that while TEA works with diverse communities and partner organizations to achieve environmental justice outcomes, the organization does not represent, or work on behalf of, specific equity-seeking groups and communities.

TEA's individual staff reviewers are personally committed to decolonizing their understanding of history and systems, and strive to be aware of how their social locations in society including their personal privileges (e.g. English speaking, Canadian citizenship, settler heritage, employed by an environmental organization - which positioned them to conduct this review), and experiences with oppression and other forms of inequity, impact their professional perspectives. In both our conscious and subconscious ways, TEA reviewers are influenced by their experiences and carry biases that have likely influenced the perspectives provided in this review.

There were also external limitations to our review. We agreed to provide feedback on the draft Plan in a two week period to meet City timelines. The draft Plan was lengthy (~47 pages), complex and some sections were still in development when staff provided TEA with the document (e.g. Big Move 6 and sections on the health, economic and equity milestones). There was limited time to review 100+ pages of appendices, which were made available upon request. Due to the short timeline and scope of work, we were not able to deeply engage with most of the supplementary documents requested. In addition, without specific references to (or access to) disaggregated data highlighting racial and economic disparity related to specific Big Moves in the draft Plan, TEA relied on exchanges with Hua Foundation, and our experience with equity-seeking communities in Toronto, to flag certain assumptions in the Plan that could have significant equity implications without validation.

With those caveats noted, TEA was still committed to undertaking this review as it provided a significant opportunity to advance social and economic equity through municipal climate emergency actions.

3. QUICK SUMMARY POINTS

In this section, we have prepared some quick summary points that address specific questions asked by City of Vancouver staff to guide our feedback.

One area/action that shows good equity consideration is the recommendation to continue the Climate & Equity Working Group and commitment to develop - with a community process throughout - an Environmental Justice Framework and Equity Milestones. In addition, the Embodied Carbon Strategy (Big Move 5 - Low Carbon Construction Materials) demonstrates a much deeper understanding of how the City will work collaboratively with a diversity of stakeholders, links to other strategic City priorities, and provides a comprehensive list of equity impact considerations. The 'four pillars' clearly convey the system changes the City is working towards and many of these pillars are applicable to the other Big Moves.

One climate action area where the City can go deeper on equity is transportation. An external transportation equity audit is a crucial step that should be taken to identify, and then work to address, racial and economic inequities, as well as mobility concerns, in Big Moves 1, 2 and 3.

Big Move 4 Zero Emissions Space and Hot Water is also another significant climate action area where the City needs to address significant risks of tenant displacement and find ways to generate benefits for Indigenous and equity-seeking groups in preserving affordable housing and creating access to workforce pathways in the multi-billion dollar green building industry.

The potential unintended equity-related impacts are multiple and serious if key foundational pieces of work are not prioritized early in the timeline that meaningfully engage with equity-seeking communities and generate critical datasets to make collaborative, evidence-informed decisions about key strategies in the CEAP. It is important to recognize how urban planning and environmental policy has contributed to the ongoing oppression and marginalization of Indigenous people and other equity-seeking groups in Vancouver, and as such, it will take a significant commitment by the City to build a new foundation for the CEAP and other City strategies moving forward.

Concerns / apparent gaps related to equity/climate justice primarily emanate from the approach to policy development. It is important to differentiate between a traditional policy approach – where climate action areas are written with an 'equity lens' to minimize harms to equity-seeking groups – from one that begins with an equity-focused analysis and then uses this understanding to identify and prioritize actions that directly benefit equity-seeking groups. The City appears to be lacking some key data (both statistical and from community members' lived experiences) to fully implement the latter approach in some areas, which makes the foundational work with equity-seeking communities critically important (as per above).

Related to this, is the need for the City to develop a deeper understanding of how different dimensions of equity intersect. For example, separating income and race dimensions into different phases of work can cause harm when these dimensions are interrelated in Vancouver's communities, and overlooks how processes of institutional and historical oppression have contributed to dispossession of resources and alienation from civic processes for equity-seeking communities.

4. CROSS-CUTTING OBSERVATIONS & RECOMMENDATIONS

Include Indigenous Governance & Partnerships

The City of Vancouver should, at the outset of the Plan, acknowledge the traditional unceded territory in which it operates, and the Indigenous peoples and nations that have historically lived, and continue to live, in this territory.

The City should dedicate a section at the beginning of the document, separate from the “equity” section, to cite any relevant institutional and government-to-government relationships with First Nations as well as any public commitments made to, and partnerships formed with, First Nation communities. This section should describe the City’s commitment to meaningfully collaborating with Indigenous nations, organizations and people residing in the City on decision-making and implementation of CEAP, describe what ongoing collaboration in design and decision-making will look like, and make relevant connections to climate plans that are already in place or being developed by First Nations.

Throughout our report, we intentionally distinguish Indigenous people from equity-seeking groups. Our intention is to acknowledge the special relationship Indigenous people have to this territory, the obligation of different levels of government to Indigenous people, and the different experiences of Indigenous people in comparison to other settler peoples (including those from equity-seeking groups).

Overall, the draft Plan needs to more clearly articulate how the City will work with Indigenous people to ensure that actions within all of the Big Moves will benefit Indigenous people (e.g. Indigenous-owned businesses, workforce development, and access to programs and services).

Give Equity Prominence in the Plan

It was encouraging to see that each Big Move had a separate equity analysis sub-section. We recommend placing a more significant and detailed ‘equity section’ prior to the Big Move sections. It should highlight the recommendation to continue the Climate and Equity Working Group and the co-creation of the Environmental Justice Charter, as well as content like the ‘equity sidebar’. Rather than relegate this action area to the end of the document under the category of ‘Future Work’, this Plan has an opportunity to model an equity lens by bringing it intentionally forward to the beginning of the document. The Plan’s ‘Equity Milestones’ will rely on establishing an equity-focused planning process. This process is an action area and should be treated with as much - if not more - regard than any of the Big Moves. We acknowledge that this area of work will be impacted by the City’s forthcoming Equity Framework.

