

The following table includes the Ministry of Transportation and Infrastructure (MOTI)'s responses to comments submitted to the BC Environmental Assessment Office (EAO) as part of the 61-day public comment period held between August 3 and October 3, 2016. In some cases where letters were received, MOTI has provided a response by letter. These letters and MOTI's responses can be found on EAO's website.

EAO has reviewed the public's comments and MOTI's responses and is satisfied that MOTI has addressed the public's comments for the purpose of the Application Review stage of the Environmental Assessment for the proposed George Massey Tunnel Replacement Project. The time and effort taken by those who submitted comments to EAO during the public comment period is appreciated and all of the comments received will be considered in the Environmental Assessment of the proposed George Massey Tunnel Replacement Project.

| Date | Name | Location | Comment | Response |
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| 4-Aug-16 | Anonymous | Richmond | I am thrilled with the new Project! Huge thanks to the team who came up with such a good solution to an environmental nightmare. I despair every time I see cars and trucks idling near the tunnel. Moving vehicles = less time on the roads = less pollutants. Trucks will no longer have to try to beat the traffic and clog up #5 Road. Steveston Hwy will no longer be a bottleneck. North and South bound traffic will flow, flow, flow. I very much look forward to leaving my car behind and crossing the bridge on my bike. Taking transit will also be so much easier, especially with the bus exchanges at Steveston and Hwy 17A. Fingers crossed SkyTrain will find its way across sooner than later. Thank you for including potential in the planning. The choice of a bridge that stays within the current highway alignment is very wise. A second tunnel or bridge in a different area would have such an impact on farm land. Good luck - let's get it built! | <p>Thank you for your support of the Project and your comments on air quality, traffic, and agricultural use.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Air Quality: As you noted, Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. See Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: Transit is very important to commuters along this corridor. This is the busiest Fraser River road crossing in terms of transit users with more than 10,000 people take transit on this corridor daily. About 17 per cent of all travellers through the tunnel today are using transit. The new bridge design includes dedicated transit/HOV lanes to ensure reliable transit service, and will be built to accommodate future rapid transit service. A dedicated transit ramp from Highway 99 to Bridgeport Road in Richmond will improve access, safety and reliability for buses destined to Canada Line. Integrated transit stops, including pedestrian and cyclist access, will be built into the Steveston Highway and Highway 17A interchanges.</p> <p>Agricultural Use: As you noted, a second tunnel or a bridge in a different area would have a huge impact on agricultural land. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. In fact, Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) for more details.</p> |
| 4-Aug-16 | Anonymous | White Rock | Building a ten-lane bridge to replace the Massey Tunnel is just a very bad idea. This proposed bridge will create more gridlock, not less. It will destroy Burns Bog and surrounding agricultural | Thank you for your comments on air quality, agricultural use, traffic and Burns Bog. |

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| | | | land. It will add to our air quality concerns and increase global warming. The bridge will encouraging more and more trucking when we should be considering rail transport. I believe our Liberal Government in BC is creating this bridge to create jobs and lots of money for their friends. It is shameful. | <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agricultural use. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) for more details.</p> <p>Traffic: The Project has been designed to support a range of transportation, land use and economic development objectives identified in a range of regional and local land use and transportation plans. As currently proposed, the Project will reduced congestion, improve travel time and reliability, improve transit service, provide new alternatives for cycling and walking, and better accommodate merging and slower moving traffic, In addition, the new bridge will be built to accommodate potential future rapid transit. Highway 99 is one of the most significant goods movement corridors in the Metro Vancouver region. The Province has a mandate and responsibility to British Columbians to keep this highway operating efficiently. This mandate supports and also extends beyond regional land use and transportation objectives. Section 5.1 (Traffic) of the Application presents the challenges of current traffic levels at the existing Tunnel and the need of the proposed Project to support future traffic growth.</p> <p>Transit is very important to commuters along this corridor. This is the busiest Fraser River road crossing in terms of transit users with more than 10,000 people taking transit on this corridor daily. About 17 per cent of all travellers through the Tunnel today are using transit. The new bridge design includes dedicated transit/HOV lanes to ensure reliable transit service, and as noted above, will be built to accommodate future rapid transit service. A dedicated transit ramp from Highway 99 to Bridgeport Road in Richmond will improve access, safety and reliability for buses destined to Canada Line. Integrated transit stops, including pedestrian and cyclist access, will be built into the Steveston Highway and Highway 17A interchanges.</p> <p>Other (Burns Bog): The Project is close to, but does not touch, Burns Bog. Sensitive vegetation ecosystems are discussed in Section 4.7 (Vegetation) of the Application, which describes the potential influence of the Project on vegetation within the local and regional area. The Project is not anticipated to impact Burns Bog.</p> |
| 4-Aug-16 | Susan Ellis | White Rock | Building a ten-lane bridge to replace the Massey Tunnel is just a very bad idea. This proposed bridge will create more gridlock, not less. It will destroy Burns Bog and surrounding agricultural land. It will add to our air quality concerns and increase global warming. The bridge will encouraging more and more trucking when we should be considering rail transport. I believe our Liberal Government in BC is creating this bridge to create jobs and lots of money for their friends. It is shameful. | <p>Thank you for your comments on air quality, agricultural use, traffic and Burns Bog.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the</p> |

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| | | | | <p>Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agricultural use. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) for more details.</p> <p>Traffic: The Project has been designed to support a range of transportation, land use and economic development objectives identified in a range of regional and local land use and transportation plans. As currently proposed, the Project will reduced congestion, improve travel time and reliability, improve transit service, provide new alternatives for cycling and walking, and better accommodate merging and slower moving traffic, In addition, the new bridge will be built to accommodate potential future rapid transit. Highway 99 is one of the most significant goods movement corridors in the Metro Vancouver region. The Province has a mandate and responsibility to British Columbians to keep this highway operating efficiently. This mandate supports and also extends beyond regional land use and transportation objectives. Section 5.1 (Traffic) of the Application presents the challenges of current traffic levels at the existing Tunnel and the need of the proposed Project to support future traffic growth.</p> <p>Transit is very important to commuters along this corridor. This is the busiest Fraser River road crossing in terms of transit users with more than 10,000 people taking transit on this corridor daily. About 17 per cent of all travellers through the Tunnel today are using transit. The new bridge design includes dedicated transit/HOV lanes to ensure reliable transit service, and as noted above, will be built to accommodate future rapid transit service. A dedicated transit ramp from Highway 99 to Bridgeport Road in Richmond will improve access, safety and reliability for buses destined to Canada Line. Integrated transit stops, including pedestrian and cyclist access, will be built into the Steveston Highway and Highway 17A interchanges.</p> <p>Other (Burns Bog): The Project is close to, but does not touch, Burns Bog. Sensitive vegetation ecosystems are discussed in Section 4.7 (Vegetation) of the Application, which describes the potential influence of the Project on vegetation within the local and regional area. The Project is not anticipated to impact Burns Bog...</p> |
| 8-Aug-16 | Anonymous | - | <p>Here are my concerns:</p> <p>a) I do not see the need for a replacement bridge at all; the existing George Massey Tunnel serves Metro Vancouver well and does not pose a visual impact or migratory mammal impact nor impacts on Burns Bog; the existing tunnel is a tourist attraction and can be used in the Movie Industry as a backdrop. I do not understand the need for the bridge; what is the justification for it?</p> <p>b) A new bridge may confuse migratory birds as a new visual impact and disturb their migratory patterns.</p> | <p>Thank you for your comments on fish and fish habitat, vegetation, terrestrial wildlife, air quality, atmospheric noise, marine use, agricultural use, need for the Project, tolling, tourism, air traffic, and Burns Bog.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a</p> |

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| | | | <p>c) Will the height of the bridge impact on air traffic for the Vancouver International Airport (YVR) or nearby Ladner/Delta Airport?</p> <p>d) Since the new bridge goes over a salmon run route, the construction and debris from the bridge may impact on the salmon run.</p> <p>e) The construction of the bridge with the required use of heavy equipment, steel and concrete will impact Burns Bog detrimentally. Oil, diesel or gasoline spills will pollute the land and waters. Is there a plan to fully remediate or prevent this unacceptable damage to the ecosystem?</p> <p>f) The new bridge has no bedrock with which to hold firm to and the pylon driving on a continuous and consistent basis in order to secure the bridge will create enormous noise at unacceptable decibel levels at all times of the day and night which will impact the sleep patterns of both humans and animals in the area.</p> <p>g) What thought has been given to the natural liquefaction of the soil type in the area? The existing tunnel may float but a new bridge may fall down in an earthquake as there is no bedrock to support the pillars of the new bridge?</p> <p>h) Burns Bog has annual fires. The bog marshland needs to breathe. The bog gives off fresh clean air. Driving pylons and compressing the soil will impact the bog negatively with further negative impact by the additional construction or development afterwards. Will the construction phase exacerbate the fires due to the activity on or around the Bog? What will the Province do to mitigate the impact on the wildlife, salmon and keep the Fraser River clean?</p> <p>i) Will the bridge attract development impacting Burns Bog, land neighbouring on Burns Bog and existing land in the Agricultural Land Reserve (ALR) which may cut the benefits to the environment and lead to a loss of habitat and loss of precious farm land?</p> <p>j) Burns Bog is a sensitive wetland and the Fraser River a unique living river; with the building of a bridge to presumably accommodate supertankers and oil tankers to Vancouver Ports leading to its potential destruction, at worst, and pollution at best?</p> <p>k) What contingency plans has the Province made to avoid and clean up any spill of bitumen, heavy diesel tanker oil, hazardous waste and other types of accidents which will immediately impact fish, wildlife, plants, any species at risk, endangered species (IE Spotted Owl) in the area? Has the Coast Guard been consulted? Have or will any new Coast Guard vessels be added for the increased water traffic and potential for bitumen spills and clean up?</p> <p>l) Who will be bearing the cost for dredging the Fraser River and the ripping out and replacing required utilities and underground infrastructure costs to replace the tunnel with a bridge?</p> <p>m) Per the Supreme Court of Canada recent ruling, has the Province or anyone consulted the First Nations in the area to see if they have any concerns or support this project prior to facing off on another lengthy and expensive Court Appeal or challenge?</p> <p>n) Will the wave "wake" generated by new shipping traffic flood the DEAS ISLAND PARK, Burns Bog or any of the other coastal wetlands? If so, what preventative measures will the Province be taking on this matter?</p> <p>Finally, as this project is a great taxpayer expense, I do not support a toll on the replacement bridge. The money is already coming out of our pockets and residents South of the Fraser do not want to pay for yet another toll. Thank you for your time and please ensure that each of the concerns are carefully thought about and addressed.</p> | <p>net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>.</p> <p>Terrestrial Wildlife: For birds travelling along the Fraser River, replacement of the Tunnel with a bridge will result in a new obstruction, however behavioral observations at the Port Mann bridge show that most birds avoid collisions by flying above or below structures. Appropriate mitigation measures to minimize the attraction of birds, including provision of minimum necessary lighting and flashing navigation safety lighting will be considered in the design of the new bridge. See Section 4.8 (Terrestrial Wildlife) for more details.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Atmospheric Noise: Pile driving will occur during construction of the two bridge towers and the north and south bridge approach support piers and will result in temporary increases in noise. These temporary increases to noise levels during construction will be addressed through the use of best management practice including equipment and activity restrictions to minimize noise emissions, a noise monitoring program, and processes for community consultation, engagement and adaptive management. Please see Section 4.10 (Atmospheric Noise) of the Application for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) for more details.</p> <p>Other (need): Public feedback received over two phases of consultation, conditions at the</p> |

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| | | | | <p>Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> <p>Other (Aboriginal consultation): On March 7th, 2016, EAO issued a Section 11 Order for the Project which outlines the requirements for consultation with Aboriginal Groups identified in Schedule B and Schedule C of the Section 11 Order. The Ministry has, and will continue to consult with Aboriginal Groups in accordance with Section 11 Order issued by EAO. Please see Section 10(Aboriginal Consultation) of the Application for more details.</p> <p>Other (tourism): Highway 99 carries a significant amount of B.C.'s tourism traffic, accessing destinations such as BC Ferries, Vancouver International and Boundary Bay airports, the Canada- U.S. border, and Port of Vancouver's cruise ship terminals. The new bridge will support tourism related travel along the Highway 99 corridor.</p> <p>Other (air traffic): The Ministry has consulted with YVR and Transport Canada on the Project. The height of the new bridge will be designed appropriately for aircraft flight paths at this location and will include lighting for aircraft visibility. The new bridge will be the same height as the Alex Fraser Bridge, and will not impact air traffic.</p> <p>Other (Burns Bog): The Project is close to, but does not touch, Burns Bog. Sensitive vegetation ecosystems are discussed in Section 4.7 (Vegetation) of the Application, which describes the potential influence of the Project on vegetation within the local and regional area. The Project is not anticipated to impact Burns Bog.</p> <p>Other (seismic considerations): The Project has undertaken extensive geotechnical investigations which have confirmed the suitability of a bridge for this location. The new bridge will be built to current seismic standards, greatly improving safety in the event of an earthquake.</p> |
| 9-Aug-16 | Chris Winchester | Maple Ridge | My views on this project: There is nothing wrong with the existing four lane tunnel. There is just not enough tunnel. Forget about this massive footprint of a bridge with the mega price tag. Build a six lane tunnel beside the existing one! Those hard pressed commuters would only have to pay one way on their daily commute. The two extra lanes could serve as rapid transit lanes only. Having two separate tunnels would also give us a way to isolate one tunnel for maintenance without bringing the whole undercrossing to a halt. If there is outside pressure to remove the existing tunnel for some other reason then whoever is putting on this pressure (ie. unwanted | <p>Thank you for your comments on marine use, and rationale for the Project.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other</p> |

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| | | | foreign coal) then they alone should bear the cost of lowering the existing tunnel. There are tunnels around that are just under and just over a hundred years old still in service so I would think that an independent, stand alone assessment would think well of out still young tunnel. The footprint would be much smaller and upsetting to the land users. And save the south of the fraser commuters so much money. This should have been the case for the new port man bridge to! | <p>utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>The Project considered potential tunnel solutions and presented them in the five alternate crossing scenarios as part of Phase 2 Consultation "Exploring the Options" in 2013. Constructing a second tunnel upstream or downstream would have greater impacts on agricultural land, Deas Island Regional Park, ecosystems in the Fraser River, the onshore environment and private property and would be more costly as well as carry significant construction risk. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. The new bridge will be built to current seismic standards, greatly improving safety in the event of an earthquake. Safety will also be improved through wider lanes and road shoulders, facilitating timely emergency response in the event of an incident.</p> |
| 9-Aug-16 | Eric H O'Dell | South Surrey | There is a suspicion that one motive to replace, rather than expand the Massey Tunnel crossing capacity is water depth to accommodate Port of Vancouver to increase large freighter traffic up the Fraser River. This increases potential for direct environmental damage to waterway and fish transit. Port expansion should be at Prince Rupert, a deep port, closer to Asian markets, and with direct rail connection to continental Canada and USA. Tolling the proposed bridge replacement of the Massey Tunnel will increase traffic congestion on the Alex Fraser Bridge which will be the only toll free crossing after the tunnel is replaced and the Pattullo Bridge replaced. Congestion will increase environmental damage. That problem would disappear if all bridges were fairly either toll free or all tolled. In spite of the proposed increased capacity of the Delta to Richmond crossing, there will still be the Vancouver City "parking lot" which starts at the North end of the Oak Street Bridge. Emission savings from removing the current tunnel line-up will only be cancelled at the Oak Street Bridge. Traffic volumes indicate additional capacity at the present tunnel crossing is needed. But is ten lanes the right replacement to minimize environmental stress? | <p>Thank you for your comments on fish and fish habitat, traffic, marine use, and tolling.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Traffic: The Ministry's analysis that confirmed a 10 lane bridge: results in greater safety benefits; provides room for trucks and other slower-moving traffic; facilitates the large volume of traffic entering and exiting the highway at the interchanges on either side of the crossing; allows for continuous dedicated median transit/ HOV lanes between Highway 91 in Delta and Bridgeport Road in Richmond, accommodates for potential future rapid transit and; provides the capacity to handle future population and employment growth projections.</p> <p>The new bridge will alleviate the current queues experienced at the tunnel. During rush</p> |

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| | | | | <p>hours, traffic volumes at the new bridge are expected to increase as some people switch from the congested Alex Fraser Bridge to the new bridge to take advantage of the improved travel times and increased reliability. This result is consistent with the Port Mann Bridge experience.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern.</p> <p>In addition, the Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for transit on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times.</p> <p>See Section 5.1 (Traffic) of the Application for more information.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue. Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |
| 11-Aug-16 | Anonymous | - | This bridge is an environmental travesty, encouraging those who can afford to pay tolls to Liberal-friendly corporations to drive, drive, drive, while depriving low-income and senior citizens who can't afford these extra tolls of their mobility. The increased traffic carried by this blight on the landscape will just pile up farther along the highway. I encourage anyone to go and look at how beautiful this part of the Fraser River over the Massey Tunnel is now, before it is forever blighted by a big, ugly, costly, unnecessary bridge. | <p>Thank you for your comments on visual quality, traffic and tolling.</p> <p>Visual Quality: The new bridge will add noticeable visual features to the landscape and will change visual conditions adjacent to the Project alignment. However, at distances greater than one kilometre, the bridge deck will merge with the natural landscape and the main visual features will be the bridge towers. See Section 5.5 (Visual Quality) of the Application for artist renderings of the bridge concept.</p> <p>Traffic: There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |

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| | | | | <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> |
| 14-Aug-16 | Ros Clark | Vancouver | <p>Multiple concerns: Air pollution/ toxins going into best quality agricultural lands from elevated car/truck route (I have twice lived close to major arteries - car filthy within a day of washing); loss of precious, best quality agricultural lands; increased freighters accessing Port of Vancouver entailing dredging of Fraser, threatening already struggling fish stocks; we don't need anything that big - encouraging huge increase of single passenger vehicles increasing greenhouse gas production, not public transit; eyesore and noise pollution, when compared with the tunnel, in a currently quiet regional park wild area; dumping too much traffic into Richmond, shifting the traffic jam further up the commuter route. In short, No! Not this project!</p> | <p>Thank you for your comments on fish and fish habitat, air quality, atmospheric noise, traffic, marine use, agricultural use, and visual quality.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential effects on fish and fish habitat during construction are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Atmospheric Noise: Current ambient noise levels in the Project area are generally high, dominated by noise from traffic on Highway 99 and connecting roadways. Trains, aircraft, marine and agricultural activities also contribute to ambient noise in and around the Project area. Appropriate mitigation measures will be implemented at select locations to address Project-related change in noise levels during construction. With the application of mitigation, ambient noise levels during operation are expected to be lower than current levels at most locations. Please see Section 4.10 (Atmospheric Noise) of the Application for further information.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta and Metro Vancouver, to identify the improvements noted above that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements</p> |

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| | | | | <p>that have been incorporated in the Project scope.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Marine Use: Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Visual Quality: The new bridge will add noticeable visual features to the landscape and will change visual conditions adjacent to the Project alignment. However, at distances greater than one kilometre, the bridge deck will merge with the natural landscape and the main visual features will be the bridge towers. See Section 5.5 (Visual Quality) of the Application for artist renderings of the bridge concept.</p> |
| 15-Aug-16 | Karl Perrin | Burnaby | <p>Since this bridge is for cars and trucks, it will lead to increased GHGs (greenhouse gases) when compared to other options. If a similar amount of money were spent on rapid transit, buses, and tunnel maintenance in the same region, the net carbon footprint could be decreased. What about moving the Tsawwassen Ferry Terminal to Richmond near the airport? That would greatly decrease the traffic using the tunnel, and make the ferry accessible by the Canada Line. Also, the proposed bridge seems designed to industrialize the Fraser River in Surrey, allowing coal barges, etc. Again, we need to stop thermal coal exports from BC entirely. Why not have a referendum on the bridge included in the May, 2017 provincial election?</p> | <p>Thank you for your comments on air quality, marine use and rationale for the Project.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>In addition, the Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for transit on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future</p> |

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| | | | | <p>rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |
| 16-Aug-16 | Anonymous | Tsawwassen | The bridge is to be designed for light rail, so an eight lane bridge that will accommodate bikes and pedestrian as well as rail should be the end result of all the work being done. The idea of doing nothing is far less appealing and ignores the fact that we are growing very fast as a region. If we are going to be able to function we need the infrastructure to be in place. | <p>Thank you for your comments on traffic.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta and Metro Vancouver, to identify the improvements noted above that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> |
| 17-Aug-16 | Anonymous | Richmond | I fully support this project and have no environmental concerns regarding the overall design | <p>Thank you for your support. The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> |
| 17-Aug-16 | Gary Haylow | Delta | I would like to see a noise monitoring station placed as close as possible to the north of the | Thank you for your comments on atmospheric noise. |

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| | | | existing subdivision (northeast corner of highway 17A and highway 10) to assess the potential influence of the proposed overpass for highway 17A. | <p>Atmospheric Noise: Current ambient noise levels in the Project area are generally high, dominated by noise from traffic on Highway 99 and connecting roadways. Trains, aircraft, marine and agricultural activities also contribute to ambient noise in and around the Project area. Appropriate mitigation measures will be implemented at select locations to address Project-related change in noise levels during construction. With the application of mitigation, ambient noise levels during operation are expected to be lower than current levels at most locations.</p> <p>The levels of traffic noise originating around the Highway 17A interchange and traveling towards the northeast corner of Highway 17A and Ladner Trunk Road will be well below any threshold for concern for noise effects or mitigation. The study area boundary is 500 metres when the intervening surface is largely soft, as it is in this case. The distance from the Highway 17A interchange to the nearest houses in that area is over 1,600 metres.</p> |
| 17-Aug-16 | | | The George Massey Tunnel replacement project has already proposed a future update to include a light rail line for public transit. This needs to be included in today's plan. A rapid bus lane is already out of date and construction has not even begun. Population growth south of the Fraser is increasing daily and Delta - South Surrey needs an alternative to the automobile to protect the environment and our carbon footprint. More busses will not get us out of our cars. The Provincial Government missed their chance to extend the Canada Line out to the ferry terminal once they need to correct that mistake with this project. | <p>Thank you for your comments on traffic.</p> <p>Traffic: The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for transit on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. In addition, the new bridge will be built to accommodate potential future rapid transit.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements noted above that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> |
| 18-Aug-16 | Anonymous | | <p>I was pleased to attend the Open House on August 18 at the Delta Town and Country. I am also pleased that the Environmental Review Process is being conducted in a way that is thorough and transparent.</p> <p>I support the George Massey Tunnel Replacement Project because The George Massey Tunnel is currently one of the worst points of gridlock within the Lower Mainland/Fraser Valley and has limited ability to introduce alternative methods of transportation. The proposed replacement project introduces options for dedicated HOV lanes, bicycling, and buses that will help to alleviate congestion and offer options besides single occupancy vehicles in that area. Once complete, vehicles will no longer sit idling in gridlock trying to make their way, goods and materials will move to market much more efficiently throughout the region, and residents will have better options to move in and out of their community.</p> <p>I commend the designers for their accomplishment of solving a number of issues associated with</p> | <p>Thank you for your support and your comments on traffic.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have</p> |

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| | | | The George Massey Tunnel while keeping the project within the existing corridor. | <p>been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Traffic: The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for transit on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. In addition, the new bridge will be built to accommodate potential future rapid transit.</p> |
| 18-Aug-16 | Anonymous | Ladner | <p>Progress and change is always going to happen. It needs to be done right.</p> <p>I have lived here all my life and have seen the area progress and change. When I was a young mother, the tunnel went in. I thought it would ruin my home and lifestyle. My husband said it would help. He was right. The tunnel allowed me to drive my children to various musical and sports activities, my husband could get home faster from business trips, and I could shop in town.</p> <p>When my children were growing up, the tunnel was big enough. Traffic didn't stop very often. Now, traffic is always stopped. I'm old and don't need to race around anymore but my children and grandchildren are vibrant and don't have time to sit in traffic.</p> <p>How can cars sitting in traffic be good for the environment or people's health? How can people say we don't need to fix this?</p> <p>I went to the open houses, visited the mall office, looked at the information on the website and read the environmental material. The bridge makes sense and represents positive progress and change. It will help lower the amount of car exhaust that goes into the air and my grandchildren's lungs. It will lower my children's stress levels when they don't have to sit in traffic.</p> <p>Don't be scared of progress like I was when the tunnel was built. That progress helped me and my family then. This bridge will help us all now.</p> <p>Let's get on with it.</p> | <p>Thank you for your support and your comments on air quality and human health.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Human Health: As you have noted, Project –related improvements in local and regional air quality, primarily due to reductions in congestion-related idling, are anticipated to have a positive effect on human health. In addition, congestion reduction, improve connectivity and access and improved safety have been shown to have positive effects on reducing stress and improving mental well-being. See Section 7.0 (Human Health) of the Application for more detail.</p> |
| 18-Aug-16 | Anonymous | Surrey | Thanks for the open house. It was informative. I like the 17A crossing with the bus stops. I can get to work better with it. | <p>Thank you for your support and your comments on traffic.</p> <p>Traffic: Transit is very important to commuters along this corridor. This is the busiest Fraser River road crossing in terms of transit users with more than 10,000 people take transit on this corridor daily. About 17 per cent of all travellers through the tunnel today are using transit. Without a new crossing, congestion will continue to build, and transit travel times would suffer. The new bridge design includes dedicated transit/HOV lanes to ensure reliable transit service, and will be built to accommodate future rapid transit</p> |

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| | | | | service. A dedicated transit ramp from Highway 99 to Bridgeport Road in Richmond will improve access, safety and reliability for buses destined to Canada Line. As you have noted, integrated transit stops, including pedestrian and cyclist access, will be built into the Steveston Highway and Highway 17A interchanges. |
| 20-Aug-16 | Anonymous | Surrey | <p>I am completely against the proposal to build a bridge to replace the Massey tunnel. I believe it is irresponsible of our government to consider such a plan. With the "build it and they will come," mentality, building such a bridge will only encourage and accommodate more and more single-use vehicles at a time when we should be working toward a severe decrease in vehicles, including trucks, semi's and the massive trucks (especially those hauling food products from enormous distances south) that now populate our existing roads.</p> <p>Solutions can be found to reduce the need for vehicles; more businesses, organizations and companies can offer employees work-from-home opportunities given how advanced technology is; more food can be grown locally, and even on individual-owned land; better light rail transit (built tomorrow, not in 10 years time!), and so on.</p> | <p>Thank you for your comments on traffic, and the rationale for the Project.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> <p>Improvements for transit on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. In addition, the new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |
| 21-Aug-16 | Rod Douglas | Tsawwassen | <p>It is time to get on with this project. I will not be likely to use the bridge as I am in my 90's. I think you must address the tolling issue.</p> <p>If the toll is too high then drivers will avoid the bridge. Set the toll at a level where as the old adage says " Pluck a few feathers from the pheasant so it feels it but does not squawk too loudly"</p> | <p>Thank you for your support and comments on tolling. .</p> <p>Other (Tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing to ensure the toll will be as affordable as possible for motorists. At this point, the Ministry expects the toll on opening will be comparable to the toll rates on the Port Mann Bridge.</p> |

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| | | | | <p>The Ministry's analysis shows that during rush hours, traffic volumes on the new bridge likely will increase, as some people switch from the congested Alex Fraser Bridge to the new bridge to take advantage of the time savings and increased reliability. That is the experience from other tolled crossings, and is what happened on the Port Mann Bridge.</p> <p>Outside of rush hours, the Ministry anticipates that some people will divert to the Alex Fraser Bridge to avoid paying the toll, while others will use it at all times of the day because of the convenience. This could lead to a reduction in volumes on evenings and weekends on the new bridge.</p> |
| 24-Aug-16 | Anonymous | Richmond | Christy and her friends have given no valid reasons for building this unaffordable project. We need better choices for transportation rather than pollution causing vehicles. The liberal government has a hidden agenda on this project, look out Delta, be careful what you wish for, good bye farmland and have fun stuck at the Oak Street bridge. | <p>Thank you for your comments on air quality, traffic, agricultural use and rationale for the Project.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Traffic: There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |

