

FHWA-VT-EIS-77-03-LS FS
Burlington, Vermont
Southern Connector/Champlain Parkway
MEGC-M5000(1)

Record of Decision

A. Introduction/Background

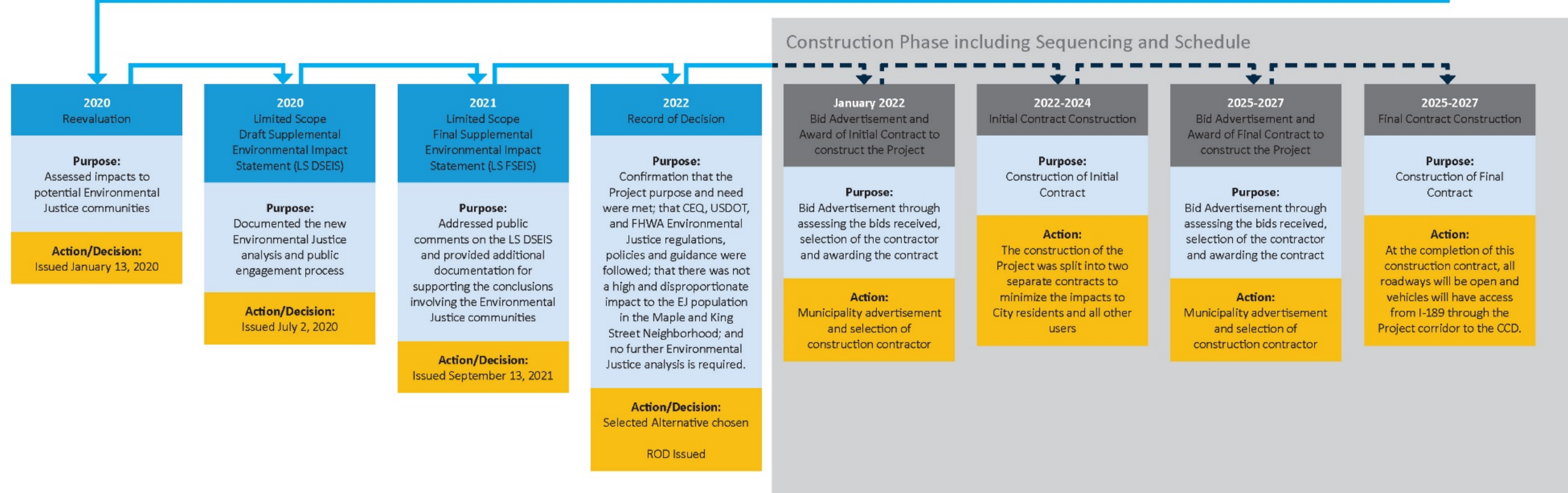
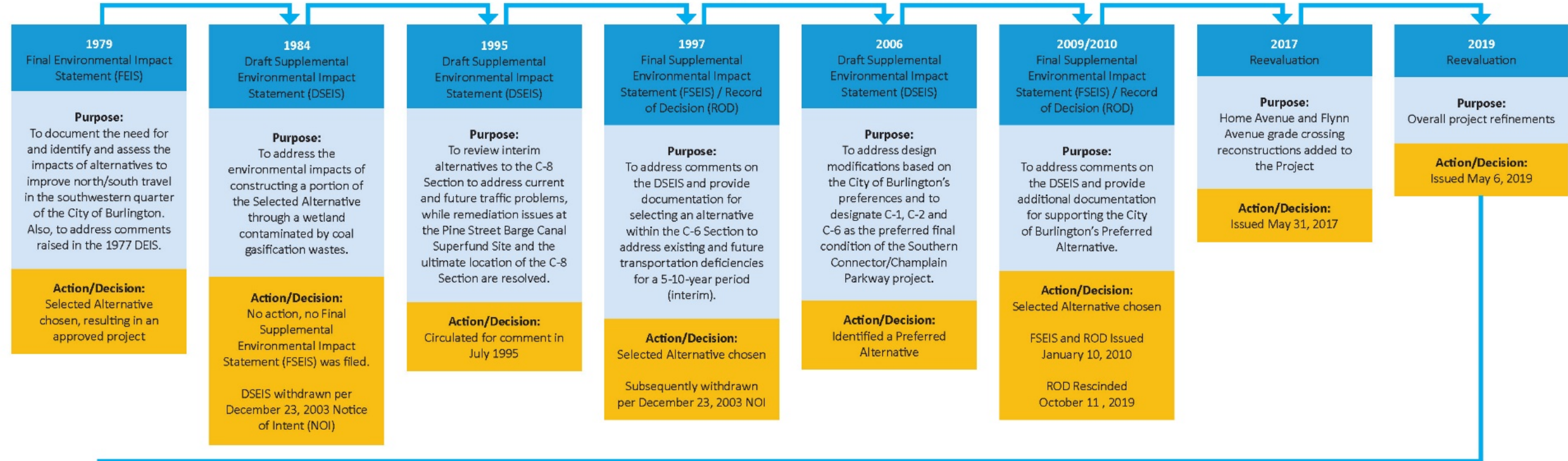
This Record of Decision (ROD) documents the Federal Highway Administration's (FHWA) decision to select Build Alternative 2 for the Southern Connector/Champlain Parkway project, consisting of Sections C-1, C-2, and C-6. The ROD also concludes the Project's recent Limited- Scope Supplemental National Environmental Policy Act (NEPA) review.