Demonstrate Justice in the Process

A very important point made in the Climate and Equity Working Group Appendix was a call for “justice in the process, not just in the outcome” and recognition that the “process needs to be different in order for the outcome to be meaningful”. This holds different meaning than what staff incorporated into the draft Plan’s ‘equity sidebar’ (pg. 44) which says “equity is a process and an outcome”.

Equity-seeking groups have long been excluded from many opportunities to inform and contribute to the process of policy and program changes. Policy makers must do more to increase the agency of equity seeking

groups in the entire climate policy process - from design and implementation to monitoring and evaluation to iterative re-design. The recommended continuation of the Climate and Equity Working Group and commitment by the City of Vancouver to co-develop an Environmental Justice Charter is a very important step in the right direction. This was evident from the recommendations and focus group notes from the Climate and Equity Working Group Appendix. When describing the scope of the Environmental Justice Charter, one point was to “enforce a framework to ensure that equity considerations are taken into account for any city planning project” (pg. 6 of the Climate and Equity Working Group Appendix).

An important question to ask is: whose voices are missing? Or, whose voices will continue to be excluded unless the City proactively takes measures to include these voices in CEAP’s policy-making and planning processes? We have already discussed the importance of acknowledging the City’s relationship with Indigenous peoples, and given comment on the City’s phased plans to focus on low-income and racialized communities. In addition, we feel it is critical to flag that the CEAP gives very limited (or no) specifics on how it will how the City will meaningfully engage other equity-seeking groups including people with Disabilities / Disabled people, newcomers and refugees, seniors, and LGTBQ2S+ people. Due to the nature of inequity, many people from equity-seeking groups hold intersectional positions. Lastly, the CEAP appears to be silent on how it will engage and create opportunities for youth, including youth from equity-seeking groups. Given the multi-generational nature of climate disruption, it is critical from a justice and future planning perspective that the City supports youth to participate in setting priorities and shaping solutions.

While scientific evidence and political expediency demand swift policy action on climate change, the realization of intended policy outcomes (especially those with equity impacts) may take years to achieve. In recognition of this timeline, and the exclusion and harms experienced by equity-seeking people, much more investment will be needed in building long-term relationships and processes with residents from equity-seeking communities and with community groups. Meaningful engagement in the CEAP by residents that reflect Vancouver’s demographic and geographic / neighbourhood diversity will improve the effectiveness of solutions meant to serve these communities and the broader public.

Acknowledge the Past

Policy makers must demonstrate an understanding of how past policy decisions, including urban planning design, have contributed to the existence and continuation of systematic oppression of equity-seeking groups and Indigenous people. There is an opportunity to demonstrate this understanding in this Plan. By acknowledging the past and demonstrating a change in how future policies will be informed and designed, Vancouver can advance a new process that seeks to make “changes to the systems” that the City has control over and a commitment to advocate to other levels of government where the City does not.

For example, the Climate and Equity Working Group identified that one of the realities of gentrification in the downtown is the historic and ongoing displacement of Indigenous, Black, Chinese, and other communities of colour. They offered constructive advice that can inform future policy such as: “When talking about transportation think about where people are displaced to, where city planning directs services and the disconnect between those. How can we change frameworks for how the City prioritizes funding/services/planning efforts for communities?” (pg. 6 of the Climate and Equity Working Group Appendix).

Acknowledge the People

The 2016 Statistics Canada data suggests that 51.6% of the City of Vancouver's population identifies as a 'visible minority' with Chinese, South Asian and Filipino populations most common and 2.2% identify as Indigenous.¹² In the Climate & Equity Working Group, participants regularly name specific populations including Black, Indigenous, Chinese and other People of Colour (POC) and it is incumbent upon the City of Vancouver to proactively name ethno-cultural groups in their Plan and to consider adopting language like 'racialized' rather than 'visible minority' to acknowledge systemic colonial and racial oppression as well as accurately portray that racialized people are the majority population of Vancouver.

For instance, there are multiple references to South Vancouver in the Plan, but the residents and businesses that represent this area are not named. It is important to acknowledge the people who reside and work in particular places, especially when making certain determinations about these neighbourhoods.

Using terms like 'dense' and 'less dense' to describe neighbourhoods and describing people as 'car owners' and 'renters' does not unpack the ethno-cultural and income differences that this Plan aspires to address.

Commit to Internal Coordination & Capacity-Building

This Plan does a good job at demonstrating how the City of Vancouver will internally lead change in the Big Move areas by committing to higher targets for the City as an institution/corporation and leveraging City assets such as its buildings, fleet, employees, purchasing power, etc. However, there are also less visible internal commitments and processes the City of Vancouver can implement that demonstrate the obligation named at the outset of the Plan: "ensure that our transition to a zero carbon city benefits all regardless of their race, income, or neighbourhood".

One area where the City of Vancouver has significant power is to break down silos and link policy priorities and commitments. Existing and upcoming regional and municipal plans and strategies that are meant to address income and racial inequities as well as address core needs such as affordable housing and health in Vancouver could be referenced in this Plan more clearly. Furthermore, there should be a clear commitment to work with other governmental divisions and departments responsible for these plans and strategies to realize co-benefits to climate policy and the avoidance of co-harms. For instance, in our exchanges with Hua Foundation, we learned that the City of Vancouver is currently working on a number of relevant initiatives including the development of a language policy to ensure Vancouver residents and business operators receive communications in their preferred (primary) language, which will be critical when launching new climate initiatives and regulations.