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| | | | | <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> |
| 24-Aug-16 | Anonymous | Richmond | Wrong location wrong project | <p>Thank you for your comments on the rationale for the Project.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 29-Aug-16 | Susan Ellis | White Rock | The BC government's proposal for a 10-lane bridge is a bad idea. This bridge will increase traffic gridlock and contribute to global warming. It will harm the surrounding farmland and ocean waters. This bridge is being built so US coal and LNG freighters can be accommodated by our ports. It is far better to use the \$3.5 billion to upgrade public transport and invest in alternative energy. A 10-lane bridge is just shows our Government's backward thinking. | <p>Thank you for your comments on air quality, marine use, agricultural use and rationale for the Project.</p> <p>Air Quality: The tunnel is B.C.'s biggest traffic bottleneck, with congestion causing more than one million hours of vehicle idling time each year. It is estimated that tunnel-related congestion causes more than one million hours of idling each year. Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> |

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| | | | | <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): A new 10 lane bridge (eight lanes plus 2 additional lanes for transit/HOV) bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> |
| 6-Sep-16 | Anonymous | | <p>Subject: Comments regarding; The George Massey Tunnel Replacement Project Environmental Assessment. Aug. 29, 2016</p> <ol style="list-style-type: none"> 1. What Consideration was given to the fact that the proposed high level bridge will be built right in the middle of a Ramsar designated Wetland of International Significance? Would this not interfere in the Pacific Flyway? What will be done to offset this hazard? 2. How do you plan to remove the George Massey Tunnel after the new bridge is built, without causing harm to the wetlands? 3. If removing the George Massey Tunnel is included in the bid to build the new bridge, which in turn will accommodate the plan by Port Metro Vancouver to dredge the Fraser River deeper, why then has there not been a requirement for a full hydrological and geological study to be done? 4. Why has there not been a full "Hazard Zone Assessment" done on the storage and shipping of LNG on the Fraser River similar to that used by the Department of Homeland Security / U.S. Coast Guard, that regulates and asses risks to public safety and property? Should we not be as concerned with the present and proposed LNG facilities and tanker routes are close to the new proposed bridge? 5. What considerations have been given in the design of the new bridge that would accommodate higher sea levels or lower water flows on the Fraser River due to climate change? | <p>Thank you for your comments on fish and fish habitat, vegetation, terrestrial wildlife, marine use and effects of the environment.</p> <p>Fish and Fish Habitat, Vegetation and Terrestrial Wildlife: The Ministry understands the Ramsar designation, and the importance of these areas for native and migratory species and unique vegetation. The Project does not intersect the Fraser River Delta Ramsar sites. The Project will be designed, constructed and operated to avoid, minimize, or off-set potential impacts to aquatic and terrestrial vegetation and wildlife in the vicinity of the Project. Aquatic and terrestrial wildlife were assessed as part of the environmental assessment. Please see Section 4.4 (Fish and Fish Habitat) and Section 4.8 (Terrestrial Wildlife) for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project, and the Ministry is unaware of any plans by others to dredge the river deeper.</p> |

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| | | | | <p>Other (Effects of the Environment): As discussed in Section 1.1.7 (Project Design Considerations) of the Application, all new projects being planned and constructed by the Ministry require that engineering and design work evaluate and consider vulnerability associated with future climate change and extreme weather events and to include appropriate adaption measures to mitigate against future consequences over the design life of infrastructure. The Ministry, Provincial Inspector of Dikes, City of Richmond, and Corporation of Delta have agreed on an approach to dike modifications that may be required as a result of the Project. The agreements made between the Project and the respective authorities, describe the approach that will be taken and include localized upgrades that meet current Provincial dike standards and address sea level rise.</p> |
| 12-Sep-16 | Ted Huisman | Richmond | <p>There is a tunnel in the Netherlands, that the Massey Tunnel was designed after, which was twinned a short time ago for a cost of less than \$500 million. Even if two additional tunnels were to be constructed beside the Massey Tunnel, resulting in a total of 12 lanes, the cost would be close to one quarter of the 10 lane bridge. Two lanes could be dedicated to Transit and HOV, two lanes could be dedicated to bicycles and pedestrians, leaving 8 lanes for regular traffic. This would be much more logical, and easier on the taxpayer who is ultimately paying for this Project.</p> <p>I understand that there is a second reason for a bridge instead of a tunnel, which is to deepen the channel so that larger vessels can reach New Westminster. This is bad for a number of reasons. The Fraser is too narrow, with many bends, for larger ships to navigate safely - inevitably there will be an accident causing an environmental catastrophe. There is other existing traffic on the Fraser (pleasure boats, fishing vessels, CN (rail) ferries), which will conflict with the larger ships and risk the lives of the smaller vessel operators. Deepening the Fraser will cause increased salination, causing harm to the salmon and other animals (some endangered) already currently struggling to survive.</p> <p>I am strongly against this proposed bridge.</p> | <p>Thank you for your comments on marine use, and rationale for the Project.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project, and the Ministry is unaware of any plans by others to dredge the river deeper. Any consideration of using larger ships would require the river to be regularly dredged deeper at very significant cost.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. Keeping the Tunnel would require additional rehabilitation and result in ongoing operating costs, and the Tunnel would still not meet current seismic standards. Building a new tunnel to the same seismic standards as the proposed new bridge would cost more, carry significant construction risk and impose greater impacts on agricultural land, park land, the Fraser River and private property. Further, another tunnel beside the existing Tunnel would increase the bottlenecks at the Steveston Highway and Highway 17A interchanges. The replacement of these interchanges, as well as the Westminster Highway interchange, is a significant component of the Project. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 13-Sep-16 | W. Marx | Ladner | <p>The proposed construction of a tolled 10 lane 3.5 billion dollar bridge to replace the current tunnel is not in the best interest of the lower mainland tax payer. Time has shown that government projects have many times run over their estimated budgets. This does not allow for the costly dredging of the Fraser river all the way to new Westminster after the removal of the tunnel to accommodate the passage of larger ocean going vessels.</p> | <p>Thank you for your comments on marine use and rationale for the Project.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South</p> |

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| | | | It would make more sense to upgrade, add to and expand the present government under maintained tunnel to 7 lanes, 6 for traffic and one for light rail public transit which could be extended to South Delta and White Rock in the future. This proposal would shorten construction time and lessen the effect on the environment especially if the deepening of the south Fraser river channel is not allowed to proceed. To allow for an even flow of traffic a common toll should be implemented for all new and old crossings over the south Fraser channel. It would also make sense to replace the aging New Westminster bridge as soon as possible. | <p>Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project, and the Ministry is unaware of any plans by others to dredge the river deeper. Any consideration of using larger ships would require the river to be regularly dredged deeper at very significant cost.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. Keeping the Tunnel would require additional rehabilitation and result in ongoing operating costs, and the Tunnel would still not meet current seismic standards. Building a new tunnel to the same seismic standards as the proposed new bridge would cost more, carry significant construction risk and impose greater impacts on agricultural land, park land, the Fraser River and private property. Further, another tunnel beside the existing Tunnel would increase the bottlenecks at the Steveston Highway and Highway 17A interchanges. The replacement of these interchanges, as well as the Westminster Highway interchange, is a significant component of the Project. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 13-Sep-16 | Anonymous | Vancouver | I support removing the gridlock at the tunnel. Rapid transit would be great too. | <p>Thank you for your comments on traffic and rationale for the Project.</p> <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> |

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| | | | | <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |
| 13-Sep-15 | Anonymous | Richmond | <p>I reviewed the concept model at the sandman hotel open house and discussed my concerns with your representatives.</p> <p>The concept model for the Ladner overpass and public transit bus stop connection, as well as the similar design at the Steveston highway overpass connection, I feel have errors.</p> <p>These concepts have pedestrian paths to the center highway bus stop that twist and wind far too much. People going to these bus stops will be running to catch the bus. They will not be following the winding path to get there, they will jump onto the highway and will risk crossing 4 lanes of traffic to catch the bus. This design as proposed is unrealistic and dangerous.</p> <p>I also feel that putting a pedestrian walkway over the highway is not warranted, that an underpass is better so people don't throw garbage or themselves onto the roadway.</p> <p>To fix this,</p> <p>The pedestrian paths to the center bus stop need to go in a straight line under the highway. For wheelchair access a ramp going up to the bus stop is warranted, but not an elevator. There is not enough foot traffic to warrant an elevator.</p> | <p>Thank you for your comments on design elements of the Highway 17A Interchange and integrated transit stop.</p> <p>Other (design): The reference concept provides a general understanding of what the Highway 17A Interchange and integrated transit stop will include. The integrated transit stops were designed in consultation with TransLink and are as per TransLink specifications. The pedestrian and cyclists pathways in the reference concept were designed using highway engineering and design best practices and in consideration of the location. The Ministry will continue to consult with TransLink, local communities and cycling stakeholders, to further engage with these groups in finalizing pedestrian and cyclists pathways.</p> |
| 13-Sep-16 | Anonymous | Ridhmond | <p>I am not in favour of the bridge, I am also very concerned about the environment.</p> <p>It is stated that 60% of the traffic stays in Richmond - what solid proof is there unless you follow this traffic directly everyday? This is all speculation with the intent of industrializing the river as far as I'm concerned.</p> <p>If the bridge were to go in and tolled - unless the toll is very reasonable - it will put a hardship on the public who must travel back & forth on a daily basis. Just as with the Golden Ears bridge, traffic that won't pay the toll will find other routes and plug that up too.</p> <p>The tolls will only speed up traffic for those who want to pay, but will hurt everyone else. The 3.5 billion price tag is too high a price to swallow.</p> <p>I'm not in favour of this bridge.</p> | <p>Thank you for your comments on traffic and tolling.</p> <p>Traffic: Forecast traffic volumes, both with and without tolling, have been developed based on an extensive multi-year program of data collection, traffic modeling, and independent validation. Section 5.1 (Traffic) of the Application provides a summary of the work undertaken to understand current traffic volumes and patterns. Detailed information of the traffic data collection program for the Project is available on the Project website (www.masseytunnel.ca).</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing to ensure the toll will be as affordable as possible for motorists. At this point, the Ministry expects the toll on opening will be comparable to the toll rates on the Port Mann Bridge.</p> <p>The Ministry's analysis shows that during rush hours, traffic volumes on the new bridge likely will increase, as some people switch from the congested Alex Fraser Bridge to the</p> |

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| | | | | <p>new bridge to take advantage of the time savings and increased reliability. That is the experience from other tolled crossings, and is what happened on the Port Mann Bridge.</p> <p>Outside of rush hours, the Ministry anticipates that some people will divert to the Alex Fraser Bridge to avoid paying the toll, while others will use it at all times of the day because of the convenience. This could lead to a reduction in volumes on evenings and weekends on the new bridge.</p> |
| 13-Sep-16 | Randall Sutton | Vancouver | <p>I believe that this bridge is a vast waste of resources that could be better spent elsewhere. (Like on Translink). This bridge will only encourage sprawl and destruction if the farmland that surrounds Greater Vancouver. Further I believe that the primary motivation for the bridge is to allow dredging of the Fraser which will also be detrimental to the long term health of this region. Please consider other alternatives to this terrible project.</p> | <p>Thank you for your comments on marine use, agricultural use, and rationale for the Project.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project, and the Ministry is unaware of any plans by others to dredge the river deeper.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more</p> |

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| | | | | details. |
| 13-Sep-16 | Anonymous | Surrey | <p>Build a bridge if you want, but in my view it should be equal in driving lanes to the tunnel, but with a couple train and pedestrian/cycling lanes to it, not a behemoth that is visible from every corner of the lower mainland. If it needs to be tolled also, then inexpensive options to cross the river will be severely lacking and slow. Tolling certainly would promote more transit use though-- but only if there is a convenient and speedy system in place on that route.</p> <p>It doesn't make sense to me that anyone would consider another massive and mostly car-oriented bridge. Aren't we trying to move away from so much car-centric travel? That many lanes dedicated to cars doesn't really look like you are.</p> <p>And lose the giant clover interchange. What's with the complicated lanes and interchanges? (I.e. Port Mann bridge has two separated lanes for exits on the other side of the bridge. I use these roughly once per month and still find them incredibly confusing and bewildering.)</p> | <p>Thank you for your comments on the rationale for the Project and tolling.</p> <p>Other (Rationale): A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry's analysis that confirmed a 10 lane bridge: results in greater safety benefits; provides room for trucks and other slower-moving traffic; facilitates the large volume of traffic entering and exiting the highway at the interchanges on either side of the crossing; allows for continuous dedicated median transit/ HOV lanes between Highway 91 in Delta and Bridgeport Road in Richmond, accommodates for potential future rapid transit and; provides the capacity to handle future population and employment growth projections. The Project has been developed in consideration of national, provincial, regional and local transportation needs as well as local and regional land use plans.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for transit on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing to ensure the toll will be as affordable as possible for motorists. At this point, the Ministry expects the toll on opening will be comparable to the toll rates on the Port Mann Bridge.</p> <p>The Ministry's analysis shows that during rush hours, traffic volumes on the new bridge likely will increase, as some people switch from the congested Alex Fraser Bridge to the new bridge to take advantage of the time savings and increased reliability. That is the experience from other tolled crossings, and is what happened on the Port Mann Bridge.</p> <p>Outside of rush hours, the Ministry anticipates that some people will divert to the Alex Fraser Bridge to avoid paying the toll, while others will use it at all times of the day because of the convenience. This could lead to a reduction in volumes on evenings and weekends on the new bridge.</p> |
| 14-Sep-16 | Anonymous | Richmond | <p>It looks like this massive project will not relieve congestion and resulting emissions, but only move those problems to the Oak Bridge approach. Before investing in such a costly project with its uncertain economic and environment impacts, I recommend beginning with transit improvements, including reinstating the suburban buses that provided direct service to Vancouver from Surrey, Delta, and Richmond</p> | <p>Thank you for your comments on air quality and traffic.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions,</p> |

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| | | | | <p>seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details</p> |
| 14-Sep-16 | Anonymous | Vancouver | <p>Following on from the money-losing Port Mann bridge replacement, the Province of BC has decided to pursue the same misguided course of action with the Massey Tunnel replacement. Rather than look seriously at providing residents of Delta/Ladner/South Surrey/White Rock with a viable, rapid, public-transit option that would cut down heavily on tunnel traffic (of which there are countless examples in Europe and Asia), the Province and the Ministry of Transportation are stuck in the 1950s. This new bridge will be a money-loser, and will simply move the traffic problem to other points along Highway 99, Highway 91, and other parts of the transportation network. This isn't solving the problem of transportation and traffic congestion in Metro Vancouver, it's simply wasting billions of taxpayer dollars under the mistaken guise of "doing something".</p> <p>The Province of BC and the Ministry of Transportation should be ashamed of this plan and the blinkered thinking behind it.</p> | <p>Thank you for your comments regarding traffic and the rationale for the Project.</p> <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future</p> |

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| | | | | <p>population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 14-Sep-16 | Anonymous | | Please toll all existing projects first before moving forward. We need to invest in rapid transit first, not as an afterthought. This project should be put on the back-burner until there is 1) Skytrain on Broadway 2) Skytrain to Langley 3) Lightrail options to fill in gaps, especially out to areas most served by this bridge such as Ladner and South Surrey. | <p>Thank you for your comments on rationale of the Project and tolling.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |

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| | | | | <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |
| 14-Sep-16 | Judith & Bill Moffatt | Richmond | <p>We know that there is no simple solutions or one answer to the traffic problems in south Richmond focused on the George Massey Tunnel. The birth of this problem and other Greater Vancouver traffic congestion focal points stem from a decades old decision. Unlike other cities, Seattle for instance, it was decided that no freeways would pass through Vancouver. This was a neighbourhood friendly, esthetic and lifestyle decision; but given the natural constrictions of rivers, ocean, inlets and mountains probably one that would eventually come to grief. If traffic could not be greatly restricted to public transport then as the region grew, vast numbers of private and commercial vehicles would automatically be compressed as they left the outlying freeways to exit onto Vancouver, Burnaby and New Westminster city streets. That time has long passed and therefore we need a fully integrated solution and not one that puts band-aids on individual sore points.</p> <p>- we know that the tunnel has to be upgraded/replaced/twinning, but the bridge proposal will only move the congestion a few kilometres north to the foot of Oak Street. The proposed bridge and freeway interchanges will become a vast parking lot once the traffic meets the streets of Ladner, Richmond and Vancouver.</p> <p>- the proposed transit ramp to the Bridgeport Station will be another point of gridlock. The Canada Line has been heavily used since its opening. The limits imposed by a two train-car platform and the high-rise apartment growth in Richmond will severely restrict additional passenger usage.</p> <p>- the new bridge will be tolled and we know from the experience up the valley that revenues will not meet expectations as vehicle users look for new routes to avoid the tolls, thus causing congestion at other points. This toll will also restrict visits to family and friends and increase already expensive ferry rides to the Gulf and Vancouver Islands.</p> <p>We have heard a lot of rhetoric about getting people out of their cars and using public transportation. This project will not only not accomplish this goal but will encourage exactly what you say you are trying to discourage; and most vehicles will only have one occupant. On our travels around the world we have taken note of many combinations of solutions but you will have to be bold and plan and spend for the future.</p> | <p>Thank you for your comments on traffic, and tolling.</p> <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to</p> |

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| | | | <p>- place a minimum toll on all bridges so as to share the costs amongst the whole region. No one would be overly burdened and commuters could not avoid tolls and create new congestion points. We all share, use and enjoy this magnificent area so all should pay equally.</p> <p>- place minimum tolls on the freeways for the same reasons. Make a readable windshield decal mandatory(tourists exempt) and have an automatic bank debit system so minimum billings(at a higher rate to cover processing). If people move out of the core area for lifestyle or home purchase choices then they should have to pay their fair share.</p> <p>- commuter trains and light-rail and trams across the flats of Richmond and beyond to Steveston, Ladner and Tsawwassen.</p> <p>It won't be inexpensive but lets do it right all as one integrated, planned and correct solution rather than piecemeal at the whims of changing governments and politicians. You are dealing with an area from the US Border to Squamish and from Vancouver Island(ferry traffic) to at least Chiliwack. Broaden your horizons, don't simply have TUNNEL VISION.</p> | <p>or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>The Ministry's analysis shows that during rush hours, traffic volumes on the new bridge likely will increase, as some people switch from the congested Alex Fraser Bridge to the new bridge to take advantage of the time savings and increased reliability. That is the experience from other tolled crossings, and is what happened on the Port Mann Bridge.</p> <p>Outside of rush hours, the Ministry anticipates that some people will divert to the Alex Fraser Bridge to avoid paying the toll, while others will use it at all times of the day because of the convenience. This could lead to a reduction in volumes on evenings and weekends on the new bridge.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |
| 14-Sep-16 | Anonymous | Tsawwassen | <p>As a homeowner in Delta my family and I have watched traffic volumes and Massey tunnel gridlock grow to ridiculous levels. Both of my sons graduated from S.F.U. and used the tunnel daily for five years plus enduring crazy traffic bottlenecks. If you think bus transit was an option you would add 21/2 hours to the daily commute, so driving was the only reasonable option. To put the project into perspective I consider 3 levels of public interest.</p> <p>1) Local: Most residents in this community just roll their eyes when the "tunnel" is mentioned and feel a bridge is a decade overdue. When visiting family in North Vancouver we all consider time of day as well as which day to help ease tunnel delays. The same considerations come in to play when booking medical appointments in Vancouver-- usually not possible to avoid busy periods. Shopping in Richmond and Vancouver brings up the same concerns including the short timelines before counterflow traffic is in effect in the tunnel. I don't cherish the thought of traffic travelling at 90 K.P.H. in opposing lanes 3 feet apart in a tunnel. When accidents happen in the tunnel Emergency vehicles must navigate a nightmare to reach the scene, creating tremendous delays and traffic gridlock.</p> <p>2) Regional: The Lower Mainland continues to grow from White Rock to Squamish to Abbotsford and everyone needs to be able to be employed, attend school and higher education, access regional infrastructure, transport food, goods and services and do so in a timely and efficient manner. The new malls at Tsawwassen will increase peak traffic volumes up to 7000 cars per hour. A tunnel replacement is long overdue.</p> <p>3) National: Resource extraction, transportation and shipping are huge priorities that need improved infrastructure. This proposed bridge will significantly improve access for everyone from the U.S. border, Lower Mainland and up to the Sunshine Coast & Whistler/Blackcomb. We all need this bridge to be built without delay. Thank you for your time and the opportunity to share my thoughts and comments with us all.</p> | <p>Thank you for your support and comments on the rationale for the Project.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. As you have noted, the crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |
| 14-Sep-16 | Anonymous | - | <p>All my concerns have been addressed. All comments I would make are positive. This project addresses the concern of suburban residents perfectly. Great plan. Nice project.</p> | <p>Thank you for your support. The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The</p> |

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| | | | | proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island. |
| 14-Sep-16 | Anonymous | Ladner | <p>I completely support this project. At my age (87 Years) it is unlikely to affect me very much during my lifetime, but I consider it very important for the development of this area and important to my children and grandchildren.</p> <p>I am not persuaded by the arguments some people present against the project.</p> | Thank you for your support. The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island. |
| 14-Sep-16 | Anonymous | Ladner | The bridge project seems fine to me. I hope that the public transport component will give South Delta plenty of use of the bridge. | <p>Thank you for your support and comments on traffic.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Traffic: The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> |
| 14-Sep-16 | Anonymous | Vancouver | This current replacement plan is ridiculous. By expanding the amount of traffic that can pass over | Thank you for your comments on traffic. |

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| | | | <p>this river it will only shift the congestion problem further down the street (I.e. Richmond). Private vehicle congestion is not the worst issue here. Spending billions to move a problem elsewhere is an issue.</p> <p>Invest heavily in transit and create designated lanes to make it an attractive option on this route. More private vehicle lanes is not the answer. Alternative modes of transportation are, and will help reduce congestion for our important trucking industry.</p> | <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>As discussed in Section 5.1 (Traffic) of the Application, the Project will offer improved community connections across the Highway 99 corridor while helping to reduce congestion on adjacent municipal streets, which can provide future benefits to local area social and economic values. Since the Tunnel is currently significantly congested during peak periods in both directions, this leads to further delays along the local road network for Tunnel-bound traffic. The Project will eliminate congestion delays and idling at the Tunnel upon opening of the new bridge in 2022. The additional traffic capacity along the Highway 99 corridor is expected to attract traffic currently using same-direction local roads (e.g. Sidaway/No.5/No.6 Roads in Richmond), and also to benefit cross-highway traffic at currently congested intersections and interchanges such as the Steveston Highway interchange. The addition of the Rice Mill Road connection will help to relieve congestion at No. 5 Road and Steveston Highway.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |
| 15-Sep-16 | Ken Dolphin | New Westminster | <p>With the relatively recent work done on the tunnel so that it will last another 50 years, why not put in a rapid transit tunnel, so that people from Tsawwassen and Ladner and the ferry could get to the rest of the transit system without being stuck in automobile traffic. It would be hoped, after all, that we are trying to reduce the number of cars on our roads. I think that automobile traffic from White Rock could be lessened with rapid transit to Surrey Central. Above all else, I am very</p> | <p>Thank you for your comments on traffic, marine use and the rationale for the Project.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special</p> |

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| | | | much against any solution which would then allow coal and/or LNG to be transported from further upstream. | <p>generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. While seismic upgrades were previously completed on the Tunnel enabling it to withstand smaller earthquakes, the overall seismic resistance of the Tunnel is still far below current standards due to underlying ground issues. In addition, the Tunnel has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |
| 15-Sep-16 | Ken Dolphin | New Westminster | Having seen the presentation, at an open house, yesterday. And having heard from a number of detractors, I am wondering about the following things. 1. Was the old tunnel recently given a new life span that will be good for another 50 years? Would traffic not be better served by a rapid transit tunnel to take care of people living in Ladner and Tsawwassen and also people who are using the ferry terminal but who do not want to use their own automobile? 2. While the presentation said no, I would like to express my view that I would not support any plan that would bring the shipping of coal, oil, or LNG upriver. | <p>Thank you for your comments on traffic, marine use and the rationale for the Project.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day</p> |

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| | | | | <p>include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. While seismic upgrades were previously completed on the Tunnel enabling it to withstand smaller earthquakes, the overall seismic resistance of the Tunnel is still far below current standards due to underlying ground issues. In addition, the Tunnel has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance</p> |
| 15-Sep-16 | Anonymous | - | I am against any solution which would allow shipping of coal, oil, or LNG from further upriver. | <p>Thank you for your comments on marine use.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> |
| 15-Sep-16 | Anonymous | - | Since the BC government is supposedly trying to cut down on automobile traffic into Vancouver, wouldn't we be better served by a rapid transit tunnel to serve riders from Ladner, Tsawwassen, and the ferry terminal? | <p>Thank you for your comments on the rationale for the Project.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of</p> |

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| | | | | <p>Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> |
| 15-Sep-16 | Anonymous | Richmond | <p>The bridge project is ill-conceived for our future. Our future needs to include more public transportation, rapid transit or useful transportation that will ease traffic, not make it worse! This bridge will only work to ensure even more traffic flowing onto already congested roads. And instead of getting people out of their cars, it will encourage the SOV problem that already exists in the valley. This project does not address environmental concerns of air quality, destruction of farmland, or the massive use of resources to build a bridge that essentially goes 'nowhere' (or into already existing traffic congestion). This reminds me of 'make work' projects that exist in countries like China, that are essentially useless to the masses. Please do not approve this project and instead work on rapid transit and getting people out of their cars and onto transit. Think of our shared future. Think of the environmental impact of what is essentially pushing more cars into already crowded, polluted corridors.</p> | <p>Thank you for your comments on air quality, traffic, agricultural use and rationale for the Project.</p> <p>Air Quality: The tunnel is B.C.'s biggest traffic bottleneck, with congestion causing more than one million hours of vehicle idling time each year. It is estimated that tunnel-related congestion causes more than one million hours of idling each year. Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |

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| | | | | <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |
| 15-Sep-16 | Harm Jacob Woldring | New Westminster | This is a colossal waste of taxpayers money. ALL this money should be spent on Rapid Transit upgrades. At the very least this bridge should allow for conversion of lanes to Rapid Transit in future. Let's not repeat the idiocy of the Port Mann and Golden Ears. Fewer lanes for mostly empty cars and more public transit options! This bridge definitely should NOT be built till a region wide tolling system is in place. It's time to FORCE people out of cars and onto more public transit. | <p>Thank you for your comments on traffic and tolling.</p> <p>Traffic: A new 10 lane bridge (eight lanes plus two transit/ HOV lanes) bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> |