FHWA rescinded the 2010 ROD on October 11, 2019 in order to assess the proposed Project's impacts on environmental justice communities. FHWA voluntarily rescinded the Project's 2010 ROD and conducted an environmental reevaluation which resulted in a decision to conduct a limited-scope, supplemental NEPA review. The environmental analyses included in the limited scope supplemental EIS was focused on environmental justice, and FHWA prepared it in conformance with the EO 12898, U.S. DOT Order 5610.2(a) – updating the Department of Transportation's Final Environmental Justice Order effective May 2, 2012, the new FHWA Order 6640.23A effective June 14, 2012 (canceling FHWA Order 6640.23 FHWA Actions to Address Environmental Justice in Minority Populations and Low-Income Populations dated December 2, 1998) and the FHWA Guidance memorandum on Environmental Justice and NEPA dated December 16, 2011.

This ROD addresses the conclusions of the 2009 FSEIS, revives and updates the information and the environmental commitments in the rescinded 2010 ROD, incorporates the environmental analyses in the 2017, 2019 and 2020 environmental reevaluations, and concludes the 2020-2022 Limited-Scope Supplemental NEPA review focused on environmental justice analysis. The Southern Connector/Champlain Parkway project is a proposed transportation link located in the southwestern quadrant of the City of Burlington, Chittenden County, Vermont providing access between I-189, U.S. Route 7 (Shelburne Street) and the City Center District (CCD). Planning for this new highway construction project began in 1965. In 1979, a Final Environmental Impact Statement (FEIS) approved an alternative consisting of a highway on new alignment from I-189 to Battery Street. That alternative is referred to as the Null Alternative. At that time, the FHWA's NEPA regulations did not require a ROD. One section of the Null Alternative at the southerly limit of the project has been constructed, but never opened to traffic.

Project Development and Next Steps

NEPA Process and Key Milestone Submissions Including Actions and Decisions



Subsequent to the issuance of the 1979 FEIS, concerns regarding hazardous wastes in the Pine Street Barge Canal area arose. This area was to be traversed by a portion of the 1979 Selected Alternative. The Pine Street Barge Canal was later classified as a Superfund Site by the United States Environmental Protection Agency (EPA). In 1997, FHWA issued a ROD identifying a Selected Interim Alternative to route traffic around the Superfund Site until the 1979 Selected Alternative could be completed. Refer to the Project Development and Next Steps infographic on the previous page.