In the draft Plan there is a brief mention of the City's forthcoming Equity Framework and there is a commitment that City staff will use "equity as a planning tool" and a basis for developing CEAP's equity indicators. This commitment, paired with the continuation of the Climate and Equity Working Group and the development of an Environmental Justice Charter, is the most significant indicator of equity considerations in the entire draft Plan.

¹ Census Profile, 2016 Census. Topic "Visible Minority". Accessed at:

<https://www12.statcan.gc.ca/census-recensement/2016/dp-pd/prof/details/page.cfm?Lang=E&Geo1=CSD&Code1=5915022&Geo2=PR&Code2=59&SearchText=vancouver&SearchType=Begins&SearchPR=01&B1=Visible%20minority&TABID=1&type=1>

² Census Profile, 2016 Census. Topic "Aboriginal peoples". Accessed at:

<https://www12.statcan.gc.ca/census-recensement/2016/dp-pd/prof/details/page.cfm?Lang=E&Geo1=CSD&Code1=5915022&Geo2=PR&Code2=59&SearchText=vancouver&SearchType=Begins&SearchPR=01&B1=Aboriginal%20peoples&TABID=1&type=1>

Therefore, we recommend that the City invest immediately in professional development of its staff, especially those in the planning and climate policy departments, to increase understanding of economic and racial justice and how to apply anti-oppressive frameworks in their line of work (e.g. policy development, community co-design and governance processes, communications).

Create Language Access

To implement the full range of actions associated with the Big Moves, it will be important for the City to translate all support tools, advice and incentives for residents, community groups and local businesses into multiple languages. For example, to help building owners and operators of all ethno-cultural backgrounds understand the carbon pollution limits and timelines, the permit process for heat pumps, and available options and incentives, this information should be provided in people's primary language. The City should also ensure that it is able to offer relevant services, such as providing advice on the types of building improvements and the permit process, in commonly spoken languages.

Advance Benefits & Prevent Harm

Recommendations:

- Adopt a multi-benefits framework that identifies ways to prioritize investments for equity-seeking groups
- Develop strategies and programming with community partners to reduce barriers for equity-seeking groups, including racialized residents

The report refers to its "intentions to advance equity", but in many cases, the climate actions contain measures to avoid impacts to equity-seeking groups rather than create benefits or advance equity. While climate policies should at minimum do no harm to those who have been systematically oppressed and marginalized, policy makers must demonstrate they can and will go further by intentionally designing policies with clear, accountable co-benefits for equity-seeking groups and for Indigenous people.

The two largest sources of Scope 1 and 2 emissions in Vancouver are related to fossil fuel use in transportation and buildings. For low-income people, these are also the two largest household expenses. The current Plan is said to focus on income inequity (rather than racial inequity), but rather than identify policy solutions that can reduce income inequity through the advancement of co-benefits for low-income people, there is a focus on reducing the co-harms of identified policy solutions.

The Plan can more clearly articulate the importance of prioritizing investment in actions that have multi/co-benefits for equity-seeking groups and indicate how "triple bottom-line" strategies will be used to measurably address social equity, stimulate the local economy and reduce GHGs. We recommend developing a multi-benefits framework that identifies ways to prioritize investments that will benefit equity-seeking groups and Indigenous people.

This will be particularly important in order to both maximize benefits and mitigate impacts of infrastructure investment described in the Plan (e.g. active transportation, transit, EV charging, amenities, building retrofits). Infrastructure investment can act as an economic stimulus that can protect or increase local jobs and improve residents' access to services and quality housing, but it is important to be more specific about how these investments can positively impact specific neighbourhoods and demographics (for example, areas with local businesses owned by and serving equity-seeking groups). A multi-benefits framework can also serve to identify

linkages that help to achieve other City priorities, such as commitments and strategies to respond to the affordable housing crisis.

There can be serious co-harms associated with infrastructure investment as well, such as the permanent displacement of equity-seeking groups, Indigenous people, small and/or ethno-cultural businesses, etc. It is critical to complete an analysis around mitigating the risks of displacement of equity-seeking groups due to infrastructure investments, which may include consequences of increased property values and rents that low-income residents and business owners cannot afford, gentrification of the neighbourhood which changes demographic representation, and even aspects of environmental design and 'nuisance abatement' in buildings, public spaces and amenities which intentionally 'police' or 'other' certain behaviours and practices that may cause harm to certain populations.

The intended reduction of co-harms is most evident in Big Moves 3 and 4 in the draft Plan. A direct income-based intervention was only identified once -- in Big Move 3 where it says "Permit rates will be... indexed to account for household income in some way". There are no details as to how this would be accomplished or what reference point would be used to ensure impact avoidance. All other references that suggest a policy design will reduce co-harms of the climate policy mechanism on low-income residents are implied and appear to be based on certain assumptions:

- Low income people will not purchase an expensive new carbon intensive vehicle, therefore they will not be impacted by the Parking Permit Surcharge
- Visible minorities have lower uptake of active modes of transportation and live in 'less dense' areas
- Low income people live in rental buildings, therefore they will be the last to be impacted by carbon limits
- Ride hailing drivers live in rental buildings, therefore providing EV charging infrastructure in these buildings will reduce livelihood impacts of requiring zero emissions vehicle fleets
- Low income seniors who own homes will likely sell soon, therefore they may not access financing and instead be required to pay fees but they can defer these fees

These assumptions will need to be validated to ensure that policies will not have unintended harms, which may require access to robust data and direct engagement with key demographics and household types.

Based on the preliminary evidence that 'visible minorities' have much lower uptake of active modes of transportation, there is value in developing partnerships with community agencies and organizations to identify and address barriers being faced by racialized populations in certain geographic areas of Vancouver. There are good examples of this kind of program in other jurisdictions such as the Scarborough Cycles program in Toronto.