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| | | | | Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens. |
| 15-Sep-16 | Anonymous | Delta | <p>I attended the EAO review of the Massey Tunnel Replacement Project last evening. I was disappointed that there was no one available to give me clear information on the effects of a large earthquake resulting in liquefaction of soils and their effect on the two towers on either side of the river and the other pillars supporting the roadway before the bridge is reached. All I was offered was a hand-waving explanation that this bridge would be as safe as the Alex Fraser bridge, even though I understand bedrock is much more superficial at the Alex Fraser location than it is at this location. Thus liquefaction should be more of a concern with this project.</p> <p>Because of the great depths that piles will have to be driven right at the water's edge, I didn't see any displays of how the noise and vibration of the extensive pile driving that will be required would have on migrating fish, marine mammals and adjacent residents and business employees.</p> | <p>Thank you for your comments on underwater and atmospheric noise and seismic considerations.</p> <p>Underwater Noise: Construction activities that have the potential to general underwater noise will adhere to standard industry practices which set appropriate sound thresholds for the protection of fish and marine mammals. Underwater noise monitoring will be conducted during activities that have the potential to general underwater sound levels in exceedance of thresholds. If a threshold is exceeded during a noise-generating activity, the activity will cease until additional mitigation measures are implemented. Potential underwater noise generated by work occurring at the water's edge were assessed in Sections 4.3 (Underwater Noise), 4.4 (Fish and Fish Habitat) and 4.6 (Marine Mammals) of the Application.</p> <p>Atmospheric Noise: Pile driving will occur during construction of the two bridge towers and the north and south bridge approach support piers. Temporary increases to noise levels during construction will be addressed through the use of best management practice including equipment and activity restrictions to minimize noise emissions, a noise monitoring program, and processes for community consultation, engagement and adaptive management. Please see Section 4.10 (Atmospheric Noise) of the Application for more details.</p> <p>Other (seismic): The Tunnel does not meet current seismic standards. The new bridge, which will be built to current standards, and will serve as a lifeline structure in the event of a significant seismic event. The Project has undertaken extensive geotechnical investigations which have confirmed the suitability of a bridge for this location. Details are available on the Project website (www.masseytunnel.ca)</p> |
| 16-Sep-16 | Anonymous | Delta | I am in favour of the new bridge. To replace the existing tunnel would impact far more land than the bridge. I am happy that the BC Government is thinking ahead at least 50 years not the usual 5-10 year spans as quick fixes. I also think the new bridge will be healthier for the users and the environment. I have a concern about the access routes on and off the bridge and hopefully these will be well planned without cutting into productive agricultural land. To sum it all up I favour the new bridge. Cheers. | <p>Thank you for your support and comments on agricultural use.</p> <p>Agricultural Use: The Ministry recognizes the importance of agriculture in the region and the Project area. Minimizing impacts to agricultural land has been a key goal since the onset of the Project and protecting agricultural land was one of the key factors in determining a new bridge as the preferred crossing scenario. The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> |
| 16-Sep-16 | Sham Dhari | Richmond | The building of this this bridge to replace the Massey tunnel is not necessary and a total waste of tax payers money. True there is traffic congestion at the tunnel during rush periods. I believe that by adding an additional tunnel will increase the traffic handling capacity for at least the next 20 years and the cost of additional tunnel will far less than the 10 lane bridge. | <p>Thank you for your comments on the rationale for the Project.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already</p> |

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| | | | <p>As the technology advances, and with arrival of self driving cars and transport vehicles the traffic handling capacity of the highways will increase significantly and thus these bridges will be under utilized.</p> <p>It is best to add another tunnel and use the saved money to fund rapid transit.</p> | <p>unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>The Project considered potential tunnel solutions and presented them in the five alternate crossing scenarios as part of Phase 2 Consultation “Exploring the Options” in 2013. Constructing a second tunnel upstream or downstream would have greater impacts on agricultural land, Deas Island Regional Park, ecosystems in the Fraser River, the onshore environment and private property and would be more costly as well as carry significant construction risk.</p> <p>A new 10 lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the transit improvements that have been incorporated in the Project scope.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for on opening day, including dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> |
| 19-Sep-16 | Marian Leighton | BC | <p>To remove the Massey Tunnel and replace it with a 10 lane bridge is a terrible idea. Not only will it increase traffic thus keeping people in cars rather than increasing rapid transit now (yes, there is a possibility of light rail in the future but that is not now!). Not only that but the tunnel is not deemed unsafe and in fact has many years left. If the new bridge is in fact a way to bring bigger tankers in to the Fraser for coal and Panamax tankers, then again the government is failing us yet again in actually making real efforts to combat climate change. I was visiting friends on the Fraser yesterday who look out from east Steveston onto what could be a non stop parade of tankers and this would be a mockery of what BC citizens actually want which is change in climate change goals and not more coal and tankers in the Fraser which could endanger not just humans but animals and farmland. The entire US coast has ejected its ports for US thermal coal yes Fraser Surrey Docks have been given a free light by the Vancouver Port Authority who is made up entirely of industry and political employees. Time to end the hypocrisy of this government.</p> | <p>Thank you for your comments on traffic and marine use.</p> <p>Traffic: Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.’s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |

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| | | | | <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the transit improvements that have been incorporated in the Project scope.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements for on opening day, including dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> |
| 20-Sep-16 | Don Sherritt | Delta | <p>The Sept 14th open house was helpfully informative.</p> <p>As a 43 year resident of Delta I am a frequent tunnel traveler, probably 600+ one way trips a year. A change is required. The south of the Fraser's population let alone predicted growth, commerce with the USA and through Roberts Bank and the age of the Massey tunnel are compelling arguments. Perhaps the bridge will incorporate the future possibility of digital highways.</p> <p>I expect if we were planning to replace the existing tunnel with a new tunnel similar objections would be raised. Cost, it is important that all objections are considered. One being - traffic tie up will move to Oak Street Bridge - 99 N in the morning will be a parking lot. (Richmond's Mayor Brodie on CBC).</p> <p>99 S is a parking lot in the morning and evening rush hours, And 99 N is already a morning and evening parking lot - south of the tunnel. Four 'parking lot' instances will be relieved, one may be added.</p> <p>Morning traffic into Vancouver has options (btw, I was surprised to learn only 40% of traffic continues into Vancouver) not the least being the Canada Line. Access from 99 N to the Line should be improved. The travel time from 99 N to Bridgeport is inefficient.</p> <p>Presumably the new bridge will have a toll. My preference is for a Lower Mainland toll of all crossings. Also, as a frequent user, I suggest consideration be given to a monthly or annual pass.</p> <p>I'm a big supporter of this improvement to our transportation infrastructure.</p> | <p>Thank you for your support and comments on traffic, the rationale for the Project, and tolling.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new</p> |

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| | | | | <p>bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>The Ministry is developing an Intelligent Transportation System Strategy for the Highway 99 corridor as part of the Project scope. Proposed infrastructure includes a fibre optic network connecting the highway to the Regional Transportation Management Centre, cameras providing coverage of the highway, vehicle detection sensors, changeable message signs and additional infrastructure to allow for expansion of the system as new technologies come into use.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |
| 21-Sep-16 | Daphne Hebb Hodgins | Delta | I visited the public information session at the T&C in September. I was impressed with the thorough EA that has been undertaken, and appreciated the clear and informative displays. I am fully in favour of this project and I look forward to the completion of the bridge. thank you. | <p>Thank you for your support. The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> |

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| 21-Sep-16 | Don Chapman | South Surrey | <p>I am completely opposed to the proposed tunnel project:</p> <ol style="list-style-type: none"> 1. It is too expensive 2. It will only serve to move the bottleneck for traffic further into the city, just as the new Port Mann bridge has done 3. In concept, it is old-fashioned, giving priority to the notion that the future in transportation will continue to be about moving single passenger vehicles 4. Provisions for improved rapid transit are back-end loaded into the concept, rather than front-end priorities 5. I am in support of tolling all bridges at a lower general level, or perhaps road pricing <p>We would be much better served by spending the equivalent funds in increasing rapid transit and perhaps some sort of inter-modal system for goods to reduce the numbers of vehicles (including large trucks) using the current tunnel. While the bus service from South Surrey is pretty decent at the moment, it certainly could be improved in equipment and frequency, so as to make it an even more attractive alternative until usage justifies the extension of services similar to the West Coast Express north of the Fraser.</p> <p>The proposed project is simply old fashioned and not at all mindful of the idea of modernizing mass transit.</p> <p>It is not clear to me why this project had a government green light with no referendum, when the same government demands that any plan to increase rapid transit funding requires a referendum.</p> | <p>Thank you for your comments on traffic, rationale for the Project, and tolling.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. 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The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |

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| 22-Sep-16 | L. Latremouille | Delta | <p>On a beautiful summer day a couple years ago I launched my kayak off Deas Island Park into the Fraser. The river was serenely calm. I started paddling down river and soon I was feeling a very strong vibration on the base of my kayak, it was alarming. At first I wondered if there was a leak in my kayak, but no, all was dry. The vibrations were getting stronger and then I wondered if an earthquake was happening. Then it went away. On the paddle back, there it was again. That's when I realised it was caused by the traffic below, in the tunnel.</p> <p>I wonder how those vibrations have affected the fish migrations and other water life over the years. It must be like having to swim through rock concert.</p> <p>So mostly for the marine life, I am in favour of replacing the tunnel with a bridge. Other reasons to be in favour include traffic congestion, traffic safety and the coming to an end of the tunnel being economically viable to maintain.</p> <p>On another note – not to do with the environment... What I am strongly against are tolls. We pay extraordinarily high taxes here in BC, garnered from so many sources, that it is a failing on the part of our government that they can't and haven't fully budgeted for bridges needed to be built or replaced.</p> <p>Have other funding models been considered? I would be fully supportive of bridges being "sponsored" by corporations. These days it seems that instead of our government having money to spare and spend, major corporations do.</p> <p>Case in point – I was watching the news on TV this past March. They just finished a sensational story on the bridge and the new estimated cost of over \$3 billion. The next story was of Shaw purchasing Wind Mobile for \$1.6 billion.</p> <p>Why not market sponsorship of bridges? I'd be happy to drive over the Telus, Shaw, Pattison, or whoever bridge. Bridges are constantly being referred to, corporations would be paid back in recognition and the kind of advertising you can't buy...</p> | <p>Thank you for your comments on underwater noise, rationale for the Project, tolling and naming on infrastructure.</p> <p>Underwater Noise: Potential effects on underwater noise as a result of the Project were studied as part of the assessment. Baseline underwater noise levels was measured using an Autonomous Multichannel Acoustic Recorder (hydrophone recorder) in the Fraser River South Arm channel and in Deas Slough. The Project area is highly developed and existing underwater noise levels in the Fraser River are relatively high. Underwater noise levels in the Project area are dominated by noise from vessels transiting the river. Results of baseline data collection are included in Section 4.3 (Underwater Noise) of the Application.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>Other (Tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Other (naming of infrastructure): The new bridge will be a significant addition to the Lower Mainland's landscape. The Ministry's <i>Highway and Structure Naming Guidelines</i> suggest major highways and structures should be named in relation to their geographic location. In some circumstances, a name with historical references, or a name of an individual or group is selected (i.e. Ironworkers' Memorial Bridge). The Ministry does not solicit corporate sponsorship for infrastructure.</p> |
| 22-Sep-16 | WesPacMidstream | Vancouver | <p>WesPac Midstream – Vancouver is strongly in support of the George Massey Tunnel replacement project. The current situation with the tunnel is plagued with delays, both for citizens on their daily commutes as well as business trying to move goods throughout the Lower Mainland. All of us are dependent upon commerce to some degree for supporting the economic quality of life for our families. Making the link between Delta and the rest of greater Vancouver more smoothly flowing and predictable will support our businesses and, by extension, our communities.</p> <p>WesPac will derive no direct benefit from the replacement of the tunnel (our marine jetty project currently under development is able to utilize the Fraser River dimensions as they currently exist). However, as a corporate citizen, we see the benefits of reduced air pollution from the reduction in vehicles waiting to cross the river, the addition of bike routes across the Fraser, and additional transit and HOV access lanes as an important benefit for us all. This is an important and forward-thinking development for BC, and we whole-heartedly support it.</p> | <p>Thank you for your support and comments on air quality and traffic. The Ministry appreciates your confirmation that WesPac will be utilizing the Fraser River dimensions as they currently exist.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. A new bridge was determined to be preferable in serving the needs of all user groups, including transit users</p> |

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| | | | | <p>given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> |
| 23-Sep-16 | Larry Colero | South Delta | <p>I live in Tsawwassen and commuted into downtown Vancouver from Ladner for 25 years, almost entirely by bus. Bus is still the most time-efficient way to get across the river, and will continue to be even if a bridge is built to replace the tunnel. So why is the BC government determined to build a bridge primarily for trucks and Single Occupancy Vehicles? (The current HOV lanes are already very effective for multiple car passengers.) I realize some people will always have to drive, but does encouraging people to commute alone in their cars really help air quality? Of course not. We should be building something designed to include a new rapid transit line, not encouraging Single Occupancy Vehicles.</p> <p>I attended the Open House in Delta on Aug. 17, 2016. This was not a public consultation - it was a public promotion of a concept already decided upon, with no consideration whatsoever of any alternatives. There was no information on the pros and cons of adding an additional tunnel or two. No cost/benefit analysis of the bridge compared to other options. No useful information on it's adverse impacts, of which there would be many - social, environmental, and without a doubt, fiscal. There was, however, lots of advertisement of the mitigation measures to make it look like the impacts of the proposed bridge will be acceptable.</p> <p>I can see the advantages of the elevated interchanges at Ladner and Steveston, but those two interchanges are really separate projects that need to be considered on their own merits. Their benefits do not justify a 3.5 billion dollar toll bridge.</p> <p>The claims made about the bridge improving air quality and safety are specious, if not deceptive. There will be more idling cars, only they will be idling further north in a more populated area. The claims of improved human safety are ridiculous if we consider the bigger picture of living in an earthquake zone and the proposed bridge being built over land subject to liquefaction should there be a major tremor. In an earthquake, I would much prefer to be using the Massey Tunnel, with its current safeguards and ground-level approach and exit, rather than be suspended way up in the air as the bridge foundations shift under me and my loved ones.</p> <p>Do not build this bridge. Anyone who supports it is not thinking it through, and not taking a long-term view. The bridge is only a vanity project with a cost that will haunt British Columbians for generations. It would be far less expensive to build two more tunnels and free up funds to support both public transit in Metro Vancouver and transit improvements in other communities across the province.</p> | <p>Thank you for your comments on air quality, traffic, rationale for the Project, seismic considerations, and the public consultation process for the Project.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>The various components of the Project work together to form one solution. Building the interchanges without the new bridge is not a long term or workable solution to the issue of congestion.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |

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| | | | | <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. Building a new tunnel to the same seismic standards as the proposed new bridge would cost more and carry greater construction risk as well as impose greater impacts on agricultural land, park land, the Fraser River and private property.</p> <p>Other (seismic): As noted above, the Tunnel does not meet current seismic standards. The Project has undertaken extensive geotechnical investigations which have confirmed the suitability of a bridge for this location. The new bridge will be built to current seismic standards, greatly improving safety in the event of an earthquake.</p> <p>Other (Public Consultation): Public consultation and public feedback plays an important role throughout the environmental assessment process. The Public Consultation Plan summarizes the public and stakeholder consultation and engagement activities for the Project to fulfill EAO's public consultation requirements as per the Section 11 Order under the B.C. EAA and is available on EAO's website. The Ministry submitted its Application to obtain an Environmental Assessment Certificate on July 27, 2016. EAO set a 60 day period for the submission of comments by the public from August 3, 2016 to October 3, 2016. EAO also hosted three Open Houses in August and September to provide the public and stakeholders with the opportunity to ask questions regarding the Application. This was separate from the three phases of public consultation that the Ministry held from 2012 through 2016. See Section 11 (Public Consultation) of the Application for more details.</p> |
| 24-Sep-16 | Anonymous | Delta | <p>Dear Sirs: I am dead set against a 10 lane bridge, especially if it is going to cost \$3.5 B!! 5 lanes North bound-some traffic to Steveston, some to Westminster Highway, some to Bridgeport, and most to the Oak Street Bridge.</p> <p>We do need a new crossing but I feel a new tunnel would be a better option. If the Port of Vancouver needs a deeper channel, then THEY should pay for most of a bridge, not the public with tolls. I go north through the tunnel on different days at 17:00 hours, so I know how congested the tunnel becomes. I also know how congested the Oak Street bridge is too at this time, which will not be alleviated with a new bridge.</p> <p>If a new bridge has to be built, it MUST have mass transit provisions built-in, and I would prefer that the power cables are still run under the water, where their electro-magnetic influences would be minimized. If there is going to be a toll, it should be only \$1.00 each way. If you tolled all crossings at \$1.00, then I am sure the Province would make enough money to cover all expenses.</p> | <p>Thank you for your comments on traffic, marine use, rationale for the Project, relocation of BC Hydro utilities and tolling.</p> <p>Traffic: The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while</p> |

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| | | | <p>In short - a new tunnel instead of a bridge.</p> <ul style="list-style-type: none"> - a minimal toll (\$1.00), if needed. - buried power cables. <p>Thank you for the opportunity to voice my opinions.</p> | <p>also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (BC Hydro utilities): The transmission line relocation project is under the purview of BC Hydro. BC Hydro has confirmed that an overhead transmission line crossing the</p> |

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| | | | | <p>Fraser River will replace the transmission line that currently runs through the Tunnel. More information about this relocation can be found on BC Hydro's website at https://www.bchydro.net/energy-in-bc/projects/gmtt.html.</p> <p>Other (Tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |
| 27-Sep-16 | Ryle | Richmond | <p>My main concern with building a new bridge is that it would promote continued fossil fuel burning vehicles and probably increase this dependency.</p> <p>However, I am encouraged that a proposed rail line is being integrated into the design, as well as bicycle lanes.</p> <p>My suggestion is that electric vehicles be allowed to cross this bridge toll free in a permanent basis. This would make for a strong incentive that if it is absolutely necessary to own a vehicle that it would be replaced by a clean energy vehicle.</p> <p>As well, electric bicycle lanes should be integrated and encouraged.</p> <p>In my opinion, for the foreseeable future the revenue from a carbon tax as well as implementing a carbon vehicle tax along with a carbon vehicle toll would be able to sufficiently meet the debt incurred on the bridge</p> <p>If there is a major switch to electric vehicles because of carbon taxes and toll this would be an ideal problem to have.</p> <p>Thank-you</p> | <p>Thank you for your comments on air quality, traffic and tolling.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> <p>Drivers of eligible electric vehicles can travel all of the Province's HOV lanes regardless of occupancy requirements. HOV lanes will be open for use by battery-electric or plug-in hybrid electric vehicles. Electric bicycles will be able to use the toll free multi-use pathways on either side of the bridge.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue. Tolling the new bridge will also help to support the Regional Growth Strategy's vision of compact communities, shorter travel distances and less car traffic.</p> |
| 27-Sep-16 | Vancouver Airport Authority | Richmond | Please see separate incoming letter. | Please see separate response letter. |
| 27-Sept-16 | Anonymous | White Rock | I wholeheartedly agree with what Judith & Bill Moffatt had to say about the whole situation. I would only add White Rock and South Surrey to the following sentence: | Thank you for your comments on traffic. |

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| | | | <p>- commuter trains and light-rail and trams across the flats of Richmond and beyond to Steveston, Ladner and Tsawwassen.</p> <p>We have to get away from unsustainable practices and finally start to do things differently.</p> | <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> |
| 28-Sept-16 | Anonymous | Delta | <p>I agree that something needs to be done to alleviate the current Massey tunnel traffic congestion</p> <p>My suggestion is to start the southbound counter-flow at Westminster Highway in the afternoons, rather than bottlenecking at Steveston Highway. Since there is only 1 lane going northbound through the tunnel, the 3 northbound lanes on Highway 99 are basically empty while southbound is typically a parking lot from Westminster Highway or even up to the Oak Street bridge. This should help to even out the flow of traffic through the southbound tunnel, as well as on Steveston Highway.</p> <p>This should be done NOW to relieve the congestion, and continue during the many years of construction of the new bridge.</p> | <p>Thanks for your suggestions regarding the rationale for the Project.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> |
| 28-Sept-16 | Todd G. | - | <p>Hi I Attended the open house on Sept 14/16 in delta & I would like to add some feedback regarding the design aspect.</p> <p>Could you please implement a 3.48 (10 foot) top lane shoulder onto the Highway 99 redesign so that broken down vehicles large & small will have a safe spot to pull over & out of the travel lanes, if there traveling far from the right lane shoulder they could pull off into the median shoulder lane & out of traffic.</p> <p>Could you please pass this message on to Steve Topley & the design team.</p> | <p>Thank you for your comments on design elements along Highway 99.</p> <p>Other (Design): The Ministry will ensure that appropriate safety measures are incorporated into the design. The Ministry is working with First Responders to ensure that the design will improve safety and provide improved emergency vehicle access to incidents.</p> |

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| 28-Sept-16 | BC Trucking Association | Langley | <i>Please see separate incoming letter.</i> | <i>Please see separate response letter.</i> |
| 30-Sept-16 | Steve Bridger | Richmond | <p>Head out on the highway! and whatever comes our way....</p> <p>This is a solution for the 1950s. It caters to increasing numbers of cars, and we know that building more road surface just spurs on private car use. A 1950s reaction actually aggravates 2017's festering environmental and civic planning problems. It is hard to believe that the current BC government can be blind to this.</p> <p>Governments, with all their paid expertise and amassed information, are supposed to be leaders in solving environmental problems, not simply knee-jerk reactors to situations like the congestion crisis.</p> <p>Funds earmarked for the gigantic bridge project could easily boost the Skytrain system to take cars off the road in a real way.</p> <p>Delta and south residents want quick and comfortable transit north. They aren't specifying that is has to be in the form of another bridge. Already much of the traffic that "goes into Richmond" is headed directly for the park'n'ride, and street parking, close to the Canada Line. The River Rock parkade fills to overflow in every AM rush-hour. Yet this ill-conceived bridge plan adds a direct road to the full park'n'ride. So that is hurrying vehicles to a second overflow situation (besides the already-strained Oak St. Bridge).</p> <p>I hate the highway 99 and tunnel congestion as much as anyone. I empathize with north-south commuters who go through it daily. Some kind of early-term relief is urgently needed. But not at the cost of worsening congestion and pollution in the long term.</p> <p>The bridge is too big; it aggravates instead of solving the congestion and greenhouse gas problems--that the government says it wants to solve! The bridge destroys yet again more farmland, chiseling away at the ALR. It threatens the estuary and encourages the upriver coal and oil schemes, despite the government's disavowals.</p> <p>This whole project was only noised about as a done deal, too late in the game for ordinary citizens to have any input. The Open Houses were useless. I went to the earlier one at the Sandman, and even there the engineers--who were already told what the outcome should be--agreed when I said that a real solution would be to take the 3+ billion and build a Skytrain link across the present highway 99, into Vancouver. But clearly their marching orders were to support THIS solution.</p> <p>This project is so ill-considered, I am sure it comes from knee-jerk thinking of the Premier and/or a small circle of her political advisors. They must be looking for short-term votes, and not for the environmental welfare of us all into the future.</p> <p>So the Easy Rider Christy Clark is cheering us on. Let's head out on the highway! and whatever comes our way....Bring on the 1950s!</p> | <p>Thank you for your comments on air quality, traffic, marine use, agricultural use, and rationale and public consultation for the Project.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made</p> |

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| | | | | <p>available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (Public Consultation): Public consultation and public feedback plays an important role throughout the environmental assessment process. The Public Consultation Plan summarizes the public and stakeholder consultation and engagement activities for the Project to fulfill EAO's public consultation requirements as per the Section 11 Order under the B.C. EAA and is available on EAO's website. The Ministry submitted its Application to obtain an Environmental Assessment Certificate on July 27, 2016. EAO set a 60 day period for the submission of comments by the public from August 3, 2016 to October 3, 2016. EAO also hosted three Open Houses in August and September to provide the public and stakeholders with the opportunity to ask questions regarding the Application. This was separate from the three phases of public consultation that the Ministry held from 2012 through 2016. See Section 11 (Public Consultation) of the Application for more details.</p> |
| 2-Oct-16 | Ivan Michael Scott | Surrey | All those comments made by "Anonymous" should be disregarded as they are generally made by people who are known as NIMBYS and those who do not have the backbone to debate their views in public. I am in favour of the project. | <p>Thank you for your support. The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to</p> |

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| | | | | <p>habitat on Deas Island.</p> <p>Consultation with the public and stakeholders has played, and will continue to play, a critical role in ensuring that the Project as planned understands and considers the ideas and interests of local governments, communities, and the people of the region. Public consultation and feedback plays an important role throughout the environmental assessment process. The Ministry considers every comment it receives.</p> |
| 2-Oct-16 | Jim Wright | Richmond | <p>First, please consider all comments that citizens provided earlier, as available online from the Environmental Assessment Office website in the document with the heading “Collected Public Comments for George Massey Tunnel Replacement Project, January 15, 2016 through February 16, 2016.” I and many others took the time to provide carefully expressed input. Now I have discovered, near the end of a new comment period, that those comments seem to have just been put aside out of sight. Like me, most (perhaps all) of the January–February 2016 commenters will expect their earlier comments to continue to be considered.</p> <p>Second, I continue to be distressed by the obvious duplicity (of the application) that continues to be allowed, with a "blind eye" turned toward it. In particular, FOI requests have confirmed the obvious relevance of lobbying by Port Metro Vancouver and Fraser Surrey Docks for dredging of the Fraser shipping channel at a depth that is only possible with the removal of the existing tunnel. That makes even more clear the key reality that I will describe in the rest of this comment.</p> <p>Very obviously, the deep channel dredging is a related project, no matter how much care is now being taken with the weasel words used for pretending it isn’t the intent. In real reality, the removal of the existing tunnel is certainly part of the tunnel replacement project, and the removal certainly has the effect of enabling deep channel dredging,</p> <p>Equally certainly, there is a high-probability that Port Metro Vancouver and Fraser Surrey Docks will continue to advocate what they have publicly and privately (as FOI-revealed) been advocating for years. Therefore any reasonable informed person recognizes the probability of deep channel dredging after the existing tunnel is removed. It is also highly probable that Port Metro Vancouver and Fraser Surrey Docks will get their way, as usual, so that the dredging will in fact occur. (It is considerably less likely that they will respond to their new freedom to dredge by metamorphosing into choirboys with halos, let alone act accordingly.)</p> <p>To become more credible, the EAO assessment of the George Massey Tunnel Replacement Project will need to address the effects of the tunnel actually being replaced. (as implied in the name of the project). The most obvious effect is the one that will have the greatest effect on the environment, which is the enabling of deep ship-channel dredging. Please make the environmental assessment more real by recognizing this reality and acting on it.</p> | <p>Thank you for your comments regarding marine use, rationale and public consultation for the Project.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Vancouver Fraser Port Authority’s website (http://www.portvancouver.com/about-us/topics-of-interest/george-massey-tunnel-replacement/?doing_wp_cron=1475695527.6864271163940429687500) states “Considering Canada's future trade needs, including provincial plans to develop LNG, the port authority provided the province with measurements that would accommodate the largest ships that could reasonably use the river (LNG tankers and cruise ships). Internationally, ships are getting larger to be more economically and environmentally efficient, but removing the tunnel in favour of a bridge will not significantly change the size of ships that are able to use the channel for a number of reasons. The new bridge will be the same height above the water as the existing Alex Fraser Bridge, so maximum vessel height will remain unchanged. Other impediments to larger ships are the shallower depth of the river at its mouth, the width of the river - which does not allow very large vessels to turn – and various underwater pipeline crossings. As a Delta resident, and CEO of the former North Fraser Port Authority, one of the Vancouver Fraser Port Authority's predecessors, I understand the challenges the river presents. The tunnel is certainly one of them, but its removal will not have a significant impact on the size of ships that support Canada's trading economy using the Fraser River.”</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.’s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>Other (Public Consultation): Public consultation and public feedback plays an important role throughout the environmental assessment process. The Public Consultation Plan summarizes the public and stakeholder consultation and engagement activities for the Project to fulfill EAO’s public consultation requirements as per the Section 11 Order under the B.C. EAA and is available on EAO’s website</p> |