In 2002, the City of Burlington formalized their efforts to modify the 1979 Selected Alternative and the 1997 Selected Interim Alternative as a result of public comments and the City of Burlington's preferences to blend the roadway design into the surrounding neighborhoods. Specifically, the roadway typical section would be reduced from a four-lane roadway to a two-lane roadway. The City of Burlington and the Vermont Agency of Transportation (VTrans) also agreed to formally abandon the C-8 Section through the Pine Street Barge Canal Superfund Site (PSBC), and designate the C-1 Section, C-2 Section and C-6 Section as the permanent alignment for the Southern Connector/Champlain Parkway.

The Southern Connector/Champlain Parkway project involves the construction of approximately 2.4 miles of new and reconstructed roadway along the C-1 Section, C-2 Section and C-6 Section. Within the 0.6 mile C-1 Section, the Project includes lane reductions, shoulder reconfiguration and provides for one lane in each direction. The C-1 Section lane and shoulder reconfiguration involves a reduction in the cross-sectional width of the roadway, which includes replacing the majority of the existing concrete median barrier with a raised grassed median, removal of excess pavement, and the installation of lighting and landscaping amenities. A new shared-use path would also be constructed connecting Pine Street to Shelburne Street (U.S. Route 7) along the northern side of the C-1 Section.

The C-2 Section would commence on new alignment at the northern terminus of the C-1 Section, near Home Avenue, and extend northerly for a length of approximately 0.7 mile, as far as Lakeside Avenue.

The C-6 Section would route traffic around the PSBC utilizing the existing city-street network to provide access to the CCD. The C-6 Section would commence at the terminus of the C-2 Section at Lakeside Avenue and proceed easterly along Lakeside Avenue to Pine Street. It would then follow Pine Street north to the CCD via Build Alternative 2.

The FHWA in cooperation with VTrans and the City of Burlington released the Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) for the Champlain Parkway Project between Interstate 189 and Main Street in Burlington, Vermont. This LS FSEIS was limited in the scope of environmental analysis, and it only assessed the Project impacts on low-income and minority populations.

Based on the Executive Order (EO) 12898 Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations, and U.S. DOT Order 5610.2(a) – updating the Department of Transportation's Final Environmental Justice Order effective May 2, 2012, the updated FHWA Order 6640.23A effective June 14, 2012 (canceling FHWA Order 6640.23 FHWA Actions to Address Environmental Justice in Minority Populations and Low-Income Populations dated December 2, 1998), and the FHWA Guidance memorandum on Environmental Justice and NEPA dated December 16, 2011, it is FHWA's policy to identify and address any disproportionately high and adverse effects of FHWA actions on the health or environment of minority and low-income populations to the greatest extent practicable and permitted by law. The

LS FSEIS addressed a limited portion of the Project along the Pine Street section of the Selected Alternative, between Maple Street and Main Street. During the Limited-Scope Draft Supplemental Environmental Impact Statement (LS DSEIS) review of the Selected Alternative, FHWA identified minority populations between Maple Street and Main Street, and adjacent to Pine Street between Kilburn Street and Flynn Avenue. The LS DSEIS was issued for public and agency review on July 10, 2020. The comment period for the LS DSEIS closed on August 24, 2020.

Environmental justice considerations of the previously approved Burlington Southern Connector/Champlain Parkway project (Project) were considered. The 2021 Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) was limited in the scope of environmental analysis and it only assessed the project impacts on low -income and minority populations.

This addressed a limited portion of the Project along the Pine Street section of the Selected Alternative, between Maple Street and Main Street. During the Limited-Scope Draft Supplemental Environmental Impact Statement (LS DSEIS) review of the Selected Alternative, FHWA identified minority populations between Maple Street and Main Street, and adjacent to Pine Street between Kilburn Street and Flynn Avenue.

The 2021 Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) was limited in the scope of environmental analysis, and it only assessed the project impacts on low-income and minority populations, in accordance with EO 12898, U.S. DOT Order 5610.2(a), FHWA 2012 Order 6640.23A and FHWA's Guidance on Environmental Justice and NEPA. The LS FSEIS process involved various opportunities for public involvement including a targeted public outreach meeting resulting in public comments that have been addressed in the LS FSEIS.