5. OBSERVATIONS & RECOMMENDATIONS ON THE BIG MOVES

Address Transportation Equity

Recommendations:

- Commit to completing an external equity transportation audit
- Ensure that the mobility experiences of people with Disabilities/Disabled people are included in the Plan
- Consider investing revenues generated from Transport Pricing and Parking Permit Surcharge into transportation equity measures
- Define the 5 priority bus routes that will connect to the Metro Core and who they will serve
- Assess public investment in Electric Vehicle charging infrastructure

2016 data highlighted at the end of the draft Plan indicates that ‘visible minorities’ are far less likely to walk or bike to work in Vancouver but City staff do not currently know why. If this is so, Big Move 1 and 2 require much richer data and deeper equity-focused inquiry to inform how active transportation investments will address this disparity and help to meet the modal shift targets Vancouver has adopted.

Are less dense areas where more people rely on cars also more ethnically diverse and lower income? If planning for investments that increase modal shift to active transportation and transit is only dictated by how many people per dollar invested will shift modes, these resources will continue to be inequitably distributed to more affluent and white neighbourhoods. Furthermore, it is noted in the staff comments (in the Plan document) that the cycling infrastructure is well set up for recreation and commuting but not for daily trips such as to get groceries. It is important to understand the demographics of this current mode of transportation and to identify barriers to further uptake.

Three of the six Big Moves are transportation-related and there appear to be many unanswered equity questions that may result in major implications without further and immediate study. We believe the external equity transportation audit is a critical first step that should be committed to in this Plan, rather than simply listed as one of the possible “ways to address equity” (pg. 24). It should take place immediately so that it can effectively inform that implementation of the gamechangers including Transport Pricing (for Metro Core), Parking Permit Rates (based on market pricing), and a Parking Permit Surcharge (for new carbon intensive vehicles) as well as inform ‘complete’ neighbourhood planning and the Environmental Justice Charter.

The Plan needs to more clearly describe the potential impacts and benefits of electrification and expanded transit and active transportation infrastructure for people with Disabilities/ Disabled people including people using wheelchairs and a range of mobility aids and devices (e.g. include measures around road space reallocation). The external equity transportation audit should address this.

It may be worth considering a mechanism whereby any revenues generated from the surcharge are invested in transportation equity measures that are identified by the audit. This may mean, for example, that Parking Permit Surcharges designed to increase EV adoption may not necessarily result in EV-related investments unless there is a compelling case for electric transportation infrastructure investments made by equity-seeking communities with whom the City consults.

In Big Move 2, the Plan states that new priority bus routes will prioritize connections to the Metro Core to ensure 'enhanced alternatives' are available prior to introducing the Transport Pricing mechanism in the Metro Core in 2025. This implies that the City of Vancouver knows which regional transportation routes are most needed to increase transit service for the purpose of modal shift from personal vehicles to public transit.

Priority bus routes, from an equity point of view, could be a significant 'gamechanger'. While this type of solution may require regional coordination and collaboration with other orders of government and authorities (i.e. Translink), it is important to provide more details in the CEAP on the planned priority bus routes including where they will be located and who they will serve, especially the 5 priority bus routes that will be established by 2025, since Transport Pricing is set to be introduced by 2025 or sooner. Will these routes advance equity by ensuring rapid, reliable, safe and affordable transit service for neighbourhoods that currently rely on personal vehicles to reach Metro Core destinations?

There are a number of mechanisms that could be used to reduce car use in the Metro Core and we do agree that Transport Pricing (through parking fees) is worthwhile as long as alternatives are in place that are rapid, reliable, safe and affordable. Increased uptake in telecommuting (especially since COVID-19) is likely to reduce the number of commuters travelling to districts in Vancouver that have large numbers of office buildings, but it is important to recognize the major disparity between who is able to work from home and who cannot – with far more equity-seeking communities and lower income people unable to do so.

As recognized in the draft section for Big Move 3 Zero Emissions Vehicles, there is economic inequality associated with the financial barriers of purchasing an electric vehicle based on the current market prices and accessing charging stations. However, there are larger fundamental inequities in this section that need to be addressed. One significant principle-based question that should be asked relates to the common good (health, well being, resilience) and the spending of public dollars. In the current context of limited financial resources, does major public investment to incrementally increase private ownership of personal electric vehicles contribute more to the common good than investing this money into publicly-owned transportation assets (transit, bike shares, e-bike shares) and other large scale ride-sharing fleets?

From a justice perspective, there are far greater social and economic benefits to investing in safe, reliable and affordable mass transportation and active transportation infrastructure. From an embodied carbon perspective, modal shift to active transportation, public transit and car-sharing options are far less resource intensive and far more resilient from a mobility perspective than encouraging - let alone incentivizing - more personal vehicle use. From a public space perspective, electric vehicles will not eliminate traffic congestion, parking issues, pedestrian and cycling fatalities, and debates over the utilization of road space for active transportation and priority transit routes versus personal vehicles.

From an economic inequity perspective, until the market price of leasing or owning an EV is within reach for moderate income households, there is very little rationale for using public funds to financially subsidize the personal vehicle use of high-income residents in Vancouver (e.g. cheaper parking, free charging, rebates). At this stage, any EV charging infrastructure owned by the City for public use should be provided as a fee-for-service as part of a cost-recovery strategy. Investing in or incentivizing the installation of charging infrastructure in rental buildings may need deeper analysis before proceeding, given that only anecdotal evidence was provided that this may support the EV transition for ride-sharing drivers, and it could contribute to rental increases that negatively impact tenants. We recommend that the investment of public funds in this infrastructure be assessed against other priorities (e.g. transit and active modes) and for the unintentional transfer of resources to higher income groups.