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| | | | | <p>(http://a100.gov.bc.ca/appsdata/epic/html/deploy/epic_project_home_430.html).</p> <p>Consultation with the public and stakeholders has played, and will continue to play, a critical role in ensuring that the Project as planned understands and considers the ideas and interests of local governments, communities, and the people of the region. Public consultation and feedback plays an important role throughout the environmental assessment process. The Ministry considers every comment it receives. The Ministry provided a response to every comment provided during the Pre-Application Phase public comment period. These were posted to EAO's website and are available at the following link: http://a100.gov.bc.ca/appsdata/epic/documents/p430/1463769785242_xHsXX1hFnmbZgCdyR16gYnx752rkzBhJBXGjtVcGLJnvWpMjhZ3Q!-673801137!1463769733058.pdf. The Ministry considered all comments received during drafting of the Application for Environmental Assessment Certificate.</p> |
| 2-Oct-16 | John Moran | - | <p>I would think that a second tunnel would be much cheaper to build with dedicated double decker bus lanes leaving frequently from the existing and new termini, with lots of parking and stops along the way south of the river, we should keep and upgrade the existing tunnel unless there really are unspoken plans to remove it and make the river deeper.</p> <p>It is very obvious looking at the plans and drawings that the present and future traffic build up will just be moved north closer to Vancouver, it's a helluva lot of money to spend just to do that. Then there is the farm land south of the river in Ladner and Delta which will mostly disappear with pressure for development of housing etc. because access will be in theory be easier, looked at what happened in Surrey when the Alex Fraser bridge was opened.</p> <p>This bridge badly needs a rethink!</p> | <p>Thank you for your comments on traffic, agricultural use, and rationale for the Project.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made</p> |

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| | | | | <p>available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 2-Oct-16 | John ter Borg | Richmond | <p>The MOTI's latest submission has failed to address concerns that I had previously raised and documented in my submission to you of February 15, 2016.</p> <p>It is increasingly apparent that the scope of this BC provincial environmental assessment process is inadequate and unnecessarily narrow in its limited ability to address reasonable public concerns about environmental and social impacts.</p> <p>I look forward to you referring this project to a federal full panel environmental review so that my concerns can be addressed in their completeness.</p> <p>I expect that you will be including the unanswered comments from my previous submission, as well as those from other citizens who participated by sharing their concerns earlier this year (February 2016).</p> <p>BC Environmental Assessment The project poses a threat to ALR farmland and the Fraser River fishery. The bridge is designed to industrialize the Fraser River for coal shipments and tanker traffic and a truly harmonized assessment would account for these significant environmental risks.</p> <p>The Ministry of Transportation has not provided a business case that can appropriately weigh the costs and benefits of the project. That is unfortunate because one would assume that the project proponent would have described the relative costs (including environmental costs) of this project along with alternatives. And through this analysis a preferred option would be selected.</p> <p>Federal Environmental Assessment</p> | <p>Thank you for your comments on river hydraulics and river morphology, fish and fish habitat, marine use, land use, agricultural use, rationale for the Project, and the environmental review process. The Ministry's response to your February 15, 2016 submission were posted on EAO's website on pages 244-246 of the George Massey Tunnel Replacement Project Public Comment Period (January 15, 2016 – February 15, 2016) http://a100.gov.bc.ca/appsdata/epic/documents/p430/1463769785242_xHsXX1hFnmbZgCdyR16gYnx752rkzBhJBXGtVcGLJnvWPmjhZ3Q!-673801137!1463769733058.pdf.</p> <p>River Hydraulics and River Morphology: The Ministry received public and stakeholder comments, including those you submitted, regarding river hydraulics and river morphology during the pre-Application phase. These comments informed the decision to undertake a river hydraulics and river morphology assessment. Dredging to deepen the river is not a component of this Project, and the Ministry is unaware of any plans by others to dredge the river deeper. Any consideration of using larger ships would require the river to be regularly dredged deeper at very significant cost.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential effects on fish and fish habitat are effectively addressed. Give the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment,</p> |

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| | | | <p>There is ample evidence in the public realm and through FOI searches that this project has been extensively lobbied for and proposed on behalf of Port of Vancouver’s interest in removal of the George Massey Tunnel in favour of deeper dredging of the navigational channel 15.5 m below Geodetic datum for 50 year life expectancy and 18.5 m below for 100 year life expectancy. The project is designed to dredge the Fraser Estuary deeper, 33 km from Sand Heads to New Westminster, and yet it does not trigger the Fisheries Act?</p> <p>If the intent is for a federal screening to fall after provincial project approval in order to avoid a proper environmental assessment then this is just another example of how broken Canada's environmental regulation has become. It is the responsibility of the BCEAO to inform the Federal Minister of the Environment that the project requires a referral to a federal full panel review for reasons of public concern.</p> <p>Section 16.2, River Hydraulics and River Morphology Study Section 4.1, River Hydraulics and River Morphology Assessment It is not true that no feedback regarding assessment of river hydraulics was received during pre-application consultation (refer to my previous submission).</p> <p>This project incorrectly assumes there will be no future changes to dredging requirements for navigational draft in the shipping channel.</p> <p>The project does not look at the long term impacts to sedimentation and erosion processes at Roberts and Sturgeon Banks and their long term ability to continue to act as natural buffers against storm surges and climate change.</p> <p>Section 16.7, Fraser River Salt Wedge Modelling The salinity study is limited to the 80th street intake in Delta, says nothing about agriculture in Richmond, and fails to take into account the long term impact of climate change and sea level rise. Why has the agricultural focus been limited to the non-agriculture growing months of November through January?</p> <p>The MoTI Report incorrectly assumes that the proposed removal of the tunnel will not affect the behaviour of the salt wedge. The Delta Farmer’s Institute has conducted an independent study that indicates otherwise and includes descriptions of impacts on agriculture.</p> <p>The affects of dredging on Richmond and Delta agricultural irrigation water withdrawal windows will be significant, especially in low flow river conditions.</p> <p>The planned dredging by Port of Vancouver that is obviously facilitated by this project has the potential for considerable ecological change in the Lower Fraser Estuary as a consequence of increased salinity exposure.</p> <p>Scoping and Valued Components Regional Growth This project is opposed by the mayor's of Metro Vancouver who are against the project as proposed because the Mega Bridge does not fit with the Livable Region Strategic Plan.</p> <p>You can't build your way out of congestion and Metro Vancouver Directors do not agree that the project traffic-related effects are expected to be positive.</p> <p>Land Use Similarly, the regional Metro Vancouver government does not agree that the project is consistent with existing land use plans, and designations.</p> <p>The conclusion that the majority of the Project works will occur within the existing Highway 99</p> | <p>including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Marine Use: Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging the river is not a component of this Project.</p> <p>Land Use: The Project is consistent with local and regional land use plans, and aligns with and serves adjacent land uses that have evolved along the Highway 99 corridor. It will support long-term economic growth and encourage denser, land-intensive, high-quality forms of development consistent with such plans. The Project is not anticipated to affect the planned distribution of regional population and employment growth predicted in Metro Vancouver’s regional growth strategy, overall regional population growth, and distribution trends or current trends in industrial land use and development due to the strong presence of Metro Vancouver’s Urban Containment Boundary and the Provincial ALR. See Section 5.3 (Land Use) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>The Ministry undertook a study to understand the potential effects that removing the Tunnel might have on the salt wedge and resulting irrigation. This study focused on the period between November and January during which the river flow decreases to a point where the salt wedge begins to exert effects on salinity in the water at the intake. The salt wedge remains mostly downstream of the Tunnel until November when the flow rate in the Fraser River drops to below 2,000 m³ /s. The effects of the salt wedge become apparent during flood tide when the water level in the river is increasing and the flow speed is decreasing. The study found that the proposed removal of the Tunnel is not anticipated to affect the behaviour of the salt wedge.</p> <p>The Ministry notes that the study undertaken by Delta Farmers’ Institute found that removal of the Tunnel will have no significant impact on salinity levels in the lower Fraser River.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.’s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year.</p> |

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| | | | <p>right-of-way and is consistent with that existing land use is an extremely limited assessment of regional land use impacts.</p> <p>There are real costs associated with a 10 lane bridge (12 lane highway) expansion. Imposing a freeway driven car culture on future generations, accelerating urban sprawl, intensifying speculative pressure on local farmland and does not fit with the regional growth strategy that is intended to protect the green zone and achieve a compact metropolitan region.</p> <p>Climate Change 9.6 Climate Change This report focuses on the general effects of climate change that could affect the project and inadequately investigates the potential effects of the project on climate change and Valued Components like agriculture, regional growth, land use, and ecosystems. It is insulting at best to be told that a 12-lane freeway expansion is in any way a sustainable climate solution.</p> <p>The project's climate change rationale is extremely limited (Air Quality Assessment Table 4.9-14) and only forecasts a 5% decrease in emissions attributed to idling by 2031 (10 years). This climate test is not consistent with BC and Canada's international commitments and the 2015 Paris Agreement. This is especially important for the evaluation of alternatives.</p> <p>All large transportation infrastructure projects must ensure that BC can achieve greenhouse gas emission reduction targets. Progress towards a zero-emission transportation system for BC requires that consideration of upstream and downstream emission impacts and transit alternatives be included.</p> <p>The proposed bridge is intended to facilitate coal, jet fuel, LNG or tar sands oil transport. CO2 emissions enabled by the project should be added to the actual contributions from future vehicle pollution encouraged by a new bridge. The totals should be compared with transit alternatives (rapid bus / light rail transit) and extended for at least the life of a new bridge (100 years). This was not done.</p> | <p>Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>The Project will improve safety, relieve congestion, accommodate future population and traffic growth, support goods movement and offer better access for transit, pedestrians and cyclists. A detailed business case which presents the benefit-cost analysis for the Project is available on the Project website (www.masseytunnel.ca).</p> <p>GHG reduction is one of the many benefits of the Project. Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the <i>B.C. Environmental Assessment Act</i>. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the <i>Canadian Environmental Assessment Act</i>. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada. As discussed in Section 1.0 (Overview of Proposed Project) of the Application, the Project will be obtaining all necessary permits, and this is anticipated to include requirement for authorization from the Department of Fisheries and Oceans.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> |
| 2-Oct-16 | Sharon Macgougan | Richmond | I request a federal full panel environmental review on the George Massey Tunnel. | <p>Thank you for your comments on the environmental assessment process.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the <i>B.C. Environmental Assessment Act</i>. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social,</p> |

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| | | | | <p>economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the <i>Canadian Environmental Assessment Act</i>. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada.</p> |
| 3-Oct-16 | Stuart Smith | Vancouver | <p>I urge you to reject this proposal. It will dramatically increase pollution and environmental damage in our region as it enables and subsidizes higher vehicle km travelled per person. There are established ways to reduce traffic congestion, the ostensible purpose of the proposal, while simultaneously reducing pollution. They would include:</p> <ol style="list-style-type: none"> 1. Reforming land use so that a quick run to the store for a litre of milk doesn't require a multi-km drive on roads to dangerous walk. 2. Providing options - ensure that walk/bike/transit options are safe, efficient, effective and available first, before building for automobiles 3. Put a price on congestion by putting a price on what causes congestion - low occupancy vehicles. <p>Building a massive new automobile infrastructure pieces is the exact opposite of all these and flies in the face of everything we know about transportation and land use in cities.</p> <p>The EAO should be reviewing this project not just on it's merits but in context - if we have \$3.5 to \$5 Billion to spend on reducing pollution - do we really think building more automobile capacity is going to pay off environmentally than providing better transit?</p> <p>Please reject this proposal on the grounds that it will seriously harm BC's environment for decades to come.</p> | <p>Thank you for your comments on traffic and the rationale for the Project.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>The new bridge will help promote transit, carpooling, cycling and walking, while also serving the commercial and general passenger vehicle demand this growth will generate. Tolling the new bridge will also help to support the Regional Growth Strategy's vision of compact communities, shorter travel distances and less car traffic.</p> |
| 3-Oct-16 | Anonymous | Vancouver | <p>I do not support the building of the proposed bridge. Commuter traffic volumes through the current Massey Tunnel have not increased over the last decade, and could be pushed even lower with improved transit.</p> <p>This Project will just push the traffic bottleneck up the highway to the Oak Street Bridge and onto Richmond streets. It is one of the reasons the City of Richmond voted to oppose the expansion.</p> | <p>Thank you for your comments on traffic.</p> <p>Traffic: Daily traffic levels at the Tunnel have been essentially steady for more than 20 years, albeit with year-to-year variance as the Tunnel has been operating at, or close to, capacity during much of the day. During that time, virtually all of the growth in Delta-</p> |

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| | | | Research and experience confirms you can't build your way out of congestion. | <p>Richmond traffic has been absorbed by available capacity at the Alex Fraser Bridge. Congestion levels have been growing at the Alex Fraser Bridge to the point where peak-direction morning and afternoon traffic congestion delay patterns have reached similar levels as at the Tunnel. In the absence of a new bridge, future increases in cross-river traffic demands will result in increased volumes and congestion delay times at both crossings.</p> <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |
| 3-Oct-16 | Anonymous | - | I am strongly opposed to the proposed Massey Tunnel bridge replacement. It is not fiscally responsible to be investing billions of dollars in automobile infrastructure while underfunding public education and public transportation. The research has shown that building bigger and more roads does not relieve congestion, and this project is particularly weak in this regard (bottlenecks simply being moved on etc). The potential damage to farmland is unacceptable, not to mention the potential for large fossil fuel bearing ships entering the mouth of the Fraser. This project needs to be completely overhauled, this time in a publicly transparent way. | <p>Thank you for your comments on traffic, marine use, agriculture, and rationale for the Project.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a</p> |

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| | | | | <p>dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to</p> |

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| | | | | be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details. |
| 3-Oct-16 | Melanie Thompson | Steveston | DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT DON'T DO IT many many are opposed to it, do something else. | <p>Thank you for your comments on the rationale for the Project.</p> <p>.....</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>.</p> <p>.....</p> |
| 3-Oct-16 | Douglas George Massey | Delta | Can you insure me that the design of the new bridge and the removal of the George Massey Tunnel has nothing to do with the demands of Surrey Fraser Dock and others under the jurisdiction of the Vancouver Port Authority or Port Metro Vancouver to dredge the Fraser River deeper, in order to make them viable as a business? What is the estimated cost of the removal of the centre four sections of the George Massey Tunnel? Why is this included in the construction costs of the new bridge crossing, and the costs included in the final toll costs? | <p>Thank you for your comments on marine use, tunnel decommissioning, and tolling.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project, and the Ministry is unaware of any plans by others to dredge the river deeper. Any consideration of using larger ships would require the river to be regularly dredged deeper at very significant cost.</p> <p>Other (Tunnel Decommissioning): When the new bridge is open to traffic, the Tunnel will be decommissioned and the four instream segments removed to: Eliminate future risk of damage to the new bridge and impact to shipping associated with significant seismic activity; Meet Ministry best practice regarding management of obsolete infrastructure; and, Provide opportunities to restore important Fraser River habitat. See Section 1.0 (Overview of Proposed Project) for more detail. The cost of decommissioning the tunnel, included in the \$3.5 billion estimate, has been confirmed by an independent international estimating specialist.</p> <p>Other (Tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability</p> |

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| | | | | should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue. |
| 3-Oct-16 | Anonymous | Port Moody | I'm very concerned about the threat to agricultural land. | <p>Thank you for your comments on agricultural use.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> |
| 3-Oct-16 | Ladnerite | Ladner | <p>I am for the bridge. I've lived in Ladner over 20 years and surrendered working downtown Vcr because of inadequate transit and the amount of time lost trying to get there and back home to my family. This project is providing infrastructure for future rail – along the 99 from the skytrain station all the way to Hwy 91. I read a lot about the bottleneck at Oak Street bridge but why is this project the scapegoat for the lack of foresight and action by the City of Vancouver? Its their roads that are plugged. It doesn't matter what direction you try to move in in Vancouver, you are gridlocked – ask anyone. It is to Vancouver those naysayers should be directing their venom. Lastly, the project has an office at Ironwood Plaza where you would learn more by popping into than by reading the newspapers. Doing so will make clear how false the statements are that the opposers are surreptitiously planting in the news. I do ask that the Govt bite bullet and have rail on and operating by project end whatever it takes to make that happen, regardless of TransLink's timeframe. That would restore faith and hope - thank you.</p> | <p>Thank you for your support and comments on traffic and public consultation.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (Public consultation): The Ministry has provided several ways to learn more about the Project and provide input including: public open houses, a Project website, a Project information line and email and a Project office in Richmond. The Project office in Richmond will be open to the public throughout construction. The Ministry welcomes questions and comments at any time and will continue to do its' best to respond to all enquires</p> |
| 3-Oct-16 | Anonymous | - | <p>I am writing to voice my opposition to this project from an environmental, social, and cumulative impacts standpoint.</p> <p>1. This is a poor use of public resources compared to a need to invest in transit elsewhere in the region – Wasting \$3.5 billion of taxpayer money to build an unnecessary, over-sized bridge is a gross misuse of public funds. This project has a potential for high cost overruns, as it is built over</p> | <p>Thank you for your comments on terrestrial wildlife, air quality, traffic, marine use, agricultural use, rationale for the Project, environmental assessment process, seismic considerations, climate change, Burns Bog, and cumulative effects.</p> <p>Terrestrial Wildlife: The Ministry understands the Ramsar designation, and the importance of these areas for native and migratory species and unique vegetation. The</p> |

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| | | | <p>deep unstable sediments. I am not confident that it will be structurally sound in the case of an earthquake. Also, it's not a good use of public money to reduce congestion. Commuter traffic volumes through the current Massey Tunnel have not increased over the last decade, and could be pushed even lower with improved transit. In our region, the Broadway Corridor between Commercial Drive and Arbutus in Vancouver is the biggest transportation bottleneck and is a much more deserving project for public money. Instead, the Massey Bridge will just push the traffic bottleneck up the highway to the Oak Street Bridge and onto Richmond streets. It is one of the reasons the City of Richmond voted to oppose the expansion. Research and experience confirms you can't build your way out of congestion due to induced demand. The more lanes you build, the more cars that come. In 2008 the provincial government promised a 'RapidBus BC' service to White Rock which would have eliminated any need for a new bridge. Unfortunately, despite new bus lanes being built we are still waiting for the buses to show and transit service through the Massey Tunnel has actually been cut. A ten lane highway expands vehicle usage and hinders the switch to electrified mass transit.</p> <p>2. Legally Flawed Process – This BC Environmental Assessment Process fails to include the need for a federal Review Panel Environmental Assessment due to the size of the Bridge Proposal, removal of the tunnel, the potential for significant adverse environmental effects, the Species at Risk Act, Aboriginal interests and concerns expressed by the public.</p> <p>3. Failure to Consider Alternatives – Lip service is paid to public meetings. No credible rationale is provided for the option of a massive Bridge. Only one group benefits: Port Metro Vancouver. Options of upgrading the existing tunnel, twinning the tunnel, a smaller bridge, or status quo with restrictions on truck hours have not been fairly considered.</p> <p>4. Failure to Recognize the Ecological Significance of the Fraser River delta - Several designations recognize the ecological importance of this Canadian Heritage River which supports the most productive salmon fishery in the world. A declared RAMSAR site as wetlands of international significance, the delta supports Canada's highest density of wintering waterfowl and migrating shorebirds of the Pacific Flyway. It is also Canada's top site for wintering birds of prey.</p> <p>5. Importance of Farmland – Destroying a prime agricultural corridor to build this bridge – plus the land consumed by the resulting sprawl – places British Columbia's long-term food supply at risk. The farmland also supports several species of wildlife that rely on the interdependent, interactive habitats of the river, ditches, waterways, farmland and Burns Bog. Building this bridge potentially opens up Delta for more residential and industrial development. The Port already has interests in farmland in Delta for example.</p> <p>6. Climate Change – Building new freeways when droughts, floods and extreme weather already wreak havoc on BC communities is highly irresponsible. Adding just one mile of new highway lane increases carbon emissions by 100,000 tonnes over 50 years. The bridge proposal feeds a continuing dependence on fossil fuels and is at odds with Canada's international commitment to limit global warming to 1.5 °C. Instead, it would be better to spend public money on sea level rise mitigation and adaptation measures.</p> <p>7. Industrialization of the Fraser River – Removing the Massey Tunnel opens the Fraser up to deeper dredging for larger ships like tankers carrying liquefied natural gas (LNG), coal and tarsands bitumen. The cumulative impacts are damaging to fish habitat and natural systems. The focus of shipping should remain in Vancouver's Burrard Inlet, a natural deep water port. BC cannot be serious about combatting climate change if it's still investing in the fossil fuel economy.</p> | <p>Project does not intersect the Fraser River Delta Ramsar sites. The Project will be designed, constructed and operated to avoid, minimize, or off-set potential impacts to terrestrial wildlife in the vicinity of the Project. As outlined in Section 4.8 (Terrestrial Wildlife) of the Application, the use of best practices during future stages of design and construction will largely avoid or mitigate Projected-related effects on wildlife and wildlife habitat.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: Daily traffic levels at the Tunnel have been essentially steady for more than 20 years, albeit with year-to-year variance as the Tunnel has been operating at, or close to, capacity during much of the day. During that time, virtually all of the growth in Delta-Richmond traffic has been absorbed by available capacity at the Alex Fraser Bridge. Congestion levels have been growing at the Alex Fraser Bridge to the point where peak-direction morning and afternoon traffic congestion delay patterns have reached similar levels as at the Tunnel. In the absence of a new bridge, future increases in cross-river traffic demands will result in increased volumes and congestion delay times at both crossings.</p> <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |

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| | | | | <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. Building a new tunnel to the same seismic standards as the proposed new bridge would cost more and carry greater construction risk as well as impose greater impacts on agricultural land, park land, the Fraser River and private property. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the <i>B.C. Environmental Assessment Act</i>. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the <i>Canadian Environmental Assessment Act</i>. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early</p> |

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| | | | | <p>engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Other (Seismic considerations): The Project has undertaken extensive geotechnical investigations which have confirmed the suitability of a bridge for this location. The new bridge will be built to current seismic standards, greatly improving safety in the event of an earthquake.</p> <p>Other (climate change): Climate change is not assessed as a value component as the reduction of GHG emissions is one of the benefits of the Project. One of the primary objectives of the Project is to address congestion, which contributes to climate change through idling-related GHG emissions. Other aspects of the Project that assist in reducing GHG emissions and addressing climate change include dedicated HOV/transit lanes that promote alternatives to the single-occupant vehicle, multi-use pathways that provide better connectivity for bikes and pedestrians provisions for future rapid transit integrated into the design, and tolling, which acts as a travel-demand management measure. The Project is also consistent with the provincial Climate Leadership Plan, which identifies investment in infrastructure to reduce congestion as an action to reduce the impact of transportation on climate change.</p> <p>All new projects being planned and constructed by the Ministry required that engineering and design work evaluate and consider vulnerability associated with future climate change and extreme weather events and to include appropriate adaption measures to mitigate against future consequences over the design life of infrastructure. Design considerations to guide climate change planning are provided in the Ministry's Technical Circular T-06/15 Climate Change and Extreme Weather Event Preparedness and Resilience in Engineering Infrastructure Design.</p> <p>Other (Burns Bog): The Project is close to, but does not touch, Burns Bog. Sensitive vegetation ecosystems are discussed in Section 4.7 (Vegetation) of the Application, which describes the potential influence of the Project on vegetation within the local and regional area. The Project is not anticipated impact Burns Bog.</p> <p>Other (cumulative effects): The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The</p> |

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| | | | | review included an assessment of cumulative effects on each valued component. |
| 3-Oct-16 | Kate | Vancouver | There are numerous environmental, economic, and policy reasons that the Massey Bridge must not be build, but I will highlight only the greatest problem with the proposal. Expanding road infrastructure invites even greater volumes of private and industrial traffic and flies in the face of what we know about our current challenge: climate change. At this crucial moment in history, we must develop alternatives to traditional infrastructure projects, and consider ways in which we might use the infrastructure we already have more effectively. By no means is this a call for a moratorium on all development. Rather, it is a demand that we put our resources to use for intelligent development. For example, through investment in better, electrified, rapid public transit systems. It would be devastating to see tax dollars go toward a project that will further hinder Canada's ability to keep its international commitment to hold global temperatures to 1.5 degrees Celsius. We must be – we are – better than that. | <p>Thank you for your comments on climate change and rationale for the Project.</p> <p>Other (Climate Change): Climate change is not assessed as a value component as the reduction of GHG emissions is one of the benefits of the Project. One of the primary objectives of the Project is to address congestion, which contributes to climate change through idling-related GHG emissions. Other aspects of the Project that assist in reducing GHG emissions and addressing climate change include dedicated HOV/transit lanes that promote alternatives to the single-occupant vehicle, multi-use pathways that provide better connectivity for bikes and pedestrians provisions for future rapid transit integrated into the design, and tolling, which acts as a travel-demand management measure. The Project is also consistent with the provincial Climate Leadership Plan, which identifies investment in infrastructure to reduce congestion as an action to reduce the impact of transportation on climate change.</p> <p>All new projects being planned and constructed by the Ministry required that engineering and design work evaluate and consider vulnerability associated with future climate change and extreme weather events and to include appropriate adaption measures to mitigate against future consequences over the design life of infrastructure. Design considerations to guide climate change planning are provided in the Ministry's Technical Circular T-06/15 Climate Change and Extreme Weather Event Preparedness and Resilience in Engineering Infrastructure Design.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Planning Students Association, UBC's School of Community and Regional Planning | Vancouver | <i>Please see separate incoming letter.</i> | <i>Please see separate response letter.</i> |
| 3-Oct-16 | Harold Steeves | Richmond | Richmond Council is concerned that the Massey Bridge proposal was approved without adequate consultation and analysis of the full environmental impact if the bridge is constructed. | Thank you for your comments on traffic, marine use, land use, rationale for the Project, and environmental assessment process. |

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| | | | <p>Furthermore there has been no public cost analysis to compare the cost of a bridge to other alternatives. Proper consultation cannot take place if those who are being consulted are not given the facts. After two years without answers Richmond Council applied for FOI information on previous announcements by the BC Government that a two lane tunnel would be built instead of a bridge. The FOI response was that there was no plan to build a two lane tunnel and therefore there is no FOI information.</p> <p>Documents found elsewhere prove that this is not true.</p> <p>1) July 15, 2004 (Review News Brief)"Province to spend millions on seismic upgrade for the Massey Tunnel". "Kenadian Contracting has been awarded the \$22.2 million contract" These improvements ae designed to make the tunnel safer in the event of a major earthquake", Transportation Minister Kevin Falcon said.</p> <p>Proponents of the bridge state that the tunnel must be removed because of seismic concerns. The seismic upgrade to the tunnel has been done. Further upgrades were to be completed when the new tube was added. There has been no evidence provided FOI or otherwise that the seismic upgrade was inadequate.</p> <p>2)Feb. 16, 2006 (Vancouver Sun), "Twinned Tunnel Part of Victoria's Long Term Plan", Feb 18, 2006 (Review) "Tunnel Will Be Twinned" "expanding Highway 99 on both sides of the tunnel from four lanes to six" "Twining the tunnelwould also requirsimprovement to other crossings over the North Arm of the Fraser, such as Oak Street and Knight Street Bridges or a new crossing to connect with growing central Burnaby"</p> <p>While 6 lanes would impact on other bridges proponents of a 10 lane bridge claim that it will not impact on other bridges. Richmond Council contends that the Massey Tunnel line-up will be transferred to Oak Street.</p> <p>Bridge proponents continually refuse to answer or avoid answering if they plan to build a new bridge from No. 8 RD. to Boundary Road in Burnaby. This would destroy the viability of East Richmond cranberry farms, which are among the most productive farms in Canada.</p> <p>3) 2006, Cost Estimates (Vancouver Sun) The BC Gateway Council estimated the cost of adding a two lane tube to the tunnel at \$500 million. (attached)</p> <p>On March 1, 2016 Richmond Council applied under FOI for background information and cost estimates for the addition of two lanes to the tunnel. The response was that there was no plan to add two lanes to the tunnel and therefore no information and costs exist. Conclusion: Consultation is impossible if those consulted are not told the truth and given the facts of other alternatives for comparison</p> <p>3) Dec. 11, 2008 "Bus lane will speed commute along Highway 99" "Rapid Bus BC is a key pillar of the Provincial Transit Plan" with minimal stops from White Rock to the Canada Line. "Jacob Bros Construction Ltd of Surrey was awarded the \$4.7 million contract. "</p> <p>Richmond City staff have determined that getting commuters onto the limited no of buses provided has been successful and rush hour use of the tunnel is down. Full use of the Rapid Bus system would make the new bridge totally unnecessary and pave the way for an additional tube for LRT.</p> <p>4) FOI e-mails: (all attached)</p> <p>Feb. 2, 2012(FOI) "BC Government meets with Port Metro Vancouver, Surrey Fraser Docks and Engineers to plan Geoge Massey Tunnel Replacement Bridge" The meeting was composed of two</p> | <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>Transit improvements completed in 2008 included the addition of a shoulder bus lane on the Highway 99 corridor. During the morning rush, a bus travels through the Tunnel every three to four minutes, and adding more buses would not result in better reliability or travel time, only improving the capacity of the crossing can do this. The Ministry recognizes that this route is the busiest transit route of all the Fraser River road crossings, carrying more than 10,000 transit users daily, and has reflected this in the substantial transit improvements that have been incorporated in the Project scope.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper.</p> <p>Vancouver Fraser Port Authority's website (http://www.portvancouver.com/about-us/topics-of-interest/george-massey-tunnel-replacement/?doing_wp_cron=1475695527.6864271163940429687500) states "Considering Canada's future trade needs, including provincial plans to develop LNG, the port authority provided the province with measurements that would accommodate the largest ships that could reasonably use the river (LNG tankers and cruise ships). Internationally, ships are getting larger to be more economically and environmentally</p> |