Based on FHWA's independent review of the public comments and the environmental justice analysis, FHWA determined that once the environmental commitments have been fully implemented and adverse environmental impacts are mitigated, there will be no disproportionately high and adverse effects on any minority and/or low-income populations in accordance with the provisions of EO 12898 and FHWA Order 6640.23A.

B. Purpose and Need

The purpose of the Southern Connector/Champlain Parkway project is to improve access from the vicinity of the interchange of I-189 and U.S. Route 7 to the Burlington CCD and the downtown waterfront area; and to improve circulation, alleviate capacity overburdens, improve safety on local streets in the project study area and provide traffic relief in the southwestern quadrant of the City of Burlington.

The purpose of the Project is also to eliminate the disruption to local neighborhoods and separate the local and through-traffic. Truck traffic that is destined for the CCD or the industrial areas accessed from Home Avenue and Flynn Avenue would be directed onto the Southern Connector/Champlain Parkway and removed from the local street network. The proposed transportation corridor is expected to become the major routing for north-south through-traffic in the area. The reassignment of the majority of through-traffic to this route would reduce traffic volume levels along neighborhood streets and improve accessibility to adjacent neighborhood areas.

One of the most distinct deficiencies has been the evolution of a city-wide street pattern with few north/south travel routes that are continuous. Pine Street provides a continuous and direct route from the southern end of the City to the CCD. Beginning at its southern terminus with Queen City Park Road and continuing north to Flynn Avenue, Pine Street is a two-lane residential street. North of Flynn Avenue, Pine Street continues to be a two-lane roadway, but the character of the area changes. With the exception of the Jackson Terrace Apartments and the Champlain Elementary School, Pine Street is lined with commercial businesses and light industrial uses between Flynn Avenue and Kilburn Street. As Pine Street continues north to Main Street and the CCD, the area returns to a high-density residential neighborhood. Pine Street is highly desirable as an additional north-south route providing access between the CCD and points to the south. However, Pine Street has no direct connection to the two Principal Arterials, I-189 and U.S. Route 7. Pine Street is only accessible by traffic migrating to and from Shelburne Street over local, residential streets which include Home Avenue, Lyman Avenue, Ferguson Avenue, Flynn Avenue, Birchcliff Parkway, Locust Street and Howard Street. These local streets are not intended to, nor do they have the capacity to carry the volume of traffic which is diverted from arterial or collector systems.

In summary, the existing problems and deficiencies that have been identified are:

1. Congestion (including insufficient capacity to appropriately service traffic volumes and provide appropriate access);
2. Safety concerns created by vehicles utilizing roadways that functionally operate at a higher classification than intended, both along the minor arterials and in neighborhood areas which are acting as short-cuts; and
3. Mix of local and through-traffic in neighborhood areas (including truck traffic) created by a lack of a north/south arterial to access the CCD.

It should be noted that the alternatives considered in the 2009 Final Supplemental Environmental Impact Statement (FSEIS) were presented as the full-build scenario, not as an interim phase.

No changes were made to the Project's Purpose and Need or range of alternatives for the 2021 Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) as the LS FSEIS was limited to Environmental Justice analysis and targeted outreach to the Maple and King Street Neighborhood.

C. Decision

This ROD documents the following project decisions made by FHWA:

- The C-8 Section of the 1979 FEIS Selected Alternative has been abandoned due to environmental concerns associated with the PSBC.
- The Selected Alternative for this project is the further development of Build Alternative 2, consisting of the reconstruction of the previously built C-1 Section, construction of the C-2 Section as a new two-lane roadway on new alignment, and construction of the C-6 Section through the reconstruction of portions of Lakeside Avenue and Pine Street, as described in the 2009 FSEIS and 2017, 2019 and 2020 environmental reevaluations. Environmental justice considerations of the previously approved Burlington Southern

Connector/Champlain Parkway project (Project) were considered. The 2021 Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) was limited in the scope of environmental analysis, and it only assessed the project impacts on low-income and minority populations. Based on the Executive Order (EO) 12898 Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations, and U.S. DOT Order 5610.2(a) – updating the Department of Transportation’s Final Environmental Justice Order effective May 2, 2012, the updated FHWA Order 6640.23A effective June 14, 2012 (canceling FHWA Order 6640.23 FHWA Actions to Address Environmental Justice in Minority Populations and Low-Income Populations dated December 2, 1998), and the FHWA Guidance memorandum on Environmental Justice and NEPA dated December 16, 2011, it is FHWA’s policy to identify and address any disproportionately high and adverse effects of FHWA actions on the health or environment of minority and low-income populations to the greatest extent practicable and permitted by law. This addressed a limited portion of the Project along the Pine Street section of the Selected Alternative, between Maple Street and Main Street.