Deepen the Complete Communities Framework

Recommendations:

- Acknowledge the historic impacts of urban planning decisions
- Unpack and deepen ‘complete communities’ concepts from a cultural, social and environmental justice perspective
- Implement VanPlay in ways that prioritize neighbourhoods that lack access to green space and amenities and are at risk of extreme weather events

At a system change level, it is important that the City of Vancouver acknowledges how historic urban planning decisions not only contributed significantly to racial and economic oppression and marginalization (e.g. poverty by postal code, ethno-cultural ‘red lining’, underinvestment) but also contributed to car-centric designs that intentionally limited ‘walkability’ in suburban areas and other decisions that resulted in fewer amenities and services being available in close proximity to residential buildings.

The complete communities Big Move provides an important engagement, learning and planning opportunity for the City. While existing frameworks can be useful, developing an understanding with specific place-based communities and ethno-cultural groups about how they would define a complete community and the “daily needs” they would like to access within walking distance, will be critical for planning Vancouver’s future low-carbon neighbourhoods. The kind of infrastructure, amenities and local businesses that are established and promoted can have a profound impact on the character of neighbourhoods and the impact of gentrification processes.

As a starting point, based on the standard complete communities framework the City is applying, it is important to identify which parts of the city/neighbourhoods are “closest” to becoming complete communities. If the City overlays this geographical planning data with data on household income and the presence of ethno-cultural communities what patterns emerge? What does this say about planning considerations and investments that need to be made? What is the relationship between complete communities and gentrification processes in Vancouver? We recommend undertaking this kind of mapping analysis as a foundational element for the Big Move, if it has not already been done.

With reference to VanPlay implementation, we strongly encourage the City to prioritize neighbourhoods that lack access to green space and amenities and are at risk of extreme weather events. For example, consider the role that green infrastructure can play in stormwater management, and how facilities like swimming pools and parks can be helpful during heat waves. Again, this kind of analysis of who has access to green spaces, and how this relates to projected climate disruption, is an important element of planning complete communities.

It is important to consider how people with Disabilities / Disabled people experience complete communities, especially in the context of being disproportionately impacted by extreme weather events. For example, Vancouver appears to be ill-equipped for snow in general, but this kind of weather can profoundly impact some residents’ ability to access amenities and services to meet their daily needs. While it is positive that “rolling” has been noted along with other forms of active transportation, the needs of people using a variety of mobility aids and devices – including, but not only limited to, wheelchairs and electric scooters – must be considered. There are some similar, and overlapping, considerations for seniors who may experience mobility barriers and need to access essential services near their homes, including during extreme weather events.

Ensure That Public EV Investments Have Co-Benefits

Recommendations:

- Identify and track the co-benefits realized from increased public investment in EV charging infrastructure

Aside from the primary equity concerns related to public investment in EV infrastructure identified above, there are a few additional feedback points to share.

Some co-benefits to investing in EV charging infrastructure may include increased emergency preparedness in buildings (if it can be used as a back-up power battery) and the possibility that charging infrastructure could be temporarily used as a fee-for-service electric power source for road works crews, food trucks and other mobile structures that currently rely on polluting energy sources. If the City is going to prioritize investing in charging infrastructure in low-to-moderate income neighbourhoods that are less likely to have access to home charging stations, these stations should have community-level endorsement that they have value for adaptive uses (such as back-up power or mobile structures mentioned above) in the interim while electric vehicle leasing and ownership is financially out of reach. Otherwise, active transportation investments such as e-bikes might have higher uptake.

We are in strong support of public investment to electrify publicly-owned fleets (e.g. buses, service vehicles). Potential co-benefits include accelerating EV manufacturing capacity and market price drops for personal electric vehicles of the same make/model that the City of Vancouver procures, improved local air quality, and increased workforce opportunities (training and employment) in the EV supply chain including transitioning mechanics to new skills.

These co-benefits should be tracked and publicly reported on to increase accountability in the public investment of EVs.

Lastly, we are in strong support of introducing regulations that require vehicle service sector establishments (e.g. gas stations) to install EV charging stations. We would caution that some gas-stations are owned and operated as small businesses that may need special consideration.

Prevent Tenant Displacement and Prioritize Investments in Low Carbon Existing Buildings

Recommendations:

- Demonstrate how the City will prevent renovations and the displacement of low and moderate income tenants including establishing a public record for building upgrades to meet regulatory requirements
- Provide larger and immediate financial incentives for any residential building (regardless of phase) that provides relatively affordable and stable housing to low and moderate income residents
- Provide widespread education on the regulations and access to emergency assistance to avoid 'regrettable' time-sensitive building system replacements

We strongly support the City's recommendation to set carbon pollution limits for existing buildings but there are significant equity considerations that need to be addressed prior to finalizing the design of this 'gamechanger'.

From an emissions point of view, it makes sense to target the worst performing, most polluting existing buildings first. However, without a complete understanding of who owns and leases those commercial buildings and owns or rents those single-family homes, there is a very high risk that this regulation could cause significant financial harm or even displace low to moderate income businesses and residents. A clear plan to financially support the capital costs of these upgrades and guarantee no 'renovictions' or above guideline rent increases is needed.

The City of Vancouver should clarify the rationale for the residential building criteria of this phased-in requirement. Why are single-family homes in the first phase, and condos and 'rental buildings' in the second phase? If based on criteria defined by energy modelling and benchmarking, the most polluting buildings may also include certain aging and poor performing multi-residential apartment buildings or luxury condominiums.

Given the cost-saving and comfort co-benefits these low-carbon building upgrades can achieve, there is an equity-related rationale for providing larger and immediate financial incentives for any residential building that provides relatively affordable and stable housing to low and moderate income residents, regardless of whether they own or rent or live in a 'single-family', low-rise or high-rise building. If carefully executed, initiatives like this could support the City's strategies to increase the availability of, and preserve existing, affordable housing.