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| | | | <p>representatives of Port Metro Vancouver, two from Frase Surrey Docks, a bridge engineer plus the Assistant Deputy Minister and egional Maanager Engineering, ministry of Transportation .</p> <p>Nov. 19, 2012 (FOI) "Clearances for potential new river crossing" "We should consider future terminals. For liquid bulk tankers, with large air draft requirements (e.g. LNG)should be considered" Jennife Natland "We need to consider future terminals such as VAFFC, Lehigh, and possible terminal at our Richmond properties." Dave Hart, Port Metro Vancouver</p> <p>Dec. 4, 2012 (FOI) "Tunnel: Depth required is 15.5 metres below geodetic datum for 50 year life expectancy and 18.5 metres below for 100year life expectancy." Dave Hart, Metro Vancouver.</p> <p>July 16, 2014 (FOI) E-mail from Robin Silvester, CEO, Port Vancouver: "What is the air draft of the largest length LNG vessel that we could imagine in the river?" Answer: "Between 300m and 320m for operations on the river." "61m max air draft would allow the larger part of the world's LNG fleet... to enter the Fraser and pass under the bridge".</p> <p>Proponents of the bridge state that building a bridge instead of adding two lanes and eventually LRT to the tunnel has noting to do with dedging the river. The FOI e-mails show that there was no change from building a two lane tube anticipated before the Port lobbied to have the tunnel removed. The e-mails show that the secret decision to switch to a bridge was entirely due to the desire to dredge the river deeper to 15.5 metres. The Gateway Council, advisers to both federal and provincial governments, gave a cost estimate for adding a two lane tube at \$500 million. They advised the province to build a new two lane tube not a bridge. The increased \$3 billion cost is totally unwarranted when tunnel traffic is already declining in favour of public transit.</p> <p>The Gateway Council was correct in their analysis. No accounting of the effects of building a bridge have been considered.. It will open up Richmond and Delta to urban sprawl. Within 10 years of the opening of the Oak Street Bridge in 1957 12,000 acres of Richmond farmland was developed.</p> <p>Clearly the decision to switch from a two lane tube to a bridge has serious environmental considerations. Ten lanes to Vancouver will require a new bridge to Boundary Road which will carve up East Richmond Farns and destroy their viability. The extra lanes will set back public use of transit which affects overall air pollution far in excess of idling cars. Like Oak Street, the bridge will open up Richmond and Delta farmland to industrial development and exploitation. Removing the tunnel will lead to deep dredging of the Fraser River 34 km from Sandheads to New Westminster. This will have a major effect on fisheries habitat and could do the Fraser River Fishery irreparable harm. The bridge should be quashed to save environment, fishery and farmland and the people of BC will save \$3 billion.</p> <p>At the very least this project should be referred to the Federal Government for a proper Federal Environmental Review.</p> | <p>efficient, but removing the tunnel in favour of a bridge will not significantly change the size of ships that are able to use the channel for a number of reasons. The new bridge will be the same height above the water as the existing Alex Fraser Bridge, so maximum vessel height will remain unchanged. Other impediments to larger ships are the shallower depth of the river at its mouth, the width of the river - which does not allow very large vessels to turn – and various underwater pipeline crossings. As a Delta resident, and CEO of the former North Fraser Port Authority, one of the Vancouver Fraser Port Authority's predecessors, I understand the challenges the river presents. The tunnel is certainly one of them, but its removal will not have a significant impact on the size of ships that support Canada's trading economy using the Fraser River.”</p> <p>Land Use: The Project is consistent with local and regional land use plans, and aligns with and serves adjacent land uses that have evolved along the Highway 99 corridor. It will support long-term economic growth and encourage denser, land-intensive, high-quality forms of development consistent with such plans. The Project is not anticipated to affect the planned distribution of regional population and employment growth predicted in Metro Vancouver’s regional growth strategy, overall regional population growth, and distribution trends or current trends in industrial land use and development due to the strong presence of Metro Vancouver’s Urban Containment Boundary and the Provincial ALR. See Section 5.3 (Land Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.’s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation “Exploring the Options” in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. A retrofit of the existing Tunnel would not address current congestion and traffic safety concerns, and further seismic upgrades would require extensive Tunnel closures as well as pose considerable risk to the integrity of the Tunnel. Constructing a second tunnel upstream or downstream would have greater impacts on agricultural land, Deas Island Regional Park, ecosystems in the Fraser River, the onshore environment and private property and would be more costly as well as carry significant construction risk. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. The new bridge, which will be built to current standards, will serve as a lifeline structure in the event of a significant seismic event. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>As outlined in the Ministry’s ‘Planning chronology for Massey Tunnel replacement’ Fact Sheet (http://engage.gov.bc.ca/masseytunnel/files/2016/09/Fact-Sheet-Planning-Chronology-Sept-2016.pdf), the need for added capacity at the George Massey Tunnel</p> |

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| | | | | <p>crossing has been clear for decades.</p> <p>The Ministry does not currently have any plans to build another crossing over the Fraser River North Arm.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the <i>B.C. Environmental Assessment Act</i>. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. As discussed in Section 1.0 (Overview of Proposed Project), the Ministry will be required to obtain all applicable provincial and federal permits and approvals.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> |
| 3-Oct-2016 | Harold Steeves | Richmond | See Comment 94 | See Comment 94 |
| 3-Oct-2016 | Anonymous | BC Lower Mainland | <p>I am generally in support of the George Massey Tunnel Replacement Project for the following reasons:</p> <ol style="list-style-type: none"> 1. It will address long-standing congestion in the area, now and for the future, with traffic capacity improvements alone improving local air quality (less idling), safety and travel time savings. The many improvements for public transit (dedicated lanes for 25km in each direction, exchanges in the new Steveston and Highway 17A interchanges and provision for future rail transit in the Highway 99 corridor) will encourage transit use, as well as carpooling and cycling. And, though collisions will be fewer, they will occur, and emergency response will be much easier (and safer) above-ground with more traffic lanes to route vehicles around an incident. 2. While no project can be built for every unforeseen natural disaster, the seismic safety improvements built into the bridge as well as the increased height and structural safety of rebuilt overpasses and interchanges on Highway 99 will greatly improve safe travel through the corridor. 3. The proposed clear span bridge will result in no changes to river currents, and fewer habitat impacts than if piers were constructed in the channel. In addition, decommissioning of the Tunnel will be done in accordance with today's environmental parameters - rather more stringent than when it was constructed in the 1950s. 4. The project will improve storm water catchment and treatment, stabilizing flows, and will make many habitat improvements (restoring Green Slough, using native plantings as biological filters and/or replacements for invasive species) 5. While this well-developed highway corridor has no endangered species or significant heritage or archeological sites, the Ministry of Transportation and its contractors will have to comply with regulatory agencies charged with protecting marine mammals, birds, fish and wildlife and also farmland. | <p>Thank you for your support and comments on the rationale for the Project and the environmental assessment process.</p> <p>Other (Rationale): As you noted, this Project is in response to growing concerns about the impacts of increasing congestion as Richmond and communities south of the Fraser River continue to grow. Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to</p> |

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| | | | <p>6. Removing the tunnel will provide increased recreational lands in Deas Island Park, as well as habitat improvements in the Fraser and in areas where the its infrastructure is decommissioned. I think these benefits along with increased safety will more than compensate for the visual impacts of the bridge and hydro lines in the immediate area. The present highway noise, hydro towers and lines and tunnel approaches on each side of the Fraser already impact visual, recreational and environmental quality.</p> <p>The tunnel was a marvel in its day, but it cannot handle present traffic volumes, it cannot be improved to meet modern seismic standards and is a risk to emergency responders, particularly if there is a fire. For these reasons alone it should be replaced as soon as safely possible.</p> | <p>be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the <i>B.C. Environmental Assessment Act</i>. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO’s technical working group for the Project. As you have noted and is discussed in Section 1.0 (Overview of Proposed Project), the Ministry will be required to obtain all applicable provincial and federal permits and approvals.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> |
| 3-Oct-2016 | Iain Black, Vancouver Board of Trade / Matt Pitcairn, Richmond Chamber of Commerce | Vancouver / Richmond | <p>The Greater Vancouver Board of Trade (“GVBOT”) and Richmond Chamber of Commerce (“RCC”) appreciates the opportunity to provide comments in support of the George Massey Tunnel Replacement Project’s application for an Environmental Assessment Certificate.</p> <p>The Greater Vancouver Board of Trade has worked on behalf of our region’s business community to promote prosperity through commerce, trade, and free enterprise for 129 years. Our mission is to work in the enlightened interest of our members to promote, enhance and facilitate the development of the region as a Pacific centre for trade, commerce and travel. Our comments reflect the concerns and priorities of the GVBOT Directors, and our over 5,000 member businesses from across the Greater Vancouver region.</p> <p>The Richmond Chamber has been advocating for an improved, more efficient George Massey Corridor for some time and believes that this \$3.5 billion dollar infrastructure investment will benefit the business community and residents by making it easier and safer for customers, employees and goods and services to move in and out of the region.</p> <p>In a membership survey conducted in 2013, 93% of respondents wanted to see an improved crossing built. In a follow-up survey conducted in 2016, a strong majority expressed support for the proposed bridge to replace the current tunnel.</p> <p>As we have both indicated in previous public and stakeholder consultations for the project, we strongly support this project.</p> <p>The congestion caused by the existing tunnel and adjacent interchanges severely slows goods movement, which in turn, slows the economy. Once constructed, the new bridge and Highway</p> | <p>Thank you for your support and comments on traffic and rationale for the Project.</p> <p>Traffic: A new 10 lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>Other (Rationale): As you know, this Project is in response to growing concerns about the impacts of increasing congestion as Richmond and communities south of the Fraser River continue to grow. Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.’s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |

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| | | | <p>99 corridor improvements will save users up to 30 minutes a day and dramatically improve the reliability of this critical gateway corridor.</p> <p>The new bridge and highway improvements will address one of the worst congestion bottlenecks in the region and provide safer and more reliable transportation for goods movers, tourists to our region, and the general public. It is critical that we in Metro Vancouver take the necessary steps to keep our economy moving.</p> <p>Additionally, we strongly advocate for improvements to alternative transportation so that those who can get out of their cars have safe and reliable options. The project's significant investment in transit and cycling infrastructure is impressive. We appreciate knowing that the Province has worked with TransLink extensively to develop this scope.</p> <p>Our organizations have both been closely monitoring this important project closely and has received regular updates from the Massey Tunnel Replacement Project Team.</p> <p>Having conducted thorough due diligence of the key sections of the application, we believe that the project can proceed without negative impacts. We were reassured to read that greenhouse gas emissions will be reduced and that the Province has committed to no net loss of agricultural land as a result of this project.</p> <p>We are aware that the City of Richmond and Metro Vancouver have expressed concerns about the project; however, having actively participated in each round of stakeholder engagement with our stakeholders, we believe strongly that the information presented in the application demonstrates the evidence gathered to date appropriately, and that a future with this project is better than a future without it.</p> <p>Our organizations strive to enable and empower its members to succeed, grow and prosper in the global economy. With traffic congestion identified as one of the top barriers to our region's competitiveness in the Greater Vancouver Economic Scorecard 2016, we believe the responsible development of key transportation infrastructure such as the George Massey Tunnel Replacement Project is vital to the prosperity of both our region and country.</p> | <p>As you have noted, air quality will improve as a result of the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>In addition, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Thank you for reiterating that the Vancouver Board of Trade, Richmond Chamber of Commerce, and a strong majority of the Richmond Chamber of Commerce's membership support the decision to build a new bridge to replace the current Tunnel. This aligns with the results of the Ministry's public and stakeholder consultation which also showed that a new bridge is the preferred option.</p> |
| 3-Oct-2016 | Delta HUB Cycling Committee | Delta | <i>Please see separate incoming letter.</i> | <i>Please see separate response letter.</i> |
| 3-Oct-2016 | Eric Doherty | Victoria | <p>1) Misleading Statements regarding Greenhouse Gas Pollution and Air Quality</p> <p>A credible environmental assessment cannot be carried out without a basic respect for evidence and truth.</p> <p>Disturbingly, the GMTRP EA Application claims a 10-lane bridge and associated freeway expansion would result in a "5% to 6% reduction in GHG emissions" This is misleading to say the least. In the case of the Port Mann Highway 1 EA, a similar project, Environment Canada asserted that the project would cause a "deterioration of air quality and an increase in GHG emissions" Health Canada called the same document "inappropriate" and "misleading" . Even stronger language is called for given that this is a repeat offense.</p> <p>According to the SightLine Institute, adding just one mile of new highway lane increases carbon emissions by 100,000 tonnes over 50 years. The bridge proposal feeds a continuing dependence on fossil fuels and is at odds with Canada's international commitment to limit global warming to 1.5 °C.</p> <p>Worse than Useless Traffic Modeling</p> <p>The GMTRP EA Application claims to use traffic forecasts from a new computer model in "early development stages [to conclude that] the Project as proposed will result small decreases in total</p> | <p>Thank you for your support and comments on air quality, traffic, and analysis of options.</p> <p>Air Quality: The tunnel is B.C.'s biggest traffic bottleneck, with congestion causing more than one million hours of vehicle idling time each year. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: Daily traffic levels at the Tunnel have been essentially steady for more than 20 years, albeit with year-to-year variance as the Tunnel has been operating at, or close to, capacity during much of the day. During that time, virtually all of the growth in Delta-Richmond traffic has been absorbed by available capacity at the Alex Fraser Bridge. Congestion levels have been growing at the Alex Fraser Bridge to the point where peak-direction morning and afternoon traffic congestion delay patterns have reached similar levels as at the Tunnel. In the absence of a new bridge, future increases in cross-river traffic demands will result in increased volumes and congestion delay times at both crossings.</p> |

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| | | | <p>regional vehicle-kilometers traveled”[sic](4.9 – 35). Apparently this model does not work yet for this type of purpose, if it is indeed suitable for the purpose. Nothing in the EA suggests that this model has been tested for this purpose. Black box transportation models, as widely used in North America, were developed with funding from General Motors and are usually worse than useless in forecasting traffic volumes. In fact, traffic volumes through the Massey Tunnel have declined very slightly over the last decade; it would be interesting to know if this is the result this traffic model would have predicted.</p> <p>Even moderately informed members of the public know that increased road space leads to increased traffic volumes in urban areas. If the claim is that tolling would reduce regional traffic volumes, then the impact of tolling the existing tunnel should be studied.</p> <p>Misrepresentation of Cumulative Effects</p> <p>The Massey Tunnel replacement scheme is not a stand-alone project. It is a \$3.5 billion+ part of ongoing provincial and federal policies that drive up transportation GHG emissions at the cost of tens of billions of dollars annually. Canada, and BC, cannot feasibly meet the ambitious agenda to avoid catastrophic climate change set in Paris without a new direction on transportation, such as the one outlined in Transportation Transformation Building complete communities and a zero-emission transportation system in BC.</p> <p>The Canadian Parliament recently voted to take action on this cumulative climate damage funded from the public purse. Bill M-45 calls on the federal government to “(a) before making decisions on infrastructure funding proposals, where federal funding exceeds \$500 000, an analysis of their impact on greenhouse gas emissions is considered; and (b) where appropriate, funding priority be given to proposals which help to mitigate the impacts of climate change.” While federal funding for this project is not likely, this Bill indicates that Canadian MPs consider the cumulative climate effects of these kinds of projects to have a significant adverse effect.</p> <p>This EA avoids a serious discussion of cumulative effects on GHG pollution and air quality by the simple expedient of misrepresenting the likely result of the project.</p> <p>2) Consideration of Alternatives</p> <p>The alternatives to the project considered to date do not include any substantial transit service improvements or transportation demand management measures. Even the obvious step of tolling the existing bridge to the level foreseen on a new bridge has apparently not been considered.</p> <p>Any credible assessment of greenhouse gas pollution implications must include well researched alternatives to the project specifically designed to reduce greenhouse gas pollution. Alternatives should include various combinations of:</p> <ul style="list-style-type: none"> • Tolling the existing tunnel at levels comparable to those envisioned for the new bridge (at least during times when significant congestion occurs on a regular basis). These tolls should be tested for a reasonable period of time such as 12 months to get the most reliable data on the effects on traffic volumes, congestion delays, and greenhouse gas pollution levels. • Enhanced bus service throughout the catchment area of the tunnel, using existing transit lanes and transit priority measures. Transit priority measures requiring cooperation from the City of Vancouver, such as bus lanes allowing efficient operation of direct buses through the existing tunnel to downtown Vancouver should be included. • Enhancements to Canada Line service and facilities, including consideration of re-locating bus connections to Brighthouse Station so that connecting passengers have a better chance of getting a seat. Facilities enhancements might include a heated waiting room with washrooms at the main bus transfer point at the Canada Line (presently Bridgeport Station). • Enhanced transit priority measures wherever traffic congestion causes significant delays and/or lack of reliability for people riding transit through the tunnel. | <p>Forecast traffic volumes, both with and without tolling, have been developed based on an extensive multi-year program of data collection, traffic modeling, and independent validation. Section 5.1 (Traffic) of the Application provides a summary of the work undertaken to understand current traffic volumes and patterns. Detailed information of the traffic data collection program for the Project is available on the Project website (www.masseytunnel.ca).</p> <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Other (Analysis of Options): The Ministry evaluated five potential options for replacing the Tunnel. Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations, and social and community considerations.</p> <p>As identified in the Ministry’s Phase 2 Exploring the Options Consultation Discussion Guide, the public and stakeholders were consulted on the five potential options. Respondents expressed a clear choice for moving forward with capacity improvements along the existing corridor, with preference for a new bridge. Twice as many people preferred a completely new bridge as compared with a new bridge/upgraded tunnel scenario and many people specifically commented that any option including the existing Tunnel would not meet the Project goals.</p> <p>Substantial technical analysis was also undertaken, confirming that a new bridge is also the best technical solution. The analysis compared the five scenarios according to 28 individual criteria within seven evaluation areas and found that a new bridge, built to modern day standards is the most logical and cost effective solution and would best meet Project goals. The analysis is summarized in the Evaluation of Crossing Scenarios Report.</p> <p>A new bridge in the existing corridor to replace the Tunnel will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users.</p> <p>Section 1.0 (Overview of Proposed Project) of the Application, specifically Section 1.4; presents the analysis (discussed above) of the feasible project options that were identified and considered during the planning phase of the Project, as alternative means to meeting</p> |

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| | | | <ul style="list-style-type: none"> Other transportation demand management measures. E.g. see the Victoria Transport Policy Institute's TDM Encyclopedia http://www.vtpi.org/tdm/index.php Enhanced region-wide goods movement measures to reduce the need for container truck movement via the existing tunnel, such as short sea shipping (tug and barge) on a region wide basis. A new transit link or links across the Fraser when ridership warrants. For example, a passenger or bus and passenger ferry connecting Steveston and Ladner (or even an eventual extension of the Canada Line to Tsawwassen). <p>Further background on measure specifically designed to reduce GHG pollution is available in the CCPA / Wilderness Committee report Transportation Transformation: building complete communities and a zero-emission transportation system in BC https://www.wildernesscommittee.org/publication/transportation_transformation</p> <p>3) Safety: The EA claims the project will improve "safety with a forecast 35% reduction in collisions" This is not a substantive claim of improved safety. Slow speed 'fender-benders' which account for most collisions in congested conditions are for the most part not major sources of serious injury. And crashes will likely increase on a regional basis, rather than decrease, with increased traffic volumes as a result of the project. Urban freeway expansions, and the arterial road widenings that generally accompany them, generally cause increased crash fatalities.</p> <p>These fatalities and injuries are likely to be concentrated in areas closer to the Highway 99 corridor, including urban areas of Richmond. People walking and cycling are particularly vulnerable to the higher speeds and traffic volumes often found on arterials connecting to expanded highways.</p> <p>Apparently there are no particularly significant traffic safety problems related to the existing tunnel and approaches, otherwise the data for traffic fatalities would likely be cited in the EA Application. I was not able to find any data on crash fatalities in section 5.1 or 7 of the EA.</p> | <p>the Project objectives and why the Project as proposed was advanced.</p> <p>Other (Safety): .With narrow lanes and multiple merge points, crashes in and around the Tunnel happen with higher frequency than on other parts of the Highway 99 corridor as is demonstrated by the collision frequency and severity information included in the Project's Business Case and the Collision Data Analysis Report (available on the Project website at www.masseytunnel.ca).</p> <p>The new bridge will have more lanes and wider shoulders than the Tunnel. This will make it easier for traffic to continue moving in the event of an incident and will facilitate first responder access. Additional lanes will also make it safer to merge onto Highway 99 from the Steveston Highway and Highway 17A interchanges and make it easier to avoid slower-moving trucks. The 35% reduction in collision rates is consistent with the actual traffic safety levels achieved at the new Port Mann Bridge.</p> <p>With regards to cycling, from a safety perspective, Project-related cycling improvements provide considerably safer alternatives than existing routes through provision of connections where none exist today and through the emphasis on grade-separated multi-use pathways where practical, especially at the Steveston and Highway 17A interchanges.</p> |
| 3-Oct-2016 | Anonymous | Richmond | <p>I don't think ANOTHER bridge over the Fraser is the answer. It is really too bad the government couldn't sell it in a different way. Your reasons to ignore twinning the tunnel are just too obvious. We need something to move the public a lot more efficient than a 10 lane bridge. The Fraser River is barely surviving now! The fish certainly aren't! And obviously you don't care about agricultural land.</p> <p>With regard to another "Liberal bridge", I have used the Golden Ears Bridge many times during the past few years. That is a joke as far as use is concern, when are the tolls going to start paying for it???? What century?</p> | <p>Thank you for your comments on fish and fish habitat, agricultural use, and the rationale for the Project.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agricultural use. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the</p> |

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| | | | | <p>communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. Building a new tunnel to the same seismic standards as the proposed new bridge would cost more and carry greater construction risk as well as impose greater impacts on agricultural land, park land, the Fraser River and private property. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Vicki Huntington, MLA Delta South | Delta | <i>Please see separate incoming letter.</i> | <i>Please see separate response letter.</i> |
| 3-Oct-16 | Eric Doherty | Victoria | See Public Comment 100 | See Public Comment 100 |
| 3-Oct-16 | Anonymous | Burnaby | <p>This project is an important project that will make travel to the south of the Fraser safer and more convenient for all users.</p> <p>The George Massey has reached its maximum usage and an upgraded crossing is badly needed. The project has minimal environmental impacts because it mostly follows an existing corridor.</p> <p>Please approve this project ASAP</p> | <p>Thank you for your support and comments on the rationale for the Project.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this</p> |

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| | | | | crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance. |
| 3-Oct-16 | Peter van der Velden | Delta | <p>The projected salmon runs for the Fraser River this year are even less than predicted. This has steadily been the case since 2010. Salmon from the Fraser River make up a large part of the diet of the Southern Resident Killer whales. The J and K pods of the West Coast have been listed as 'endangered' or 'threatened' depending on who you listen to. Neither status is encouraging if the food supply is threatened.</p> <p>When the Massey Tunnel is removed as a part of this project it will allow the Port of Vancouver to further dredge the Fraser River. Deeper dredging will bring in a larger salt wedge. Not only will this affect irrigation water for Delta farmers, it will affect the salmon and the sturgeon populations. The only reason the tunnel is being removed is that the Port of Vancouver wants to bring deeper hull ships up the Fraser.</p> <p>As a secondary result of the bridge, urban sprawl will come to Delta. This will not only put more traffic on the road, it will eat into our agricultural land base. The cost to service the urban sprawl will be borne by Delta. Serving a widely spread out community is the most costly residential base possible. As a result there will be more pressure on the farmlands as Delta will look to increase its density and widen its tax base to cover these costs. The Delta farmlands are some of the most productive lands in Canada. This not only negative affects our agricultural community, it will heavily add to our carbon footprint. We will increasingly need to import more food and put more trucks on the road.</p> <p>The bridge will not solve Metro Vancouver traffic issues. It will in fact make it worse. There are better solutions. Solutions that will affect the environment in a far less harmful way. The only reason the bridge is being built is to serve the Port of Vancouver. As such the environmental assessment should indicate that this is not an acceptable proposal. Far too much damage will be incurred and the only real benefit will be for the shipping industry and a small part of the population that CHOSE to live South of the Fraser knowing they would need to deal with the commute.</p> <p>Sadly we have been lied to -and continue to be lied to- by all levels of government about this project. It gives me little faith that this comment –any comment for that matter- will be listened to.</p> <p>(http://vancouver.sun.com/business/local-business/grim-fraser-river-salmon-runs-even-worse-than-forecast)</p> <p>http://www.nmfs.noaa.gov/pr/species/mammals/whales/killer-whale.html</p> | <p>Thank you for your comments on fish and fish habitat, marine mammals, marine use, land use, agricultural use, and rationale for the Project.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Marine Mammals: The Project is not anticipated to affect southern resident killer whales (SRKW). Based on the results of underwater noise modelling, underwater noise generated by Project-related activities is not predicted to extend outside of the Fraser River, and therefore will not affect SRKW. In addition, studies undertaken also indicate that the Project is not expected to affect the population integrity of any fish sub-components in the Fraser River that support SRKW, including Chinook Salmon.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper.</p> <p>Land Use: The Project is consistent with local and regional land use plans, and aligns with and serves adjacent land uses that have evolved along the Highway 99 corridor. It will support long-term economic growth and encourage denser, land-intensive, high-quality forms of development consistent with such plans. The Project is not anticipated to affect the planned distribution of regional population and employment growth predicted in Metro Vancouver's regional growth strategy, overall regional population growth, and distribution trends or current trends in industrial land use and development due to the strong presence of Metro Vancouver's Urban Containment Boundary and the Provincial ALR. See Section 5.3 (Land Use) of the Application for more details.</p> |