- During the Limited-Scope Draft Supplemental Environmental Impact Statement (LS DSEIS) review of the Selected Alternative, FHWA identified minority populations between Maple Street and Main Street, and adjacent to Pine Street between Kilburn Street and Flynn Avenue. The 2021 Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) was limited in the scope of environmental analysis, and it only assessed the project impacts on low-income and minority populations, in accordance with Executive Order (EO) 12898 Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations, and U.S. DOT Order 5610.2(a) – updating the Department of Transportation’s Final Environmental Justice Order effective May 2, 2012, the updated FHWA Order 6640.23A effective June 14, 2012 (canceling FHWA Order 6640.23 FHWA Actions to Address Environmental Justice in Minority Populations and Low-Income Populations dated December 2, 1998), and the FHWA Guidance memorandum on Environmental Justice and NEPA dated December 16, 2011. The LS FSEIS process involved various opportunities for public involvement including a targeted public outreach meeting resulting in public comments that have been addressed in the LS FSEIS.
- The Selected Alternative will be located within the current Pine Street right-of-way in the Maple and King Street Neighborhood, although temporary right-of-way access will be necessary to complete construction of sidewalks and other project amenities.
- While the Project is expected to have limited footprint and construction impacts in the Maple and King Street Neighborhood, the Project will increase traffic volumes by approximately 1,400 vehicles per day (vpd) (approximately 9%) on Pine Street north of Lakeside Avenue, including in the Maple and King Street Neighborhood, when compared with the No-Build condition. The increased traffic within the Maple and King Street Neighborhood was evaluated for adverse effects through an environmental justice analysis. It was determined, through this analysis, that the installed coordinated traffic signals will improve traffic operations and decrease congestion on Pine Street in the Maple and King Street Neighborhood. It was further determined that these upgrades will lead to smoother traffic flow, improved intersection operation, and decreased delay. They are expected to address any adverse effects resulting from the increase in traffic volumes. Additional benefits of the Project in the Maple and King Street Neighborhood are included below in Section I: Measures to Minimize Harm - Environmental Justice

- Based on this review, FHWA determined that once all environmental commitments have been fully implemented and the potential increase in vehicular traffic is mitigated as described above, there will be no disproportionately high and adverse effects on any minority and/or low-income populations in accordance with the provisions of EO 12898 and FHWA Order 6640.23A

D. Alternatives Considered

A wide range of alternatives have been considered for the Southern Connector/Champlain Parkway project since its inception. The logical termini for the project were determined to include the previously constructed C-1 Section to the south, and the CCD to the north.

Alternatives evaluated in the 1979 FEIS include:

1. No-Build Alternative;
2. The use of Alternate Travel Modes;
3. Pine Street Alternative - involving a widening of Pine Street to four-lanes, in addition to new location sections connecting I-189 and Battery Street; and
4. New Location Alternative, involving construction, primarily on new locations, connecting the I-189 interchange to Battery Street.

In the 1997 FSEIS, the following interim alternatives were evaluated to temporarily avoid the PSBC in order to provide improvements pending resolution of the issues associated with the Superfund Site:

1. No-Build Alternative;
2. Transportation Systems Management, Transportation Demand Management and Public Transportation (Transit/TSM/TDM);
3. Build Alternatives; consisting of the previously constructed C-1 Section, a transition to a two-lane facility along the C-2 Section and five variations of the interim C-6 Section, connecting the I-189 interchange to Battery Street.