Regardless of whether the City decides to define first phase by building type or pollution levels, adequate financial supports and safeguarding mechanisms will need to be in place to ensure that low to moderate income residents and commercial tenants in buildings that make upgrades or pay carbon limit fees will not face 'renovictions' or unaffordable hikes in their rents or leases, since this could lead to permanent displacement. In Toronto, any public or utility-funded retrofit incentive for residential buildings includes a condition in the agreement that the building owner is not allowed to count any of the capital upgrades towards an above-guideline rent increase. Vancouver should take this a step further and ensure that all buildings that undertake upgrades to meet the regulatory requirements, and in particular any buildings that receive financial support to do so, are transparently listed in a public record that is easily accessible to tenants and housing advocates. This would help to ensure there is available evidence for tenants rights cases related to renovictions and above-guideline rent increases, and may act as a preventative measure.

If there is a limited pool of funding to provide financial incentives, it is important to prioritize low-interest loans and non-repayable grants for non-profit housing providers, multi-residential affordable rental housing, and vulnerable homeowners who demonstrate financial need or have no ability to secure retrofit financing from a private lending institution. We note that there is draft content in the Indicators Table focused on this area.

The draft Plan recommends phasing for the carbon limits of existing buildings in a way that is presumed to target high-polluting buildings first (commercial buildings and single-family homes) and delay impacts to low income residents. Without reference to data, there appears to be a number of unchecked assumptions being made about where low to moderate income residents live including an assumption that they do not live in single-family homes (either as homeowners or renters) and/or do not live in large homes. Based on our exchanges with Hua Foundation, anecdotally, it appears that there are many low to moderate income (i.e. working class) residents living in single-family homes in South Vancouver. Some of these households may be multi-generational and may own the home but have limited financial ability to make capital investments (e.g. seniors and others living on fixed incomes). Some residents living within single-family homes may formally or informally rent rooms or subdivided units. Household income is a much better equity indicator for regulatory and incentive tools than building type.

Finally, we agree that the City will need “robust data” on the annual emissions of each building. We recommend collecting data on the age and performance of the heating and cooling systems in existing buildings. This will significantly influence the adoption of alternatives such as heat pumps since there are already ‘sunk costs’ in the current assets. Both from an embodied carbon and financial fairness point of view, it is critical that the City of Vancouver provides widespread education on the regulation and access to financial incentives to all building owners immediately, regardless of what phase of the carbon pollution limit may apply to them. Building owners need to know upfront that it would be an unwise investment to install new fossil fuel reliant equipment for their building systems. When a system fails, building owners will be forced to immediately repair or purchase a replacement. A lack of awareness as well as long wait-times for grants or low-interest financing (as well as uncertainty on whether or not they are eligible) could easily lead to a building owner or operator investing in what is familiar to them and/or the tradesperson involved in the repair or installation.

Address Social and Economic Factors in Scope 3 Emissions

Recommendations:

- Consider transparent and ethical sourcing of materials as well as a commitment to meet certain equity requirements for City-owned building projects
- Commit to expanding the embodied carbon assessment to other strategic public investment and procurement areas
- Analyze Vancouver’s consumption-based emissions to better account for household carbon footprints
- Involve stakeholders from ethno-cultural food systems in developing and implementing policies or programs

It is exciting to see some Scope 3 emissions being addressed as part of Vancouver’s CEAP. The City of Toronto recently initiated consumption-based emission modelling and committed to a net-zero emission target for 2050. It is important to acknowledge that better understanding household consumption-based emissions is a basis for addressing wealth-related correlations to household carbon footprints. More clarity on how the City will begin to address these types of disparities between households in the Plan is an important step forward in climate justice, since those who are on the front-line of climate-related impacts – from extreme weather to economic shifts – have contributed the least to carbon pollution. Wealth is also one of the greatest factors affecting the disproportionate levels of climate resilience in urban households. Consumption-based emissions like the consumption of non-essential goods and services, waste production, food consumption and food waste, and non-essential travel (especially aviation) need to be analyzed and factored into action plans.

In Big Move 5 Low Carbon Construction Materials, it is good to see there will be principles and practice established around the ethical sourcing of materials, health, circularity and affordability. In the City Leadership section, the City commits to undertaking embodied carbon assessments of all new construction of City-owned buildings and specific reduction targets for embodied carbon of the building materials. These learnings will be very valuable, but even more immediately tangible will be the economic benefits to the low-carbon material supply chains from which the City’s contractors procure. We encourage the City to consider transparent and ethical sourcing of materials and a commitment to meet certain equity requirements for these building projects.

Furthermore, we encourage the City to commit to expanding its embodied carbon assessment to other strategic public investment and procurement areas. We were pleased to see mention of “exploring” public infrastructure projects and note of a successful case study (Arbutus Greenway), but a commitment to expand this assessment and procurement framework to other public projects would send a strong signal that could

significantly influence the local market. Other investment area considerations could include existing buildings, the waste management system (including energy-from-waste facilities), and the local food system(s).

There is great potential to expand the Embodied Carbon Strategy to areas beyond new building construction materials. The embodied carbon of existing buildings is considerable, which is why preservation, renovation, retrofitting and adaptive reuse of these buildings should be prioritized over demolition, except in extreme cases. The City of Vancouver, in its waste management requirements for construction and demolition waste, places an expectation on building contractors to reuse or recycle these building materials as much as possible. This is a great example of how zero waste and a circular economy support climate targets, especially once Scope 3 emissions are considered.

We have found that waste (including food waste) is a strong climate engagement entry point across diverse communities and settings, but can be undervalued due to proportionally lower GHG impacts (when Scope 3 Emissions are not included). In our Toronto context, access to organic waste diversion facilities and collection services is an equity issue with significant disparities between single-family homes and many multi-residential buildings because high-rise buildings can opt for private waste collection services (these provincially regulated operators are not required to collect organics) but also due to structural building barriers (i.e. sorting facilities are not easily accessible to residents on all floors). As such, waste diversion can be an important element of multi-residential “green buildings” strategies, which include opportunities to enable organics diversion structurally (e.g. repurpose the garbage chute for organics) and also as a resident engagement tool.