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| | | | | <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agricultural use. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct16 | Anonymous | Richmond | <p>Although I have asked, I have never had an answer as to why the province is choosing to build a 1950s style bridge, instead of far less expensive alternatives such as twinning the tunnel and building rapid transit. I've attended each public consultation session and talked to other attendees, and I've also talked to engineers, wildlife biologists, urban planners, economists and others - and never found anyone who thinks a \$3.5 billion bridge is a solution to traffic congestion. I live on nearby ALR farmland and we are all concerned about the ecological disruption to the Fraser River estuary. We've asked about frog and bat studies - West Nile Virus and Zika could be here soon, and we need frogs and bats to eat the mosquitoes which populate the Woodward, Finn and Horseshoe sloughs. Although we've asked, we've never been emailed any studies - and have no idea with any were conducted using proper methodology. At the recent public consultation session I ask a lighting engineer about light pollution abatement measures and didn't receive an answer. We need proper environmental studies conducted as soon as possible and then the results easily accessible.</p> <p>Thank you.</p> | <p>Thank you for your comments on at-risk amphibians, terrestrial wildlife, lighting, and the rationale for the Project.</p> <p>At-risk Amphibians/Terrestrial Wildlife: The methodology undertaken to support the assessment of the Project on wildlife (including bats and amphibians) was conducted using appropriate methodology by professional biologists. As discussed in Section 4.5 (At-risk Amphibians), no at-risk amphibian species were detected within the Project alignment. Available habitat for at-risk amphibians within the Project alignment is limited. However, native (not at-risk) amphibians and amphibian habitat are present within the Project alignment. A Construction Environmental Management Plan will include measures to be implemented to avoid or reduce adverse effects on amphibians. The assessment of terrestrial wildlife focuses on upland birds, riverine birds and bats, and mammals. Section 4.8 (Terrestrial Wildlife) describes the radar, standwatch, and ultrasonic surveys that were undertaken for the assessment of riverine birds and bats within the Project area. The Construction Environmental Management Plan will describe standard best practices and Project-specific mitigation measures to prevent or minimize potential adverse effects on wildlife that might otherwise result from the Project during construction.</p> |

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| | | | | <p>Other (Lighting): Lighting requirements for the new bridge will be in accordance with applicable highway and bridge design codes. Bridge lighting design will incorporate mitigation measures to reduce or eliminate light-related effects. For example, dark sky compliant lighting will be diverted away from the water and directed to illuminate the running surface, and will be shielded to reduce light trespass or glare onto adjacent areas.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations.</p> <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Anonymous | Delta | <p>I am strongly opposed to the proposed George Massey Bridge project.</p> <p>The proposed 10-lane bridge is too excessive, and the \$3.5 billion cost is too costly. If completed, I feel the traffic congestion will only move further north along Hwy. 99. I'm concerned about the visual quality changes the proposed bridge would have, the loss to farmland, and increased noise, air, and light pollution. I strongly feel the implementation of tolls would have a hard financial impact particularly for families and seniors. I feel other alternatives such as enhanced transit services and improvements to the current tunnel were not adequately assessed.</p> <p>I do not want an Environmental Assessment Certificate granted for this project.</p> | <p>Thank you for your comments on air quality, atmospheric noise, traffic, agricultural use, visual quality, lighting, rationale for the Project, and tolling.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Atmospheric Noise: Current ambient noise levels in the Project area are generally high, dominated by noise from traffic on Highway 99 and connecting roadways. Trains, aircraft, marine and agricultural activities also contribute to ambient noise in and around the</p> |

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| | | | | <p>Project area. Appropriate mitigation measures will be implemented at select locations to address Project-related change in noise levels during construction. With the application of mitigation, ambient noise levels during operation are expected to be lower than current levels at most locations. Please see Section 4.10 (Atmospheric Noise) of the Application for further information.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Visual Quality: The new bridge will add noticeable visual features to the landscape and will change visual conditions adjacent to the Project alignment. However, at distances greater than one kilometre, the bridge deck will merge with the natural landscape and the main visual features will be the bridge towers. See Section 5.5 (Visual Quality) of the Application for artist renderings of the bridge concept.</p> |

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| | | | | <p>Other (Lighting): Lighting requirements for the new bridge will be in accordance with applicable highway and bridge design codes. Bridge lighting design will incorporate mitigation measures to reduce or eliminate light-related effects. For example, dark sky compliant lighting will be diverted away from the water and directed to illuminate the running surface, and will be shielded to reduce light trespass or glare onto adjacent areas.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing and the broader region, to support a final decision well in advance of when the new bridge opens.</p> |
| 3-Oct-16 | Leroy Dixon | White Rock | <p>I live in White Rock and, like many of my neighbours, work in Richmond. I carpool to and from work five days a week. HOV helps on the morning commute. The afternoon commute is another story completely. My carpool partners and I sit on Steveston waiting for the tunnel to absorb all the congestion.</p> <p>I firmly believe the replacement of the tunnel is necessary and that the bridge is the best solution.</p> <p>The proponent has addressed my concerns regarding environmental issues. Their application was very comprehensive and understandable.</p> <p>I look forward to seeing this great project move forward.</p> | <p>Thank you for your support and comments on the rationale for the Project.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |

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| | | | | <p>A new bridge was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> |
| 3-Oct-16 | Evelyn Feller | Richmond | <p>Building a large 10 lane bridge is not a good solution to the traffic congestion around the Massey Tunnel. Building more bridges are usually only short term solutions at best. There is no commitment to sufficiently improving public transit to Delta and South Surrey. The first step should be building an extension of the Canada Line to these suburbs. This step would take quite a large number of cars off the road. Only at this point when the impact of this rail extension is evaluated and shown to be inadequate, should other options such as twinning the tunnel or a smaller and lower bridge be considered.</p> <p>The problem with the proposed bridge is that it will facilitate the continuing industrialization of the South Arm of the Fraser River-a place of great ecologic importance. This is a project that shouldn't be evaluated in isolation but one of a number such as the proposed jet fuel barging where the cumulative impacts of these projects should be evaluated.</p> <p>The environmental assessment doesn't adequately demonstrate that the congestion problems will not be transferred to the Oak Street and other bridges in Richmond and this aspect deserves more analysis.</p> <p>The environmental assessment doesn't adequately address how bird strikes will be reduced or mitigated. Increased lighting and large buildings and infrastructure around areas like Roberts Bank have resulted in increasing bird mortality.</p> | <p>Thank you for your comments on terrestrial wildlife, traffic, and the rationale for the Project.</p> <p>Terrestrial Wildlife: For birds travelling along the Fraser River, replacement of the Tunnel with a bridge will result in a new obstruction, however behavioral observations at the Port Mann bridge show that most birds avoid collisions by flying above or below structures. Lighting requirements for the new bridge will be in accordance with applicable highway and bridge design codes. Bridge lighting design will incorporate mitigation measures to reduce or eliminate light-related effects. For example, dark sky compliant lighting will be diverted away from the water and directed to illuminate the running surface, and will be shielded to reduce light trespass or glare onto adjacent areas. Appropriate mitigation measures to minimize the attraction of birds, including provision of minimum necessary lighting and flashing navigation safety lighting will be considered in the design of the new bridge. See Section 4.8 (Terrestrial Wildlife) for more details.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> |

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| | | | | <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Lynn Armstrong | Ladner | <p>I am strongly opposed to this particular proposal for replacing the George Massey Tunnel. This is a bridge for the past, not for the future. A bridge that will be a dinosaur before completion. After attending Open Houses promoting the project and reading arguments from both proponents and opponents, I became convinced that the \$3.5 billion price tag is too high, unnecessary and wasteful. Less expensive solutions were not properly considered. Regional planning processes were ignored. The provincial government's own internal recommendations were ignored. No near-future plans for extension of rapid transit. Implications for further industrialization of the Fraser River impacting fish and farms. How can this project proceed when 22 of the 23 local authorities within Metro Vancouver are opposed? And, where is the evidence that this project will reduce green-house gas emissions and promote a quick transition to renewable energy - the urgently needed top priority of every level of government following global agreements reached in Paris last December? The ten-lane bridge mega-proposal clearly fails the climate test. A different plan is needed.</p> | <p>Thank you for your comments on air quality, traffic, marine use, and rationale for the Project.</p> <p>Air Quality: The tunnel is B.C.'s biggest traffic bottleneck, with congestion causing more than one million hours of vehicle idling time each year. Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and</p> |

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| | | | | <p>improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Anonymous | Richmond | <p>It has been very frustrating listening to the 'go ahead no matter what the cost' rhetoric spouted by this Liberal Government. There has not been due process/diligence done on any front. The Environmental Impact during construction and once the bridge is built will be devastating; but once started, there is no going back. The Fraser salmon run will be wiped out. The nearby agricultural lands will be destroyed. Now that B.C. Hydro has stated that they will be installing only overhead power lines, there will be a huge medical impact on the human population living in proximity to these lines (and not a healthy impact)!</p> <p>I understand that something must be done to alleviate the traffic concerns and the potential earthquake ramifications of the existing tunnel. But, reason not 'stubbornness, loss of face' must be implemented. Twinning the tunnel or a bridge on a far smaller scale must be considered. The following are reasons that I believe need to be considered. Get an independent Environmental study, get Hydro to bury the power lines, build a rational replacement/addition to the tunnel. Stop the political bullying. Listen to the public! Listen to the constituents--the government is supposed to work for the people not against them via their own self serving agendas!</p> <p>TOP TEN REASONS TO OPPOSE THE MASSEY BRIDGE: 1. Public Resources – Wasting \$3.5 billion of taxpayer money to build an unnecessary, over-sized</p> | <p>Thank you for your comments on fish and fish habitat, terrestrial wildlife, air quality, traffic, marine use, agricultural use, rationale for the Project, and environmental assessment process.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see</p> |

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| | | | <p>bridge is a gross misuse of public funds. This project has a potential for high cost overruns, as it is built over deep unstable sediments.</p> <p>2. Legally Flawed Process – This BC Environmental Assessment Process fails to include the need for a federal Review Panel Environmental Assessment due to the size of the Bridge Proposal, removal of the tunnel, the potential for significant adverse environmental effects, the Species at Risk Act, Aboriginal interests and concerns expressed by the public.</p> <p>3. Failure to Consider Alternatives – Lip service is paid to public meetings. No credible rationale is provided for the option of a massive Bridge. Only one group benefits: Port Metro Vancouver. Options of upgrading the existing tunnel, twinning the tunnel, a smaller bridge, or status quo with restrictions on truck hours have not been fairly considered.</p> <p>4. Lack of Transparency – Complete information of scoping and valued components with applicable laws and regulations have not been provided to the public.</p> <p>5. Failure to Recognize the Ecological Significance of the Fraser River delta - Several designations recognize the ecological importance of this Canadian Heritage River which supports the most productive salmon fishery in the world. A declared RAMSAR site as wetlands of international significance, the delta supports Canada’s highest density of wintering waterfowl and migrating shorebirds of the Pacific Flyway. It is also Canada’s top site for wintering birds of prey.</p> <p>6. Importance of Farmland – Destroying a prime agricultural corridor to build this bridge – plus the land consumed by the resulting sprawl – places British Columbia’s long-term food supply at risk. The farmland also supports several species of wildlife that rely on the interdependent, interactive habitats of the river, ditches, waterways, farmland and Burns Bog.</p> <p>7. Climate Change – Building new freeways when droughts, floods and extreme weather already wreak havoc on BC communities is highly irresponsible. Adding just one mile of new highway lane increases carbon emissions by 100,000 tonnes over 50 years.¹ The bridge proposal feeds a continuing dependence on fossil fuels and is at odds with Canada’s international commitment to limit global warming to 1.5 °C.²</p> <p>8. No Traffic Rationale – Commuter traffic volumes through the current Massey Tunnel have not increased over the last decade, and could be pushed even lower with improved transit.³ This Project will just push the traffic bottleneck up the highway to the Oak Street Bridge and onto Richmond streets. It is one of the reasons the City of Richmond voted to oppose the expansion. Research and experience confirms you can't build your way out of congestion.</p> <p>9. Industrialization of the Fraser River – Removing the Massey Tunnel opens the Fraser up to deeper dredging for larger ships like tankers carrying liquefied natural gas (LNG), coal and tarsands bitumen. The cumulative impacts are damaging to fish habitat and natural systems. The focus of shipping should remain in Vancouver’s Burrard Inlet, a natural deep water port.⁴</p> <p>10. Better Transit Alternatives – In 2008 the provincial government promised a ‘RapidBus BC’ service to White Rock which would have eliminated any need for a new bridge. Unfortunately, despite new bus lanes being built we are still waiting for the buses to show and transit service through the Massey Tunnel has actually been cut.⁵ A ten lane highway expands vehicle usage and hinders the switch to electrified mass transit.</p> | <p>Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Terrestrial Wildlife: The Ministry understands the Ramsar designation, and the importance of these areas for native and migratory species and unique vegetation. The Project does not intersect the Fraser River Delta Ramsar sites. The Project will be designed, constructed and operated to avoid, minimize, or off-set potential impacts to terrestrial wildlife in the vicinity of the Project. As outlined in Section 4.8 (Terrestrial Wildlife) of the Application, the use of best practices during future stages of design and construction will largely avoid or mitigate Projected-related effects on wildlife and wildlife habitat.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: Daily traffic levels at the Tunnel have been essentially steady for more than 20 years, albeit with year-to-year variance as the Tunnel has been operating at, or close to, capacity during much of the day. During that time, virtually all of the growth in Delta-Richmond traffic has been absorbed by available capacity at the Alex Fraser Bridge. Congestion levels have been growing at the Alex Fraser Bridge to the point where peak-direction morning and afternoon traffic congestion delay patterns have reached similar levels as at the Tunnel. In the absence of a new bridge, future increases in cross-river traffic demands will result in increased volumes and congestion delay times at both crossings.</p> <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. 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A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry’s analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic</p> |

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| | | | | <p>volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. Building a new tunnel to the same seismic standards as the proposed new bridge would cost more and carry greater construction risk as well as impose greater impacts on agricultural land, park land, the Fraser River and private property. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the B.C. Environmental Assessment Act. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social,</p> |

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| | | | | <p>economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the Canadian Environmental Assessment Act. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> |
| 3-Oct-16 | Lyn ter Borg | Richmond | <p>Removing the George Massey Tunnel and replacing it with a \$4 billion dollar 10 lane bridge is about as short sighted as removing the Hell's Gate fish ladders and replacing them with a waterfall to increase tourist revenue at the air tram.</p> <p>For over 100 years, since the railroad builders set off the Fraser Canyon landslides creating blockages to migrating salmon runs, the Canadian and United States governments have been working together with people and communities throughout the province of BC to restore, protect, sustain and enhance the Fraser River's salmon runs. If you drive 800 km from Steveston, to a bridge near the Alberta border, you will see the last of a series of Provincial highway signs and this one proudly extols... "Fraser River, World's Greatest Salmon River, Please Protect our Heritage".</p> <p>Evidence based, sound, science from Fisheries and Oceans research has proven that, dredging is counter-productive for migrating salmon. A 10 lane super tall bridge is a Trojan horse creating the bridge height needed to allow big tankers to pass under and thus the requirement for more dredging. The Greater Vancouver mayors with only one exception do not support the need for a 10 lane \$4 billion dollar bridge, but the Port needs the height.</p> <p>The Port of Vancouver is acting as a self-serving, self appointed gatekeeper on the mouth of the Fraser River. They are sitting behind the Christy Clark Liberals, with this \$4 billion dollar bridge proposal, and in fact are salmon predators that must be shooed away. The Ports expansionary efforts to industrialize the mouth of the world's greatest salmon river is incompatible with the commitments Canadians have made in good faith with our American partners. The Port must live within their means in a sustainable manner and must stop bullying the region to dance to their tune. They have the infrastructure within the Vancouver Harbour and the Robert's Bank terminals, an interconnecting rail system and a ready and waiting partner with an inland port proposal at Ashcroft to live and grow and prosper within their means. The traffic flow thru the tunnel is as pressing a problem as the Pattullo and the Annacis Island traffic that commuters work thru every day and the many other traffic bottlenecks in the region.</p> <p>Our scare resources can be better shared and spread across the region solving the regional transit woes for more commuters than just those on Highway 99. Downsize the crossing solution, increase the rapid transit commuter options, use the rapid bus lanes, build convenient park and</p> | <p>Thank you for your comments on marine use and rationale for the Project.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper.</p> <p>Vancouver Fraser Port Authority's website (http://www.portvancouver.com/about-us/topics-of-interest/george-massey-tunnel-replacement/?doing_wp_cron=1475695527.6864271163940429687500) states "Considering Canada's future trade needs, including provincial plans to develop LNG, the port authority provided the province with measurements that would accommodate the largest ships that could reasonably use the river (LNG tankers and cruise ships). Internationally, ships are getting larger to be more economically and environmentally efficient, but removing the tunnel in favour of a bridge will not significantly change the size of ships that are able to use the channel for a number of reasons. The new bridge will be the same height above the water as the existing Alex Fraser Bridge, so maximum vessel height will remain unchanged. Other impediments to larger ships are the shallower depth of the river at its mouth, the width of the river - which does not allow very large vessels to turn – and various underwater pipeline crossings. As a Delta resident, and CEO of the former North Fraser Port Authority, one of the Vancouver Fraser Port Authority's predecessors, I understand the challenges the river presents. The tunnel is certainly one of them, but its removal will not have a significant impact on the size of ships that support Canada's trading economy using the Fraser River."</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already</p> |

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| | | | <p>rides. Stagger the truck traffic to non-commuter hours, open the port to longer hours to accommodate more off hour truck travel, preserve the tunnel, twin the tunnel, build a smaller, lower, cheaper bridge, rather than tolls reverse the stick and offer a carrot, reward incentives for those able to adjust travel hours.</p> <p>The Government of Canada has just reaffirmed its commitments at the 3rd annual ‘Our Ocean Conference’ hosted by John Kerry in Washington DC on September 16th, 2016 . The Canadian Government released this announcement: “We stand firm with our international partners such as the United States to ensure that marine environments both domestically and internationally are preserved not only for now, but for the generations who follow.” More lip service and more promises to break?</p> <p>This week’s meeting in Vancouver of the Pacific Salmon Commission is very timely. The PSC is a salmon regulatory body run jointly by the Canadian and United States governments. Its mandate is to protect stocks of the five species of Pacific salmon and to enforce the Pacific Salmon Treaty which commits the governments to improve the spawning capacities for the regions rivers. When will they step forward and put forth their position, to defend the Fraser salmon, in this important debate over the best alternatives for replacing, restoring, enlarging the Massey Tunnel crossing?</p> <p>Harper may have muzzled scientist opinions and Trudeau appears to have opened the doors. Where is the debate, based on sound science, for this bridge proposal from the Department of Fisheries and Oceans, the Habitat Protection and Salmon Enhancement Branches and especially from the Pacific Salmon Commission? We need to push for a better alternative, better collaborative decision making and to stop breaking our promises to our children. It is their future we are playing with and frankly we are giving them reason not to trust us anymore.</p> | <p>unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation “Exploring the Options” in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Yvonne Bell | Richmond | <p>I strongly reject the idea of replacing the George Massey Tunnel with a 10 lane, 3.5 billion dollar bridge. Here are just a few reasons:</p> <ul style="list-style-type: none"> -Loss of farmland. Many hectares of the best agricultural soil in Canada will be paved over with this proposed bridge. -A waste of tax payers money and public resources as this project is unnecessary. The last review of the tunnel by the transportation minister said to twin the tunnel. -More cars more pollution. Higher CO2 levels. -Industrialization of the Fraser River. This would kill the aquatic life in the Fraser River. The removal of the tunnel, building the bridge, dredging the river so that super tankers could have access to Port Metro Vancouver, and then all the tanker traffic would certainly kill any life that might be left in the river. -A total lack of accountability from the government with this proposal. -This will take money away from public transit. 3.5 billion dollars toward public transit would go a long way. -Negatively affect the many birds from all over the world that use Richmond as part of their migration route. <p>Replacing the Massey tunnel with a 3.5 billion dollar, 10 lane bridge is such a dangerous proposal that all the lower mainland mayors have voted against it.</p> | <p>Thank you for your comments on terrestrial wildlife, air quality, traffic, marine use, agricultural use, and rationale for the Project.</p> <p>Terrestrial Wildlife: For birds travelling along the Fraser River, replacement of the Tunnel with a bridge will result in a new obstruction, however behavioral observations at the Port Mann bridge show that most birds avoid collisions by flying above or below structures. Lighting requirements for the new bridge will be in accordance with applicable highway and bridge design codes. Bridge lighting design will incorporate mitigation measures to reduce or eliminate light-related effects. For example, dark sky compliant lighting will be diverted away from the water and directed to illuminate the running surface, and will be shielded to reduce light trespass or glare onto adjacent areas. Appropriate mitigation measures to minimize the attraction of birds, including provision of minimum necessary lighting and flashing navigation safety lighting will be considered in the design of the new bridge. See Section 4.8 (Terrestrial Wildlife) for more details.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities,</p> |

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| | | | | <p>including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper.</p> <p>Vancouver Fraser Port Authority's website (http://www.portvancouver.com/about-us/topics-of-interest/george-massey-tunnel-replacement/?doing_wp_cron=1475695527.6864271163940429687500) states "Considering Canada's future trade needs, including provincial plans to develop LNG, the port authority provided the province with measurements that would accommodate the largest ships that could reasonably use the river (LNG tankers and cruise ships). Internationally, ships are getting larger to be more economically and environmentally efficient, but removing the tunnel in favour of a bridge will not significantly change the size of ships that are able to use the channel for a number of reasons. The new bridge will be the same height above the water as the existing Alex Fraser Bridge, so maximum vessel height will remain unchanged. Other impediments to larger ships are the shallower depth of the river at its mouth, the width of the river - which does not allow very large vessels to turn – and various underwater pipeline crossings. As a Delta resident, and CEO of the former North Fraser Port Authority, one of the Vancouver Fraser Port Authority's predecessors, I understand the challenges the river presents. The tunnel is certainly one of them, but its removal will not have a significant impact on the size of ships that support Canada's trading economy using the Fraser River."</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> |

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| | | | | <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The Project will improve safety, relieve congestion, accommodate future population and traffic growth, support goods movement and offer better access for transit, pedestrians and cyclists. A detailed business case which presents the benefit-cost analysis for the Project is available on the Project website (www.masseytunnel.ca). See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Mary Tait, Boundary Bay Conservation Committee | Ladner | <i>Please see separate incoming letter.</i> | <i>Please see separate response letter.</i> |
| 3-Oct-16 | Dianne Bell | Richmond | I strongly opposed the idea of replacing the Massey tunnel with a 10 lane mega bridge. It is a poorly thought out proposal that does not merit consideration. It does not adequately address the environmental impact on the Fraser River and the surrounding areas, the loss of farmland, the huge expense to the tax payers of BC, and the traffic congestion at the foot of Oak Street bridge that will result, just to name a few. The BC government needs to listen to reason and start considering the impact that their poor decisions are having on the environment and future generations to come. | <p>Thank you for your comments on traffic, agricultural use, and rationale for the Project.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity</p> |

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| | | | | <p>improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, property owners, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain for agricultural use. Please see Section 5.4 (Agricultural Use) for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>The Project will improve safety, relieve congestion, accommodate future population and traffic growth, support goods movement and offer better access for transit, pedestrians and cyclists. A detailed business case which presents the benefit-cost analysis for the Project is available on the Project website (www.masseytunnel.ca). See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Kimi Hendess | Richmond | I am deeply concerned and vehemently opposed to the proposed bridge for many many reasons, including procedural, environmental, social, financial, and more. The Application | Thank you for your comments. |

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| | | | <p>claims that this bridge will allow underprivileged people to have better transportation options. This is preposterous, given that the bridge will be enormously expensive and tolled. This mega-project must not be allowed to proceed, at the expense of public resources and the negative impacts outlined here:</p> <p>1. Risk to Agricultural Corridor and Agricultural Land Reserve The GMTRP claims that a main reason for choosing the bridge is that it has the least impact on farmland. There is no information that compares the alternative options to back up this claim.</p> <p>The Application says that there will be a "net gain" in farmland due to this project, but the impact of losing 17 ha of ALR land along the corridor - affecting 32 properties - is very significant and it is not clear how these negative impacts are offset by the trading of new parcels. Who will pay for the cost of bringing new land into production, fencing, drainage, soil fertility, access... How is the overall integrity of the ALR and the entire region's stock of agricultural land affected by yet another development project? And how could it be less affected by other strategies to reduce traffic, such as major investment in rapid transit? These factors must be more closely analyzed, and alternatives considered.</p> <p>The Application states that "no significant Project-related residual effects or cumulative effects on agricultural use are expected" but then under Land-Use, states that the project " will support denser, land-intensive, high-quality forms of development along the Highway 99 corridor." How is it possible to avoid negative cumulative impacts on the adjacent agricultural lands, if densification and development are supported and anticipated? This land-use statement makes clear the real danger to the ALR, of yet another "highway improvement" project.</p> <p>Any degradation of farmland in this area of Richmond and Delta - and especially the cumulative impact of increasing development pressure - has a huge impact and increases the risk to local food production and food security. Farmland not only produces food, supports the agricultural economy, it also provides valuable habitat for wildlife.</p> <p>2. Threats to Ecological Habitat and Wildlife, including Endangered & At Risk Species I am unsatisfied by the conclusions in the Application that impacts will be minimal or nil for so many species that depend on the Fraser River. This sensitive estuary and its surrounding areas cannot handle more and more development and I am concerned about impacts on fish and fish habitat including species at risk (e.g. white sturgeon, coho salmon); impacts on birds and waterfowl including species at risk (e.g. pacific water shrew, barn owl); coded red riparian habitats, ditches, and sloughs; impact of noise on whales; impact of noise and light pollution on night hunters; loss of habitat; change in salinity and water-levels in marshlands; impact on Burns Bog; and all the wildlife depending on the area and the risks posed by the project and by increased road and marine traffic.</p> <p>3. Air Quality & Climate Change The Project's claim that the bridge will result in improved air quality is unsubstantiated and unlikely, especially due to the incline of the steep bridge and the facilitation of increased traffic due to increased roadway. Pollution due to congestion that has shifted to other areas (e.g. Oak St & Knight St bridges, Richmond streets) must be assessed against this claim. Furthermore, independent traffic assessment and projections should be used to substantiate the project's claims. GHG emissions will increase because it is well proven that building more roadway increases the number of vehicles on the road. Build it, they will come.</p> <p>4. Proper Transportation Planning and Traffic projection The transportation planning and traffic rationale of the Project are severely problematic. The plan does not address the congestion that will simply be shifted north a few kilometers and into Richmond streets, nor does it address the Richmond-to-Vancouver commuters who would now</p> | <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Marine Mammals: The Project is not anticipated to affect whales. Based on the results of underwater noise modelling, underwater noise generated by Project-related activities is not predicted to extend outside of the Fraser River, and therefore will not affect whales. In addition, studies undertaken also indicate that the Project is not expected to affect the population integrity of any fish sub-components in the Fraser River that support whales.</p> <p>Vegetation: Sensitive vegetation ecosystems are discussed in Section 4.7 (Vegetation) of the Application, which describes the potential influence of the Project on vegetation within the local and regional area. The Ministry understands the importance of FREMP red coded (high productivity) habitat. The Ministry notes that the Project is close to, but does not touch, Burns Bog. The Project is not anticipated to impact Burns Bog.</p> <p>Terrestrial Wildlife: As outlined in Section 4.8 (Terrestrial Wildlife) of the Application, the use of best practices during future stages of design and construction will largely avoid or mitigate Projected-related effects on wildlife and wildlife habitat. The assessment of Terrestrial Wildlife included a consideration of potential effects of sensory disturbance due to changes in light and noise. The existing level of sensory disturbance on wildlife along the Project alignment is very high, and the species present are acclimated to noise and light disturbance associated with an active transportation corridor and agricultural production. The additional light and noise sensory disturbance effects on wildlife over and above that from the existing Highway 99 is considered to be negligible. For birds travelling along the Fraser River, replacement of the Tunnel with a bridge will result in a new obstruction, however behavioral observations at the Port Mann bridge show that most birds avoid collisions by flying above or below structures. Appropriate mitigation measures to minimize the attraction of birds, including provision of minimum necessary lighting and flashing navigation safety lighting will be considered in the design of the new bridge. See Section 4.8 (Terrestrial Wildlife) for more details.</p> <p>Traffic: The Project has been designed to address issues related to current and future traffic safety, congestion, and reliability and to help achieve regional mode share targets by facilitating travel across the Fraser River by transit, HOV, cycling and walking.</p> <p>Forecast traffic volumes, both with and without tolling, have been developed based on an extensive multi-year program of data collection, traffic modeling, and independent validation. Section 5.1 (Traffic) of the Application provides a summary of the work undertaken to understand current traffic volumes and patterns. Detailed information of the traffic data collection program for the Project is available on the Project website (www.masseytunnel.ca).</p> |