Similarly, our experience is that food can serve as an effective entry point for engaging diverse communities in climate action, but can be undervalued when assessed purely on a GHG impact perspective (especially in the absence of life-cycle analysis and Scope 3 Emissions). Local food growing programs, especially in community gardens, can serve as multi-generational knowledge transfer opportunities, providing an opportunity to introduce the concepts of local access to fresh produce and reducing food miles.

Food and climate strategies are an opportunity to learn from Indigenous food growers and other local growers from different ethno-cultural groups including newcomers. People who cultivate the land are often very attuned to changes in weather patterns and understand climate disruption from that perspective. Strategies that include climate-friendly cultural foods and practices, can avoid the pitfalls of advocating for plant-based diets in ways that are culturally oppressive and do not optimize connections to community and cultural identities. It is important that these strategies engage people in different settings – multi-residential buildings (balconies, rooftops), community gardens, schools – and are not just centred on backyard growing.

Changes to City procurement and practices through the revised Green Operations Plan could present a good opportunity to connect with local food businesses owned by Indigenous people and equity-seeking people including caterers, food distributors, and small manufacturers. We understand from our exchanges with Hua Foundation that there are thriving ethno-cultural parallel economies in Vancouver’s food system that may not be acknowledged or included in mainstream contract opportunities, consultation strategies, or policy development. Is it important to involve stakeholders from the entire food system in developing and implementing policies or programs that impact these sectors.

In the Toronto region for example, there was a past initiative funded by the Greenbelt Foundation to link regional farms that grow (or can grow) ethno-culturally specific foods with local stores that served specific ethno-cultural communities. Language translation and ethno-culturally specific materials that promoted the location of these stores selling locally grown food was an important step in addressing the climate change

impacts of imported foods while ensuring that Toronto neighbourhoods had greater access to culturally appropriate, affordable, healthy, and fresh produce.

Support Inclusive & Green Economic Development

Recommendations:

- Go beyond NAICS codes to define Vancouver's green economy and develop equity milestones
- Develop strategies to set up workers and businesses from equity-seeking communities for success, rather than only relying on existing sectoral relationships
- Understand, consult, and collaborate with the diversity of tradespeople and general labourers that do existing building contract work in Vancouver
- Develop near- and longer-term workforce development strategies to reduce employment barriers and increase participation by Indigenous and equity-seeking groups in the growing demand for a green workforce
- Demonstrate how City-owned assets can act as 'learning labs' for low-carbon building workforce development

In the draft Plan, there were no details provided on what constitutes the green economy in Vancouver as this section was not yet drafted.³ Which sub-sectors are included in the current definition should be described and it should adequately cover all of the sectors involved in the 6 Big Moves, such as resource management and environmental stewardship, manufacturing, trades, maintenance and service sectors. This type of description and analysis requires going beyond the North American Industry Classification System (NAICS), which has been inadequate in accurately identifying green businesses.

In order to ensure that the growth of the green economy is inclusive and has equity milestones, it is important to first benchmark the state of the green sector in Vancouver. What percentage of green businesses / enterprises in these sub-sectors are owned by Indigenous or equity-seeking people? What are the demographics of the green economy workforce? Who is included in the depiction of "communities underrepresented in these [green building] trades"? Economic and employment benefits, and potential impacts of the CEAP, were not included in the draft Plan we reviewed, but we would stress the importance of disaggregating the data the City has for the green economy in Vancouver in order to identify what type of equity milestones may be met.

Furthermore, the City needs to carefully consider who is not yet accounted for in the current definition and data sets of Vancouver's green workforce. For instance, the green economy may not currently include important roles in low-carbon buildings such as building maintenance workers managing the energy system or restoration specialists preserving the embodied carbon of existing buildings, or include the diverse mix of low-carbon care and service workers that make 'complete communities' possible. It may not include all the relevant upstream and downstream economies in the supply chain of low-carbon building materials and equipment.

³ We noted draft content in the Economy section of the Indicators Table "Develop a Zero-Carbon Economic Transition Strategy that lays a framework, and undertakes activities and initiatives to set Vancouver's economy on a path towards resilience, prosperity, opportunity, and decent work for all, within planetary boundaries", which presents a huge opportunity for achieving equity-focused outcomes.

It is our understanding based on exchanges with Hua Foundation, and our own insights from Toronto, that there are parallel ethno-cultural economies operating in Vancouver including, but not limited to, the building trades (e.g. Chinese tradespeople and general labourers). Therefore, it is critical to understand, consult, and collaborate with the diversity of tradespeople and general labourers that do existing building contract work in Vancouver, including those formally represented by unions as well as those working in parallel through their own formal associations or informal networks. Building these long-term relationships is critical and will clarify whether equity-seeking groups are underrepresented populations in specific trades or simply underrepresented in the statistics and stakeholder lists relied upon to inform government decision-making.

When the Plan mentions “assessing opportunities to target training at communities under-represented in these trades”, there are layers of assumptions being made that need to be unpacked. As indicated above, representative experts from the specific ethno-cultural target communities including representative tradespeople would likely need to be brought in to assess the value, feasibility and opportunities to provide this trade-specific training. Furthermore, research we have conducted and on-the-ground experience in Toronto clearly indicates that low-income and racialized job seekers new to the trades may need specific wrap-around supports to succeed (e.g. educational upgrading, pre-apprenticeship training, financial assistance, ethno-cultural or gender-specific mentorship) as well as employers that are committed and accountable to providing a safe working environment free from oppression and violence.

Underrepresented or not, it is very likely that tradespeople and contractors who are racialized or Indigenous are not equitably accessing current opportunities in the mainstream green building trades in Vancouver. Intentional design and collaboration with these groups could turn these upcoming regulatory changes for existing buildings into opportunities to create workforce pathways for equity-seeking groups, both as employees/tradespeople and as local ethno-cultural businesses.