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| | | | <p>be negatively impacted, nor does it address "spill-over" effects such as short-cutting and diversion to non-tolled routes.</p> <p><u>Building more lanes does not reduce congestion; again, it has been proven that building lanes (even HOV lanes) actually increases the number of vehicles.</u> There is insufficient information about projected truck traffic projections and alternatives for the movement of goods.</p> <p>This project pays lip service to rapid transit but does not include putting rails on the bridge for light rail transit. This bridge does not make sense in the context of regional transit planning and more information is needed to explain the choice of 10 lanes, the rationale for the height of the bridge (affecting the height of the Steveston Hwy interchange), the impact on the road network, and the impact on available budget for rapid transit improvements. The project states that 60% of tunnel commuters currently travel to Richmond, but this must be more detailed - how many of these commuters are heading for the Skytrain Park & Ride en route to Vancouver? How many are heading north of Westminster Hwy and are just as likely to choose Hwy 91 instead of the new bridge?</p> <p>The Metro Vancouver Mayors' Council does not identify the tunnel as one of the top priority transportation areas in the region. Alternate routes are available for emergencies. Lower cost transportation demand management options are available. Alternatives must be assessed to give the public a true picture of the alternatives, and the best use of public funds.</p> <p>5. Transparency of Rationale Emails obtained by Douglas Massey via Freedom of Information Request have revealed that PMV and Fraser Surrey Docks have lobbied the federal and provincial governments asking for a bridge to replace the tunnel, to enable deep ships to travel up-river. This information has never been revealed to the public by the Provincial Government, and in fact, a GMTRP representative speaking to Richmond City Council stated that there were no plans to dredge deeper on the Fraser. The FOI emails reveal that he was in fact lying to Council (or if he was not lying due to not being aware of any dredging plans, then he was egregiously negligent in giving information about which he could not be certain).</p> <p>6. Insufficient quality consultation with City of Richmond Project staff insist there have been many meetings with City of Richmond staff. Yes, after the bridge had been chosen, the project team met with city staff to inform them of various aspects of the proposal. Prior to selection of the bridge as the preferred option, the City was not consulted in any meaningful way. Why would municipalities affected by the new crossing not be involved in the assessment of options, or even invited to submit comment on the various options in the selection process? If the City had been consulted, why would the Premier and the GMTRP not invite the City of Richmond Councillors & Mayor to the public announcement event when the bridge was announced?</p> <p>7. Democratic process & need for City input in selection of preferred options There are many, many reasons the City should be consulted prior to choosing a bridge, including: <u>matters concerning the river, its waters, and use thereof; traffic pattern changes; implications for the City's Official Community Plan, transportation plan, and budget (see note below re: concerns about routing of southbound traffic heading west onto Steveston Hwy);</u> vehicle use changes including <u>passage of dangerous goods over the bridge and into the City</u> (currently not allowed through the tunnel); <u>impact on farmland</u>, including removal of land along the highway corridor (the No.5 Rd land is the subject of much negotiation and planning between the City and landowners which is almost complete and will enhance the farming activity on that land) and <u>changes in salinity of irrigation water</u> due to increased dredging (which we know from Freedom of Information request emails will without doubt be undertaken by Port Metro Vancouver in order to allow passage of deeper ships upriver of the crossing).</p> | <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper. As deepening of the river in order to expand vessel traffic is not within the scope of Project, and such activities potentially undertaken by others are not certain or reasonably foreseeable projects or activities, the potential effects of such activities are appropriately not considered in the Application.</p> <p>Agricultural Use: The Ministry recognizes the importance of agriculture in the region and the Project area. Minimizing impacts to agricultural land has been a key goal since the onset of the Project and protecting agricultural land was one of the key factors in determining a new bridge as the preferred crossing scenario. The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for</p> |

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| | | | <p>8. Consideration of Alternatives Alternatives have not been fairly or publically considered, regardless of the GMTRP's "lip service" consultations. There are several viable alternatives that are much more cost-effective. Public consultation without cost-benefit analyses and the ability to review opportunity costs does not constitute proper consultation.</p> <p>9. Broad Cumulative Impacts The cumulative impacts of development of any kind on the Fraser River include the relationships between projects and the impacts of each project - and of their relationships - over time. The Massey Tunnel is a physical barrier to deep ships traveling up-river. If it is removed and a high bridge built in its place, suddenly we will be faced with increased possibilities of industrial expansion, new terminals, and shipment of dangerous fuels (LNG, thermal coal, jet fuel, and possibly other forms of bulk oil). The Massey Tunnel Replacement Project must be assessed in the context of this dramatic shift in how the Fraser River can be used, and the change of policy regarding sensitive ecological habitat conservation that would result. This project greatly impacts marine transportation and wildlife along the river, and opens the possibility of deeper dredging. The agricultural assessment fails to assess deeper dredging, simply stating that no such proposal currently exists. But that is not a good enough assessment of a very likely scenario. The entire analysis of the "salt wedge" fails to review the potential changes that deeper dredging, enabled by removal of the tunnel, would bring.</p> <p>10. Value of existing infrastructure In a meeting with GMTRP Agricultural Project Manager Ed Sanders on Tuesday January 19 at the Project Office, Mr.Sanders informed me that plans are to remove the middle sections of the tunnel because it's old and "you don't typically leave your junk lying around" (direct quote, witnessed by 4 others attending the meeting). GMTRP staff at the Open House later that day also referred to the tunnel as "old junk" to me and to three other members of the public that I spoke with. <u>Infrastructure should not be assessed as "junk", and in fact must be assessed truthfully.</u></p> <p>How is it possible that the Massey tunnel , which recently underwent seismic retrofitting (plates completed in 2006; shake alarm installed & operational in 2009) could suddenly be considered junk? This is very misleading terminology used by GMTRP staff to the public.</p> <p><u>The EA should include an assessment of the tunnel and its projected lifespan, given the upgrades already performed on it.</u> For comparison, the Maas tunnel in the Netherlands is 17 years older than the Massey tunnel and 441 meters longer, and is undergoing renovation beginning this year. These renovations will be Cdn \$399 million and illustrate that upkeep and seismic upgrades of decades-old infrastructure is possible and economically viable. BC should be proud of the Massey Tunnel and treat it as a valuable part of our transportation infrastructure.</p> <p>Furthermore, the EA should evaluate the impact on infrastructure affected by marine traffic changes enabled by the bridge, such as hydro lines crossing the river.</p> <p>11. Misuse of public resources The use of public resources for this project is outrageous, given the lack of rationale and the many drawbacks and flaws of the plans so far. There has been no fair assessment of all viable alternatives, and this should be necessary before an environmental certificate can be awarded. Full disclosure of the business case for the bridge, assessment of all the alternatives, and a detailed budget that breaks down the \$3.5billion cost should be disclosed to the public before we are even asked to comment.</p> <p>12. Need for a Federal Review Panel Assessment</p> | <p>the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>With regards to the comments regarding developments pressures on agricultural land, the Project is improving access on an existing corridor rather than providing new access to an area with developable land. As indicated in the Application, in such instances, improved capacity has been demonstrated to not substantially change land use though may change the pace of build out of existing land use plans.</p> <p>Given the strong policy presence of Metro Vancouver’s Urban Containment Boundary and the Provincial ALR the opportunities for the Project to result in substantially different development from that considered in the RGS and OCPs of adjacent municipalities is extremely limited. This means that existing urban areas within the Urban Containment Boundary could be considered for (re)development and intensification meaning a higher and better use of urban sites, while surrounding lands in the ALR are unchanged and retained for agriculture.</p> <p>Other (Options analysis): As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation “Exploring the Options” in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. Keeping the Tunnel would require major rehabilitation, an extensive shutdown of the tunnel and result in ongoing operating costs, and the Tunnel would still not meet current seismic and traffic safety standards. Constructing a second tunnel upstream or downstream would have greater impacts on agricultural land, Deas Island Regional Park, ecosystems in the Fraser River, the onshore environment and private property and would be more costly as well as carry significant construction risk. A new crossing in a new corridor was found to have the least amount of public support mainly due to concerns over the impacts to agricultural land and the environment.</p> <p>The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (Steveston Highway Access): The future Southbound traffic movement to Rice Mill Road from Highway 99 is an additional traffic movement that will be created as part of the scope of the Project. The existing Westbound traffic movement from Highway 99 to Steveston Highway will remain as it is today. The connection of Rice Mill Road from Highway 99 will help to alleviate congestion at No. 5 Rd and Steveston Highway for those traveling to and from the Ironwood Plaza or Riverside Industrial Park, etc.</p> <p>Other (Consultation with the City of Richmond): The Ministry has actively engaged the City of Richmond staff and Council since the Project’s inception 2012. To date, the Ministry has had over 100 meetings with the City of Richmond. The Ministry appreciates the considerable time City staff have spent with the Ministry staff. Their feedback helped to develop the project scope, the Project Definition Report, options analysis, the business case that supports this important project, and the environmental assessment application. The City of Richmond continues to support the main goals of the Project – to reduce congestion, improve safety, support trade and commerce, support increased transit on the Highway 99 corridor, support options for pedestrians and cyclists, and enhance the environment.</p> |

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| | | | <p>The Project Application states that a federal review is not necessary, but this seems ridiculous, given that this is a bridge in a waterway (federal jurisdiction) that impacts fisheries (federal jurisdiction) and federally significant ecosystem & wildlife.</p> <p>A federal review panel pursuant to the <i>Canadian Environmental Assessment Act</i> should be required due to implications related to federal jurisdiction under the <i>Fisheries Act</i>, <i>Canadian Environmental Assessment Act</i>, <i>Navigation Protection Act</i>, <i>Species at Risk Act</i>, <i>Migratory Bird Environment Protection Act</i>, and undoubtedly other Acts. Specifically, a federal review panel should be required due the importance of the Fraser River's designations as an internationally, nationally, and provincially significant site (Ramsar, Canadian Heritage River, Western Hemispheric Shorebird Reserve Network, top three Most Important Bird Areas in Canada, and former management as Fraser River Estuary Management Plan area), and the potential implications for the Burns Bog, a globally significant peatland. The Ramsar designation is particularly significant - it is an international agreement outlining the guidelines and principles for conservation and management of wetlands and their resources, and commits Canada to "work towards the wise use of all the wetlands and water resources in [our] territory, through national plans, policies and legislation, management actions and public education."</p> <p>Additional factors that should trigger a federal review panel include: assessment of <u>climate change impact</u> of the bridge and of the marine traffic (cargo and emissions) that it will enable; <u>endangered and threatened waterways and riparian areas</u> supporting <u>birds, fish, and other wildlife including species at risk</u>; impact of Fraser River ecology on the health of <u>endangered whales</u> in the Strait of Georgia; impact on <u>salmon along the entire Fraser River</u>; impact on the <u>Fishery and fishing boat navigation</u>; and <u>cumulative impacts</u> on all social, ecological, heritage, cultural, economic, geological, archeological, historical, and climate change-related interests (which should be listed in a comprehensive public review).</p> <p>A federal process should be undertaken to provide a complete listing of permits and approvals required for the project, and a listing of all <u>First Nations interests, use, and rights</u> affected, as well as public transparency regarding consultation with all affected First Nations.</p> <p>Note re: #7 Concerns about routing of southbound traffic heading west onto Steveston Hwy In a meeting with the GMTRP Agricultural Advisor Paul Christie and GMTRP Project Manager Ed Sanders on Tuesday January 19 at the Project Office, I was shown a map of the new highway routing (plan view) and told that plans for southbound traffic heading west onto Steveston Hwy are: choose the right lane early on, exit at Rice Mill Rd, turn right onto No.5 Rd, double back several blocks to make a left turn onto Steveston Hwy.</p> <p>This is a <u>shocking route</u> to take and is only necessary because of the unreasonable height of the bridge. This route will <u>cause the City to spend a great deal of money on roadwork</u> to deal with the implications. This route will <u>cause more delays</u> as drivers will need to make a left turn at a busy intersection which is also an entry for Ironwood Mall (rather than the current route which is a simple exit westbound onto Steveston Hwy, continuing through the intersection).</p> <p>The City's Animal Shelter is on No.5 Rd, and I'm very concerned that the increased traffic would cause problems for the dog walkers that exercise the dogs every day. <u>Trucks using the truck weigh scale at the south end of No.5 Rd would face increased delays</u> due to the increased traffic.</p> <p>Furthermore, there is a very real possibility that drivers seeking to "shortcut" and avoid the left turn onto Steveston Hwy will turn south on No.5 Rd to Dyke Rd. This would be very <u>problematic and unsafe spill-over</u>: Dyke Rd is a narrow, winding road and leads through active farmland. It is a popular pedestrian, cycling, dog-walking, and horse-riding route and an important part of the City's cycling network.</p> | <p>Other (Tunnel decommissioning): The Ministry follows best practices for the construction and decommissioning of infrastructure. This includes the removal of decommissioned infrastructure. The cost of decommissioning the tunnel, included in the \$3.5 billion estimate, has been confirmed by an independent international estimating specialist.</p> <p>As discussed in Section 1.0 (Overview) of the Application, there are several reasons for removing the Tunnel once the new bridge is built. Removing the in-stream segments of the Tunnel addresses the risks that a seismic event may cause the Tunnel to shift, creating an obstruction in the shipping channel and/or damaging the Fraser River shoreline. Given the importance of the Fraser River as a transportation corridor that supports national and provincial economies and as a diverse marine ecosystem, the impact of such an occurrence would be significant. As such, leaving the in-stream segments in place presents a long-term liability to the Province. Removing in-stream Tunnel elements concurrent with the Project represents the least cost alternative. It would be significantly more expensive and risky to undertake this work at a later date. In addition, obsolete infrastructure degrades over time, so it is standard practice to remove redundant facilities and man-made materials when replaced by new infrastructure. Removing in-stream segments of the Tunnel will return the river bottom to its natural condition. This provides the opportunity to backfill the south portal, reconnect the two sides of Deas Island that are currently bisected by Highway 99, and re-establish riparian habitat in this area.</p> <p>As part of Project planning, the Ministry undertook a study to understand the potential effects that removing the Tunnel might have on the salt wedge in the Fraser River South Arm. The study found that the proposed removal of the Tunnel is not anticipated to affect the behaviour of the salt wedge. Please see Section 16.7 (Fraser River Salt Wedge Modelling) of the Application. .</p> <p>Other (Environmental Assessment Process): The Project is subject to review and certification under the <i>B.C. Environmental Assessment Act</i>. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the <i>Canadian Environmental Assessment Act</i>. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat at Deas Island.</p> |

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| | | | <p>From Dyke Rd, drivers would head either along Finn Rd (an active farm area with tractor traffic and a heavily used cycling route), or up No.4 Rd to Steveston Hwy, which is also an actively farmed area (frequent tractor traffic), and is the route taken by trucks heading to the Reagle Terminals freight traffic terminal on Garden City Rd. No. 4 Rd has several sharp curves including one that was the site of a fatal crash in 2012, killing 2 people and injuring</p> <p>1. Increased traffic from the Rice Mill Rd highway exit on these "farming area back roads" would be potentially very dangerous, given the volume and nature of the diverse users of these roads. <u>This level of impact must be assessed, including the impact on farm vehicles and farm traffic, adjacent working farmland, and safety.</u></p> | |
| 3-Oct-16 | David Jones | Delta | <p>1. Choice of Bridge in line with Existing GMT is wrong The Project Definition Report from MOT shows 5 Options that were supposedly considered, and presented to ‘the public’ in two consultation Phased, between November 2012 and April 2013. Consultation supposedly took place with small group meeting, open houses, and through online forms.</p> <p>This was a sham. It is clear that most of the input that was asked for and received, was not from the public at all, from special interest groups, particularly Port Metro Vancouver and its business allies that dominated the “small group meetings”.</p> <p>The ‘scorecard’ that emerged from this supposed consultation, scored the 2nd Option (new huge bridge) higher on all categories, even including financial. You have to wonder what they were smoking!</p> <p>The obvious choice, “twinning the tunnel” with a new 2nd tunnel right besides the existing one, miraculously came in at a Higher Cost than this monstrous bridge, which will require removal of existing tunnel. Such a fabrication takes my breath away. Perhaps the new tunnel was going to be gold plated, whereas the new bridge is going to be made from Lego. More seriously, how do they expect to remove the old tunnel (safely) once the new bridge is built right on top of it? Has any legitimate engineering been done on this project at all? We certainly haven’t any evidence of it.</p> <p>2. Traffic Projections are totally wrong The traffic through GMT peaked in 2004 at 80,000 vehicles per day, and hasn’t really grown at all since 1987, when the MOT figures begin. The number of cars has actually dropped in the last few years, although this drop has largely been made up by trucks, (see below). This is astonishing considering the population growth in the last 29 years. So there is no reason to suspect that it would grow any more in the next 29 years. So we certainly don’t need the new bridge to get more cars across the river</p> <p>3. Truck traffic is THE problem with congestion However, what has changed is the number of trucks, especially the huge container trucks, carrying 40 foot containers or bigger. According to MOT own figures, trucks in 2011 made up 12% of the total vehicles, mostly large trucks. A single truck makes a huge difference to congestion, so it can’t be equated with a single car in terms of amount of room or lane it needs: They need much more room because trucks: Are bigger, up 5 X longer than a car, and very much heavier (10X – 40 X heavier) Move much slower overall, and are very much slower to accelerate in congested conditions - Require more space between them and cars, because of danger of serious injury to the car in case of collision between two very different sized objects. Taking all these factors together I estimate a single truck in congested conditions is equivalent to 10 cars. MOT’s own figures, (13% trucks and buses, plus 87 % cars) should therefore be translated into 130% ‘equivalent cars’ and 87 % (actual) cars.</p> <p>Trucks: 13% X 10 = 130 equivalent, or 60 % of total (i.e. congestion) Cars: 87% X 1 = 87 equivalent, or 40 % of total (i.e. congestion)</p> | <p>Thank you for your comments on fish and fish habitat, vegetation, terrestrial wildlife, traffic, marine use, land use, agricultural use, rationale for the Project, tolling, the environmental assessment process and climate change.</p> <p><i>Fish and Fish Habitat, Vegetation and Terrestrial Wildlife:</i> The Ministry understands the Ramsar designation, and the importance of these areas for native and migratory species and unique vegetation. The Project does not intersect the Fraser River Delta Ramsar sites. The Project will be designed, constructed and operated to avoid, minimize, or off-set potential impacts to aquatic and terrestrial vegetation and wildlife in the vicinity of the Project. Aquatic and terrestrial wildlife were assessed as part of the environmental assessment, specifically in the Fish and Fish Habitat and Terrestrial Wildlife sections of the Application.</p> <p><i>Traffic:</i> Daily traffic levels at the Tunnel have been essentially steady for more than 20 years, albeit with year-to-year variance as the Tunnel has been operating at, or close to, capacity during much of the day. During that time, virtually all of the growth in Delta-Richmond traffic has been absorbed by available capacity at the Alex Fraser Bridge. Congestion levels have been growing at the Alex Fraser Bridge to the point where peak-direction morning and afternoon traffic congestion delay patterns have reached similar levels as at the Tunnel. In the absence of a new bridge, future increases in cross-river traffic demands will result in increased volumes and congestion delay times at both crossings.</p> <p>A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the</p> |

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| | | | <p>Total traffic = 217 % equivalent</p> <p>So 60 % of the effective roadway in the tunnel is now taken up by trucks (including the buses, although they are very few), and only 40% is taken up by cars. So no wonder we have congestion almost all day long, and not just at rush hours.</p> <p>Trucks should be banned from the tunnel except late evening (after 9 PM), and early morning, say until 6 AM. This is what most cities do. It is crazy to build a whole new bridge at colossal cost just for these trucks, many of which are headed off to USA or other distant points.</p> <p>4. Trucks and Cars shouldn't share the same roadway</p> <p>To emphasize the point that trucks and cars are incompatible in terms of size, just consider the comparison with <i>cars and bicycles</i>, as we can all agree that cars and bicycles do not do well together, i.e. in the same road lane:</p> <table><tr><th>Vehicle</th><th>Typical weight (tons)</th><th>Ratio to Car</th><th>Ratio to Bicycle</th></tr><tr><td>Trucks</td><td>40</td><td>30</td><td></td></tr><tr><td>Cars</td><td>1.3</td><td>1.0</td><td>16</td></tr><tr><td>Bicycles</td><td>0.08</td><td></td><td>1.0</td></tr></table> <p>Thus we see that the weight ratio of a large truck to a car is about twice as large as the same ratio of car: bicycle. So we if we accept that cars and bicycles need to be separated, then surely cars and trucks also should be separated. Basically this means a separate roadway is needed for these huge container trucks, (<i>and they should pay the whole cost</i>)</p> <p>5. Business Case is cooked</p> <p>Wasting \$3.5 billion of taxpayer money to build an unnecessary, over-sized bridge is a gross misuse of public funds. This project has a potential for high cost overruns, as it is built over deep unstable sediments.</p> <p>The basic business case used to justify the huge capital cost is simply wrong. It projects a “net project” cost of \$2.0 Billion in 2014 dollars, even though the total capital cost (“as spent’), is \$3.5 Billion (with completion in 2022). How they manage to subtract 43 % of the cost is a mystery known only to those on the inside. Considering that there must be considerable money already spent (sunk costs) before construction begins, and interest paid during construction as well, it is a mystery how they manage this. Presumably the cost of the removal of GMT is included? We have seen how much work was required to remove the old PMB, which took years to complete after the new PMB was finished.</p> <p>Even worse, the Project business case purports to show \$4.1 Billion of ‘savings’ due to the new bridge, in travel time savings, economic development benefits, etc. This is simply unbelievable. Considering that there are about 40,000 regular users of the tunnel (80,000 vehicles per day, both directions, according to MOT), this works out to about \$100,000 per user. Who is going to believe that?</p> <p>The whole business case is almost all ‘blacked out’ in the October 2015 MOT document with the same name. None of the required figures are visible. One of the key parameters quoted for choosing this (huge) new bridge instead of a much modest 2nd tunnel (the Twinning approach) was lower operating cost The evidence for this is supposedly in this MOT document, but all, (not just some) of the Operating Costs which would support the decision to go with the bridge are missing, i.e. blacked out. One suspects that a bridge has a much higher operating cost, due to exposure to the elements, rain, sun, wind, snow, etc. with concomitant effects on steel structures.... Painting, corrosion, snow clearing, the list is a long one.</p> | Vehicle | Typical weight (tons) | Ratio to Car | Ratio to Bicycle | Trucks | 40 | 30 | | Cars | 1.3 | 1.0 | 16 | Bicycles | 0.08 | | 1.0 | <p>Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry’s analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Commercial traffic is important to the economic health of the region and local businesses, and the Project will support this and other traffic by providing improved travel times, reliability, and safety, as well as other benefits.</p> <p>Banning trucks from the Tunnel during rush hour would provide some level of congestion relief. However, since trucks represent a relatively small portion of rush-hour traffic (e.g., less than 5 per cent of northbound morning peak period traffic), congestion reduction benefits would be limited. This would also shift truck traffic to the Alex Fraser Bridge, which is also congested during rush hour, resulting in longer travel distances for trucks and additional delays for Alex Fraser Bridge traffic.</p> <p>Restricting truck traffic through the Tunnel to nighttime only would require current daytime truck traffic to use other river crossings during the day or to work only at night. It would also affect local municipalities. It would create nighttime noise on local streets and affect employee hours of work to accommodate nighttime truck deliveries. Deltaport has recently extended its hours of operation to allow night access to better manage the flow of traffic at the terminal. In the short run, this initiative will help to spread out some of the truck traffic that is currently using the Tunnel during the day. In the longer run, the new bridge will include a curbside climbing lane that can be used by all traffic, including trucks, so that all traffic can use the bridge during all hours of the day. In addition, separate pathways will be provided for cyclists and pedestrians so that they do not interact with trucks and autos.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper.</p> <p>Vancouver Fraser Port Authority’s website (http://www.portvancouver.com/about-us/topics-of-interest/george-massey-tunnel-replacement/?doing_wp_cron=1475695527.6864271163940429687500) states “Considering Canada’s future trade needs, including provincial plans to develop LNG, the port authority provided the province with measurements that would accommodate the largest ships that could reasonably use the river (LNG tankers and cruise ships). Internationally, ships are getting larger to be more economically and environmentally efficient, but removing the tunnel in favour of a bridge will not significantly change the size of ships that are able to use the channel for a number of reasons. The new bridge will be the same height above the water as the existing Alex Fraser Bridge, so maximum vessel height will remain unchanged. Other impediments to larger ships are the shallower depth of the river at its mouth, the width of the river - which does not allow very large vessels to turn – and various underwater pipeline crossings. As a Delta resident, and CEO of the former North Fraser Port Authority, one of the Vancouver Fraser Port Authority’s predecessors, I understand the challenges the river presents. The tunnel is certainly one of them, but its removal will not have a significant impact on the size of ships that support</p> |
| Vehicle | Typical weight (tons) | Ratio to Car | Ratio to Bicycle | | | | | | | | | | | | | | | | | |
| Trucks | 40 | 30 | | | | | | | | | | | | | | | | | | |
| Cars | 1.3 | 1.0 | 16 | | | | | | | | | | | | | | | | | |
| Bicycles | 0.08 | | 1.0 | | | | | | | | | | | | | | | | | |

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| | | | <p>But we are given zero evidence to support this. On really large bridge structures there is a permanent maintenance crew painting it continuously; by the time they get to one end they have to start at the other. It's a big job.</p> <p>None or this expensive maintenance or almost none is needed in a tunnel, protected as it is very nicely by the river and its 'blanket' of gravel over top.</p> <p>6. The Capital cost will never be paid off by any reasonable toll</p> <p>The projected capital cost is now \$3.6 Billion, but we all know that government projects never come in on the original estimate. A survey of recent projects indicates that the typical cost over-run is about 65%, so we can expect the GMTRB to come in at about \$6.0 Billion give or take.</p> <p>Looking at the Port Mann Bridge for comparison, this project had a final cost of about \$3.3 Billion, and is supposed to self financed by tolls, currently at \$3.15 for a car. Currently this bridge is losing about \$80 Million per year according to the Transportation Investment Corporation (latest annual report).</p> <p>Furthermore the new PMB is now carrying about 107,000 vehicles per day (down from 127,000 on the old PMB). To break even the new PMB needs about 175,000 vehicles at the current tolling rate (an additional 68,000 cars: \$82 Million divided by \$3.15 and 365 days per year.)</p> <p>Whereas the GMT is carrying about 80,000 vehicles per day now.</p> <p>So what toll is required for the GMT to break even with about 40% of the vehicles (40% of break even number for PMB), if capital cost is about 80% higher (6.0 vs 3.3 Billion)?</p> <p>Answer: $\\$3.15 \times 1.8 / 0.4 = \\$ 14.17$ per vehicle</p> <p>Obviously this isn't going to happen, so capital cost will never be paid off</p> <p>7. Failure to Recognize the Ecological Significance of the Fraser River delta</p> <p>Several designations recognize the ecological importance of this Canadian Heritage River which supports the most productive salmon fishery in the world. A declared RAMSAR site as wetlands of international significance, the delta supports Canada's highest density of wintering waterfowl and migrating shorebirds of the Pacific Flyway. It is also Canada's top site for wintering birds of prey.</p> <p>8. Industrialization of the Fraser River</p> <p>Removing the Massey Tunnel opens the Fraser up to deeper dredging for larger ships like tankers carrying liquefied natural gas, coal and tar sands bitumen. The cumulative impacts are damaging to fish habitat and natural systems. The focus of shipping for Port of Vancouver should remain in Vancouver's Burrard Inlet, a natural deep water port, instead of dredging this wonderful river to destruction.</p> <p>9. Climate Change</p> <p>This is a massive bridge built almost entirely of concrete and steel. Quantities not provided by MOT, but certainly many thousands of tonnes each. Concrete production process generates 0.4 tonnes CO² per M³ concrete. The Port Mann Bridge (PMB) contains 157,000 M³ concrete, and this proposed 'Massey Bridge' is about 1.5X -2X bigger, so will be produce about 100,000 tonnes CO² from concrete alone.</p> <p>Steel is even worse, producing 2 tonnes CO² per tonne steel. Port Mann bridge contains 41,000</p> | <p>Canada's trading economy using the Fraser River."</p> <p>Land Use: The Project is consistent with local and regional land use plans, and aligns with and serves adjacent land uses that have evolved along the Highway 99 corridor. It will support long-term economic growth and encourage denser, land-intensive, high-quality forms of development consistent with such plans. The Project is not anticipated to affect the planned distribution of regional population and employment growth predicted in Metro Vancouver's regional growth strategy, overall regional population growth, and distribution trends or current trends in industrial land use and development due to the strong presence of Metro Vancouver's Urban Containment Boundary and the Provincial ALR. See Section 5.3 (Land Use) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agricultural use. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>As described in the Application, the Project will result in a small net gain of land within the ALR that is available for agriculture. The land that will be made available to agriculture to offset losses are a mix of lands in the existing highway RoW that border on agricultural land; lands located within existing ramps (e.g. at Highway 17A) that are currently isolated from adjacent farmland; and other areas where previous development has occurred. With the first two, most of the areas that will be made available for agriculture have <i>in-situ</i> soils that can be used for agriculture (in some case by simply moving fences, with some land preparation), with the exception of the old infrastructure that will be removed and the footprint reclaimed. For the third type, the sites would be prepared by removal of pavement and subgrade, ripping or deep tillage to break up compaction, and placement of topsoils that have been salvaged from other places in the project RoW. The agronomic details, timing and schedule of the restoration work will be determined in consultation with the farmers that will use the restored land.</p> <p>The cost of bringing the new land into agricultural use will be borne by the Ministry as part of the Project agricultural management and mitigation plan.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> |

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| | | | <p>tonnes steel, so this bridge will require say 65,000 tonnes steel, and thus produce another 130,000 tonnes CO², for CO² total production of about 230,000 tonnes. Of course this figure will be greatly increased by all the construction activity including vehicles needed, people related activities, to say nothing of the emissions during actual operation of the new bridge.</p> <p>10. Risk of Damaging existing George Massey tunnel during Construction of bridge by Pile Driving</p> <p>The new bridge will be built inline with the existing tunnel, with four huge piers or towers holding up the bridge deck, cables, etc. These Towers must be anchored firmly into the ground or river bed, so piles must be driven about 85 meters down, (MOT number). I estimate these piles will be at least 5 meters diameter. Pile driving on this scale is a mammoth exercise requiring months if not years of work, using huge machines, hammering the piles into the ground. The energy generated during the pile driving is dissipated into the ground, but if there any existing structures nearby, they will be severely affected.</p> <p>Literature on this subject suggests that <i>a minimum of one pile depth (85m) separate each pile from any existing structure</i>. Existing GMT is 24 m wide, so this means the piles should be about (85 + 24 + 85) = 195 m apart, <i>at very minimum</i>. Unfortunately the piles must be driven close to the existing tunnel if they are to support the bridge as it spans the tunnel, in an H-shape. The bridge will be roughly the same width as the PMB, (each is 10 lanes), and PMB is 65 meters wide. So Towers would normally be fairly close to side of bridge, thus separated by say 75 m apart? This won't work. There is a real danger of cracking the tunnel (irreversibly) by the pile driving, just like a big earthquake Part of the reason given for replacing the GMT in the first place!</p> <p>11. Importance of Farmland</p> <p>Destroying a prime agricultural corridor to build this bridge – plus the land consumed by the resulting sprawl – places British Columbia's long-term food supply at risk. The farmland also supports several species of wildlife that rely on the interdependent, interactive habitats of the river, ditches, waterways, farmland and Burns Bog</p> <p>12. No Traffic Rationale</p> <p>Commuter traffic volumes through the current Massey Tunnel have not increased over the last decade, and could be pushed even lower with improved transit. This Project will push the traffic bottleneck up the highway to the Oak Street and Knight Street Bridges and onto Richmond streets. It is one of the reasons the City of Richmond voted to oppose the expansion. Research and experience confirms you can't build your way out of congestion. The figures presented in the Project Definition Report are ridiculously wrong in suggesting Queue Lengths (Figures 7, 8), will grow longer in future (2045 is shown) if no new crossing is provided. In actual fact, queues don't keep growing indefinitely as people/ businesses find other ways to get to work, or places to live. Years ago, a 2nd Crossing at Lions Gate was proposed (late 60's), as congestion was really bad even then. No 2nd crossing was ever built, (and never will be) but strangely enough the traffic queues didn't get any worse. People just changed their lifestyles/places to live/work, etc. Traffic can only get so bad and people adapt for better or worse. I have been going through GMT for about 30 years now, and the traffic is no worse now than it was years ago, (although the truck traffic has changed dramaticallySee below for separate comment.</p> <p>13. Legally Flawed Process</p> <p>This BC Environmental Assessment Process fails to include the need for a federal Review Panel Environmental Assessment due to the size of the Bridge Proposal, removal of the tunnel, the potential for significant adverse environmental effects, the <i>Species at Risk Act</i>, Aboriginal interests</p> | <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>The cost of the Project has been confirmed by an independent international estimating specialist. A detailed business case which presents the benefit-cost analysis for the Project is available on the Project website (www.masseytunnel.ca). See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the B.C. Environmental Assessment Act. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the Canadian Environmental Assessment Act. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Other (climate change): Climate change is not assessed as a value component as the reduction of GHG emissions is one of the benefits of the Project. One of the primary objectives of the Project is to address congestion, which contributes to climate change through idling-related GHG emissions. Other aspects of the Project that assist in reducing GHG emissions and addressing climate change include dedicated HOV/transit lanes that promote alternatives to the single-occupant vehicle, multi-use pathways that provide</p> |

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| | | | and concerns expressed by the public | <p>better connectivity for bikes and pedestrians provisions for future rapid transit integrated into the design, and tolling, which acts as a travel-demand management measure. The Project is also consistent with the provincial Climate Leadership Plan, which identifies investment in infrastructure to reduce congestion as an action to reduce the impact of transportation on climate change.</p> <p>All new projects being planned and constructed by the Ministry required that engineering and design work evaluate and consider vulnerability associated with future climate change and extreme weather events and to include appropriate adaption measures to mitigate against future consequences over the design life of infrastructure. Design considerations to guide climate change planning are provided in the Ministry's Technical Circular T-06/15 Climate Change and Extreme Weather Event Preparedness and Resilience in Engineering Infrastructure Design.</p> |
| 3-Oct-16 | Anonymous | - | I do not agree with a 10 lane mega bridge. It will destroy parts of the Fraser River, cause traffic bottle necks, impact farmland, and cost over 3 billion dollars, just to name a few of my concerns. It's 2016! How about we start thinking outside the box and come up with an alternative that we can be proud of, one that is in line with saving our environment and meeting our GHG targets. | <p>Thank you for your comments on air quality, traffic, agricultural use, and rationale for the Project.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality, underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island.</p> <p>Air Quality: Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction,</p> |

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| | | | | <p>integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. A detailed business case which presents the benefit-cost analysis for the Project is available on the Project website (www.masseytunnel.ca). See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Jim Wright | Richmond | Re Fish and Fish Habitat Assessment, PDF page 68 (Appendix A-4), includes "Removing electrical/mechanical/utilities from the tunnel," but it does not even mention the other half of the transmission-line rerouting from the tunnel. The other half is the projected building of two 120- | Thank you for your comments on fish and fish habitat, visual quality, BC Hydro utilities, and the environmental assessment process. |

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| | | | <p>metre-high transmission towers and one 75-metre-high transmission tower, all close to the river (two on the edges of Deas Island and one on the Richmond shore), with transmission wires suspended from them. That certainly has a potential effect on fish habitat, along with shore habitat and the air, a sort of habitat for creatures that fly.</p> <p>It also has negative effects on human health because of the physical and psychological effects of EMFs. That factor has been very evident in the huge Delta issue of a high-voltage transmission line that caused a years-long outcry in the Tsawwassen area, so it is highly predictable in this new Delta situation. Furthermore, the transmission situation compromises the health-giving effects of the Deas Island Regional Park, even if the project proponents don't think that a massive high-voltage transmission installation affects the natural area it passes through.</p> <p>With regard to visual quality, the transmission towers and lines (from towers equivalent to 37-storey and 23-storey buildings) clearly damage the viewsapes that are discussed under "Visual Quality." Actually, though, the whole "Visual Quality" section is absurd, because a gargantuan bridge with towers about five times as high as the highest buildings in Richmond is not better than a natural viewscape, which is what one largely seems from the south dike. The 68 pages of pseudo-science in that "Visual Quality" don't change what the ordinary human being will actually feel when looking at the compromised viewsapes. I guarantee that not many Richmondites (or anyone else) will feel more exhilarated by the giant bully symbol, the oppressive bridge that is being forced on Richmond and Metro Vancouver by the premier.</p> <p>Of course, it appears that anything beyond what the project proponents have chosen to include is not considered to be a valued component and therefore doesn't count in a BC EAO assessment. That and the fact that the premier will make the decision at the end of this provincial environmental assessment (through a cabinet minister who must act in cabinet solidarity) mean that the process the BC EAO is engaged in has no meaning other than as window dressing. We assume that the BC EAO staff are acting in good faith, but they are not in a position to view the situation inclusively enough or (ultimately) independently enough to make a credible decision. Of course, what is needed is a Canadian (federal) environmental assessment with review panel.</p> <p>That said, that you very much for doing what you can.</p> | <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. More specifically, mitigation and fish habitat enhancement and offsetting are expected to result in the avoidance of any residual effects on fish habitat quantity or quality. With respect to the BC Hydro Transmission Line Relocation Project, it is understood that it will intersect some fish habitat areas but is also anticipated that restoration planting will mitigate any potential effects to fish and fish habitat with no residual effects. In accordance with the cumulative effects assessment approach outlined in Section 3.10 of the Application and consistent with EAO guidance and the AIR, an assessment of cumulative effects only applies where adverse residual effects of the Project on a VC/IC have the potential to interact with the residual effects of other certain and reasonably foreseeable projects and activities. The BC Hydro Transmission Line Relocation Project was included in the list of reasonably foreseeable projects; however it is not anticipated to interact with the Project in a cumulative manner. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Visual Quality: The new bridge will add noticeable visual features to the landscape and will change visual conditions adjacent to the Project alignment. A visual quality assessment was undertaken to evaluate the potential effects of these changes. The Application notes that the findings in the visual quality assessment are subjective as different viewers will have different opinions of the aesthetics of the new bridge and interchanges in relation to the landscape. The methodology adopted for this study combined approved visual standards and procedures from the B.C. MOF (1997) and other methodologies used on comparable projects to assess the nature and degree of potential Project-related changes in visual quality. At distances greater than one kilometre, the bridge deck will merge with the natural landscape and the main visual features will be the bridge towers. Relocation of BC Hydro's Transmission line was considered in the cumulative effects assessment. Effects of BC Hydro's Project will be minimized as towers will be aligned with bridge piers and the transmission line will be in aligned with the bridge deck. See Section 5.5 (Visual Quality) of the Application for artist renderings of the bridge concept.</p> <p>Other (BC Hydro utilities): The transmission line relocation project is under the purview of BC Hydro. BC Hydro has confirmed that an overhead transmission line crossing the Fraser River will replace the transmission line that currently runs through the Tunnel. More information about this relocation can be found at https://www.bchydro.net/energy-in-bc/projects/gmtt.html.</p> <p>Other (environmental assessment process): The Project is subject to review and certification under the B.C. Environmental Assessment Act. The B.C. Environmental Assessment process provides an integrated approach for identifying, mitigating, and evaluation potential effects of proposed major projects on environmental, social, economic, heritage, and health values. Based on the Project scope, there is no federal trigger under the Canadian Environmental Assessment Act. Federal agencies including Environment and Climate Change Canada and Transport Canada are involved as members of EAO's technical working group for the Project. The Ministry conducted early engagement with staff at the Canadian Environmental Assessment Agency, Environment and Climate Change Canada, Transport Canada, Vancouver Fraser Port Authority, and Fisheries and Oceans Canada.</p> <p>The Ministry undertook a comprehensive review of valued components including environmental (fish and fish habitat, at-risk amphibians, marine mammals, vegetation, and terrestrial wildlife), socio-economic (land use, marine use, agricultural use, and visual quality), heritage resources, and human health as well as intermediate components including river hydraulics and river morphology, surface water and sediment quality,</p> |

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| | | | | underwater noise, air quality, atmospheric noise, and traffic. The proposed Project, which will address substantial traffic and safety challenges in the Highway 99 corridor, will result in a number of economic, environmental, social and health benefits including travel time and reliability for all users; improvements in local air quality; reductions in vehicle collisions and safety risk; improvements in access to transit, carpooling, and active modes of transportation; and economic benefits including employment and economic growth. The Project also represents an opportunity to enhance environmental values that have been affected by previous development including restoration of Green Slough to its historic alignment and enhancement to habitat on Deas Island. |
| 3-Oct-16 | Glen Andersen | Richmond | <p>Bridge or no bridge, Salmon stocks are in decline, farming and local food systems are threatened, provincial budgets are in deep deficit, let alone debt. A ten lane bridge would exacerbate all these threats to a (barely) sustainable region. The construction period alone, a 5 year process over many, many seasons, could make underwater fish "traffic" decide that the trip just isn't worth the trouble. If the dredging that this bridge would make possible, in order to further industrialize the region happens, an outfall of unpredictable and predictable effects could ensue. Even if the EAO is tasked with taking a limited view and may only regard certain limited details of time windows and measurable processes, we are dealing with a complex location, with complex, even mysterious processes at work. Therefore a wide view must take all possibilities into account. ANY possiblity of serious ecological damage should outweigh all other business interests.</p> <p>This is a project dreamed up by madmen. Not a single geographically or transit -focused academic has supported this hair brained scheme. Details, reports, data, sidestepping justifications will not bring back fish and birds and all the other lifeforms that we as quasi-stewards if our corner of Earth have no inherent right to jeopardize. Few people seem to realize that infant salmon make their way to the estuary as 3" long fingerlings, before heading out to sea. The Fraser estuary is a nursery and that nursery has already been compromised by decades of dyking, dredging and digging.</p> <p>Do you really want to be the last person on the chain of approval to say, "Yes I'm willing to allow for the building and operational periods of this very intrusive bridge to quite possibly reduce EVEN FURTHER the chances of the last surviving salmon".... and the salmon are just one link in a long complicated chain/web of life that we are a part.</p> <p>New gridlock that comes within some years (after a lag time) with the opening up of Delta and South Surrey as expanded commuter havens, will inevitably bring only more greenhouse gases to the equation. Of all the other less damaging options to a 10 -lane bridge, I would select any of them.</p> | <p>Thank you for your comments on fish and fish habitat, air quality, marine use, agricultural use, rationale for the Project.</p> <p>Fish and Fish Habitat: The Project will have a clear span over the Fraser River South Arm and Deas Slough, avoiding or minimizing Projects-related effects on fish and fish habitat. Mitigation, including timing windows for undertaking in-stream works and other measures outlined in Project-related Environmental Management Plans, will ensure that potential construction related effects on fish and fish habitat are effectively addressed. The small area of fish habitat affected by the Project will be offset or improved by proposed habitat enhancements, including restoring Green Slough to its historic alignment, resulting in a net environmental benefit for fish and fish habitat. Given the disturbed nature of much of the Project alignment, re-vegetation and restoration of areas within the Project alignment, including under the new bridge and adjacent to relocated ditches, represents an opportunity to provide a net improvement to ecological conditions. The productive capacity of local ecosystems will be enhanced by improvements to local water quality through Project-related improvements in stormwater management, removal of non-native species, and replanting with species that provide habitat value for fish. Please see Section 4.4 (Fish and Fish Habitat) of the Application for more details.</p> <p>Air Quality: It is estimated that tunnel-related congestion causes more than one million hours of idling each year. Project related reduction in idling due to congestion, and consequent reduction in emissions, is expected to improve air quality. Project-related improvements in air quality include an additional 21 per cent reduction in particular matter emissions, seven per cent reduction in volatile organic compound emissions, and five to six per cent reduction in greenhouse gas (GHG) emissions as compared to a future without the Project. With a free-flowing bridge, the Project will eliminate one million vehicle delay hours a year, equivalent to about 13,000 tonnes of GHG emissions today. Please see Section 4.9 (Air Quality) of the Application for more details.</p> <p>Marine Use: The Project is intended to improve safety and congestion on Highway 99. The new bridge will be the same height above the water as the Alex Fraser Bridge. Removing the Tunnel will not appreciably increase the size of vessels using the Fraser River South Arm channel, as the top of the Tunnel is level with the bottom of the River. Other factors, including the Metro Vancouver water main to the west of the Tunnel, other utility crossings, and the width of the river itself, limit the size of vessels that can navigate the river. Dredging to deepen the river is not a component of this Project and the Ministry is unaware of any plans by others to dredge the river deeper. Any consideration of using larger ships would require the river to be regularly dredged deeper at very significant cost.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agricultural use. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the</p> |

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| | | | | <p>communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. The Tunnel is B.C.'s biggest bottleneck, with wait times already unacceptable and projected to get worse as the region grows. It is estimated that tunnel-related congestion causes more than one million hours of vehicle idling time each year. Without improvements to the crossing, economic growth and regional livability will be constrained by congestion and increasing travel times for commuters, goods movers, commercial traffic and other users. The Tunnel does not meet current seismic standards and has about 10 years left before the major components such as lighting, ventilation and pumping systems need to be replaced. The crossing is a provincial asset, connecting a provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation "Exploring the Options" in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> |
| 3-Oct-16 | Mary Tait, Boundary Bay Conservation Committee | Ladner | See Comment 114 | See Comment 114 |
| 5-Oct-16 | Anonymous | | <p>I travel through the current George Massey Tunnel on a daily basis to commute into Burnaby for work and into Richmond to visit family, shops, and services. On weekends, those trips often increase to several trips each day.</p> <p>I am supportive in the decision that improvements are required to this South Arm crossing of the Fraser River. However, I am opposed to the currently proposed bridge outlined in the Ministry of Transportation and Infrastructure's George Massey Tunnel Replacement Project for a number of reasons. I feel the size/scale of the proposed bridge is too large. The proposed bridge may increase traffic flow at this crossing, but I feel traffic congestion would move further north along Highway 99 towards the Oak Street and Knight Street Bridges. The current \$3.5 billion cost of this project is too expensive. The funds could be better used elsewhere, such as a replacement for the Patella Bridge or improved public transit. I am concerned about the years of traffic disruptions during bridge construction, having witnessed firsthand the impacts on traffic during construction of the new Port Mann Bridge. I am also concerned the footprint of the proposed bridge would impact farmland, detract from the current setting, and increase noise</p> | <p>Thank you for your comments on atmospheric noise, traffic, agricultural use, the rationale for the Project and tolling.</p> <p>Atmospheric Noise: Current ambient noise levels in the Project area are generally high, dominated by noise from traffic on Highway 99 and connecting roadways. Trains, aircraft, marine and agricultural activities also contribute to ambient noise in and around the Project area. Appropriate mitigation measures will be implemented at select locations to address Project-related change in noise levels during construction. With the application of mitigation, ambient noise levels during operation are expected to be lower than current levels at most locations.</p> <p>Traffic: A new 10-lane bridge (eight lanes plus two transit/ HOV lanes) was determined to be preferable in serving the needs of all user groups, including transit users given the local, regional, provincial and national importance of Highway 99; the variable trip purposes (goods movement, commuter, special generators etc.), vehicle requirements, origins and destinations of existing traffic; and planned future population and employment growth. The Ministry worked with TransLink and area municipalities, including the City of Richmond, Corporation of Delta, and Metro Vancouver, to identify the improvements that could be incorporated into the Project to provide needed capacity improvements while also further encouraging alternatives to single occupancy vehicles on</p> |

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| | | | <p>pollution.</p> <p>In terms of the implementation of tolls for this project, I feel it would have a hard financial impact on families and seniors. Until the last Federal election, South Delta and East Richmond were combined into one riding, essentially treated as one community. Many of the residents in South Delta have family in Richmond, frequent Richmond for various shops and services such as dentists and doctors, and commute through the tunnel for work. Adding a toll to every trip will result in a financial burden to many members of the community. Tolling the proposed bridge may also result in diverting traffic to the un-tolled Alex Fraser Bridge, potentially increasing traffic congestion at that crossing.</p> <p>I hope the Ministry of Transportation and Infrastructure withdraws their current proposal to replace the George Massey Tunnel with a new bridge. I would prefer to see increased public transit options (skytrain, buses, light rail, etc.), and upgrades to the current tunnel.</p> | <p>this corridor.</p> <p>The Project scope includes substantial measures to promote transit, car-pooling, walking and cycling as alternatives to single occupant vehicles. Improvements on opening day include dedicated transit/ HOV lanes within the median for 24 km in each direction, integrated transit stops within the Steveston and Highway 17A interchanges and a dedicated transit ramp at Bridgeport Road enabling direct transit access to and from the Canada Line at Bridgeport Station. These measures will make transit more convenient and improve the reliability of transit travel times. A pedestrian and cycling pathway on the bridge with connections to the existing trail and cycling network in Richmond and Delta will allow cyclists and pedestrians to freely cross the Fraser River at this location. The new bridge will be built to accommodate potential future rapid transit.</p> <p>There is not expected to be any appreciable change in queues on the approaches to the Oak Street Bridge and the Knight Street Bridge because of the Project. The Ministry's analysis shows that the majority of the traffic using the Tunnel (60 per cent) is destined to or from Richmond, and therefore not continuing on to Vancouver. Furthermore, traffic volumes over the Oak Street Bridge have been declining over the past five years and the City of Vancouver has recently indicated that Knight Street Bridge is experiencing a similar pattern. See Section 5.1 (Traffic) of the Application for more details</p> <p>Safety and maintaining traffic flow during construction are priorities. Careful traffic management is required to minimize potential effects on existing traffic operation during construction work and limit construction-related traffic congestion, disruptions and delays. A Construction Traffic Management Plan will be developed to provide full access for emergency and first responders at all times; keep the Highway 99 corridor and connecting interchanges operational to current levels of service during the day; maintain current count-flow system schedule during weekdays; maintain transit service; ensure access to existing roads, driveways, bus stops, and cycling and pedestrian networks; and ensure appropriate use of temporary relocations and detours of existing highway ramps, roads, driveways, bus, and cycling and pedestrian networks.</p> <p>Agricultural Use: The Ministry is working closely with the Agricultural Land Commission, Ministry of Agriculture, farmers in Richmond and Delta, and local municipalities regarding the effects on agriculture. In fact, the agricultural community generally supports the Project and its overall net benefits including better drainage through the construction of improved highway and farm field ditches, traffic congestion relief, and greater reliability in getting products to market with improved access across the highway and through the communities. Based on the Project's conceptual design, the Ministry anticipates no net loss of agricultural land. The Ministry has identified suitable land parcels that will be made available for agricultural use to offset the acquisitions of small portions of farmland for the Project. Project-related offsetting is expected to result in a net gain of land for agricultural use. Please see Section 5.4 (Agricultural Use) of the Application for more details.</p> <p>Other (Rationale): Public feedback received over two phases of consultation, conditions at the Tunnel, and growing traffic congestion, made it clear that improvements at this crossing are a priority. 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| | | | | <p>provincial highway corridor with recognized local, regional and provincial and national importance.</p> <p>As part of the initial planning for the Project, five potential crossing scenarios were considered and presented as part of Phase 2 Consultation “Exploring the Options” in 2013. Thorough assessment, including public consultation and technical analysis, was conducted for these scenarios). Each scenario was evaluated based on transportation efficiency, safety, agriculture, environment, economic considerations and social and community considerations. A new bridge in the existing corridor to replace the Tunnel was found to be the overall preferred scenario. The new bridge will reduce congestion, improve travel times and reliability, improve safety for all travellers, and provide new options for cyclists, pedestrians and transit users. See Section 1.0 (Overview of Proposed Project) for more details.</p> <p>Other (Tolling): The Province intends to fund the Project, at least in part, through user tolls. This is consistent with the provincial tolling guidelines. Tolling recognizes that those directly benefiting from the new infrastructure in terms of time savings and reliability should help pay for the Project. This ensures that the needed improvements can proceed now, rather than years in the future when improvements will be even more overdue.</p> <p>Construction is anticipated to begin in 2017, with the new bridge opening in 2022. This will allow considerable time for discussion about tolling for this crossing to ensure the toll will be as affordable as possible for motorists. At this point, the Ministry expects the toll on opening will be comparable to the toll rates on the Port Mann Bridge.</p> <p>The Ministry's analysis shows that during rush hours, traffic volumes on the new bridge likely will increase, as some people switch from the congested Alex Fraser Bridge to the new bridge to take advantage of the time savings and increased reliability. That is the experience from other tolled crossings, and is what happened on the Port Mann Bridge.</p> <p>Outside of rush hours, the Ministry anticipates that some people will divert to the Alex Fraser Bridge to avoid paying the toll, while others will use it at all times of the day because of the convenience. This could lead to a reduction in volumes on evenings and weekends on the new bridge.</p> |
| 5-Oct-16 | Anonymous | Vancouver, British Columbia | <p>Good evening,</p> <p>I would like to submit the following thoughts on the environmental implications of the GMTRP on behalf of HUB Cycling.</p> <p>HUB Cycling is a charitable organization that works to get more people cycling, more often. We strongly believe that the inclusion of protected bike lanes on the George Massey Tunnel Replacement, and the routes that lead to the area, would offer significant environmental benefits. One person cycling 10 km each way to work, rather than driving, saves approximately 1500 kg of greenhouse gas emissions each year, but in order for commuting by bike to be a popular choice a safe and effective cycling infrastructure needs to exist. Bikes use no fuel, reduce noise pollution and require less energy to construct than a car, therefore including protected bike lanes in the GMTR plans could lead to an increase in people cycling in this area and a decrease in emissions.</p> <p>The Province of BC has a Cycling Policy that commits to build provisions for cyclists on all new and upgraded provincial highways.</p> | <p>Thank you for your comments on cycling infrastructure.</p> <p>Other (Cycling Infrastructure): The Project has been working with the GMT Cycling Working Group to help identify key cycling routes within the region and corridor, and to review the Project’s proposed improvements in more detail. The Project is providing a new link for cyclists across the Fraser River with full connections to municipal networks that connect to regional destinations including Vancouver, BC Ferries, South Surrey/White Rock and the U.S. Border.</p> <p>The Ministry understands that work with the GMT Cycling Working Group will continue through the life of the Project, within the intent of the Cycling Policy. The suggestion for 24km of bikeway parallel to the highway has been discussed at the Working Group but given the needs and destinations for the corridor, it appears that connections to local community routes on either side of the new bridge will better fulfill local and regional need. In terms of funding, the cycling and pedestrian infrastructure on the new bridge and within the Highway 99 right-of-way and connections to community cycling routes will be fully funded by the ministry.</p> <p>The Project will take a significant step forward in “un-gapping” the cycling map in Richmond and Delta; however, completing the network is a long-term and shared</p> |

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| | | | <p>With upgrades to 24km of highway in this project, 24km of bikeway parallel to the highway are needed to provide people cycling with safe access to the many destinations this route serves.</p> <p>Many thanks</p> | <p>responsibility.</p> |