It is important to ensure that the new regime of low-carbon regulations and incentives, do not entrench the economic status-quo (i.e. only benefit white-owned businesses and white-dominated trades who are better positioned to take advantage of green economic opportunities and supply chains) but extend opportunities generated to equity-seeking people and communities.

The City of Vancouver should demonstrate proactive measures that can be taken through the CEAP, and other ongoing climate-related plans and strategies, to benefit local businesses owned by Indigenous and equity-seeking people. If they exist, the City should link this work to community benefits frameworks that may be in place for publicly invested projects (including economic stimulus provided for post-COVID recovery efforts) as well as link to any current or planned social procurement or environmentally sustainable procurement policies and procedures.

The City should also work to develop near- and longer-term workforce development strategies to reduce employment barriers and increase participation by Indigenous and equity-seeking groups in the growing demand for a green workforce. The CEAP should outline clear next steps, including any investment and partnership commitments, that will initiate training, mentorship, apprenticeship programs or other mechanisms to ensure there is a skilled and ethno-culturally diverse workforce ready to meet the City’s demand.

A prime example in the Plan is the City Leadership section of Big Move 4 - Zero Emissions Space and Hot Water. As the owner and operator of over 600 buildings, the City has identified a major opportunity to lead by example that goes beyond reaching higher performance targets for corporate carbon emissions when upgrading their buildings and providing appropriate training to their staff. The City has an opportunity to

demonstrate how they can use their City-owned assets as ‘learning labs’ for low-carbon building workforce development that can prioritize opportunities for equity-seeking tradespeople and pre-apprentices, potentially working with local contractors (union and non-union) that are eager to upskill their workers and get ahead of the curve.

Training supports for green building trades is an important aspect of upskilling existing tradespeople to build sector readiness and increase low-carbon building performance as well as to create workforce pathways for equity-seeking groups that may be underrepresented in these trades.

It is also important to consider just transition plans for any sectors that could be significantly impacted by climate policies and regulations. For instance, in the section related to carbon pollution limits for buildings, there is a reference to trades training being developed so that gas contractors are provided with opportunities to learn about heat pump installation. While this consideration may be well meaning from a just transition perspective, looking to offset potential impacts of switching from gas to electric heating and cooling systems, it is important to consult with specific trades associations to identify transition opportunities that fit well with their trade, where possible. Based on our limited understanding of the trades, heat pumps may be more associated with HVAC tradespeople than gas contractors. HVAC also handles refrigeration and may be more inclined to adapt to new processes for safe management of refrigerants which was highlighted as an internal priority for City-owned buildings. Gas contractors tend to be more associated with plumbers and pipefitters, therefore they may be more motivated to apply and adapt their skills to initiatives related to the promotion and expansion of renewable natural gas use in building systems and by local utilities. Before committing to training programs or supports for specific tradespeople, consult with them directly and identify opportunities to collaborate with trades associations, training centres, and educational institutions.

6. OBSERVATIONS & RECOMMENDATIONS ON INDICATORS & MILESTONES

Recommendations:

- Build on Equity Milestones that reflect deep commitments to equity and a multi-benefits approach
- Prioritize generating, applying and tracking disaggregated socio-demographic data and equity-focused data related to specific CEAP actions
- Engage community partners in developing and implementing the CEAP's data collection strategy

We were encouraged by the Equity Milestones structure and draft placeholder examples, which reflect a promising start to embedding accountability for progress on equity outcomes in the Plan. Some of the draft milestones could be referenced in the body of the Plan (when finalized), since they highlight significant equity-focused strategies and deliverables in the Big Moves such as “deliver a program that assists low-income households in retrofitting to zero emissions” and “a strategy to ensure that [those living in older buildings, lower income households, etc.] do not experience an inequitable financial burden due to this action”.

We noted that several draft milestones included developing strategies to “direct benefits” to equity-seeking groups such as enhancing equity in the construction and building industries. As per our earlier recommendations on applying a multi-benefits framework, we believe that integrating such milestones will provide an important starting point for measuring how benefits accrue to equity-seeking groups over time in later phases of measurement.

We were also encouraged to see draft commitments that focus on generating disaggregated socio-demographic data for decision-making processes and tracking progress. As discussed above, disaggregated data analysis will be critical in understanding how multiple equity dimensions interact with the proposed climate actions. At present, there seems to be a lack of references in the Plan to statistics, community-provided information and research that connect different dimensions such as race, income and housing data. In addition, several of the foundational assessments noted in the Plan and Indicator Table will generate important baseline data that can inform how specific actions are designed, implemented and measured such as the transit equity assessment and the external equity impact assessment of proposed retrofit actions. While the Equity Framework may establish cross-cutting socio-demographic indicators and targets, these assessments address a critical need to generate equity-focused data that is specific to the CEAP actions. At present, in the absence of some key baseline data, it seems reasonable that the CEAP's short-term milestones would include community engagement processes, assessments, strategies and plans to establish the basis for longitudinally tracking indicators and targets over a longer period.

Significant data elements noted in the Indicator Table, such as mapping where equity-seeking populations live and capturing their perspectives, will most certainly require the City to work with community partners (e.g. local organizations working with Indigenous people, ethno-cultural groups, people with low incomes and people with Disabilities/Disabled people) on developing and executing CEAP's monitoring and evaluation framework. For example, we anticipate that this milestone on active transportation – “we will have maps/data that show where major improvements are needed and where equity-seeking populations live; we will prioritize where we build based on this” – will necessitate engaging a wide range of partners to identify or confirm where particular communities reside and how improvements connect with their needs and priorities. In addition, the City's positive commitment to applying mixed data collection methods, including storytelling, as recommended by the

Climate and Equity Working Group, will require new forms of collaboration to reach and engage target participants.