Since the decision to abandon the interim solution, there have been several additional permanent alternatives considered and evaluated in the 2006 DSEIS and 2009 FSEIS. These include the following:

1. No-Build Alternative

The No-Build Alternative, as presented in the 2009 FSEIS, would consist of the existing street network in its present configuration. No further construction associated with the Southern Connector/Champlain Parkway would occur. The previously constructed C-1 Section would remain closed to traffic. The No-Build Alternative would not satisfy the purpose and need of the project.

2. Transportation Systems Management/Transportation Demand Management

As part of the development of this 2009 FSEIS, TSM options were considered as an alternative to the proposed project. The proposed project is focused on providing a system-wide improvement; therefore, TSM improvements alone would neither meet the future traffic demands anticipated within the study area, nor would they satisfy the purpose and need of the project.

TDM options were considered as alternatives to the proposed project action. There have been considerable efforts focused on TDM measures within the City of Burlington in the past. Analysis indicates that TDM measures alone are not sufficient to address the project purpose and need.

Public Transportation was also considered as an alternative to the proposed project action. Expanded public transportation is recommended to be pursued in the city, but is not, by itself, considered to be a reasonable solution to address the purpose and need of the project.

3. C-1 Section, C-2 Section and C-8 Section (four-lane) - Null Alternative

The 1979 FEIS presented a New Location Alternative as the Selected Alternative, since it provided the most satisfactory, safe, and expeditious movement of traffic, with the least adverse social, economic, cultural and natural resource impacts. This alternative consisted of the C-1 Section, the C-2 Section and the C-8 Section and was proposed to be a four-lane facility. This alternative is referred to as the Null Alternative in this 2009 FSEIS. The Null Alternative is not being evaluated for detailed study due to the substantial environmental impacts associated with this alternative. The City of Burlington and VTrans, with FHWA concurrence, cooperatively agreed to abandon the C-8 Section for the construction of the Southern Connector/Champlain Parkway project in March 2002 due to the impacts and complexities of environmental issues associated with the PSBC.

4. C-1 Section, C-2 Section and C-8 Section (two-lane)

A two-lane alternative following the same alignment as the Null Alternative, consisting of the C-1 Section, C-2 Section and C-8 Section, was considered during the development of the 2006 DSEIS. Although a two-lane roadway section would reduce the environmental impacts associated with the PSBC when compared to the four-lane alternative, it would not eliminate them. As stated previously, the City of Burlington and the VTrans cooperatively agreed to abandon the C-8 Section for the construction of the Southern Connector/Champlain Parkway project due to impacts and complexities of environmental processing associated with the PSBC. Therefore, this alternative was eliminated as an alternative for detailed study due of the substantial environmental impacts associated with this alternative.

5. C-1 Section, C-2 Section and C-6 Section – Battery Street Extension (four-lane)

This alternative consists of a roadway alignment similar to the 1997 Selected Interim Alternative and the Pine Street Alternative. The C-1 Section, C-2 Section and C-6 Section would be constructed as a four-lane roadway with turn-lanes, as needed. This alternative was initially considered for traffic comparison purposes to the Null

Alternative. Substantial right-of-way, environmental and social impacts along Pine Street would be necessary in order to provide a four-lane section. This alternative would connect Pine Street to Battery Street by constructing a new four-lane roadway through the existing Burlington rail yard facilities. The railroad operations that would be impacted by the new roadway would be mitigated. As a result of the substantial environmental, socio-economic and right-of-way impacts and issues associated with the relocation of the railroad operations, this alternative was not evaluated for detailed study.

6. C-1 Section, C-2 Section and C-6 Section – Battery Street Extension (two-lane)

This alternative consists of a roadway alignment similar to the 1997 Selected Interim Alternative. The C-1 Section, C-2 Section and C-6 Section would be constructed as a two-lane roadway with turn-lanes, as needed. This alternative would connect Pine Street to Battery Street by constructing a new two-lane roadway through the existing Burlington rail yard facilities. The railroad operations that would be impacted by the new roadway would be mitigated. This alternative would have similar environmental and right-of-way impacts compared to the four-lane roadway described above in the vicinity of the Burlington rail yard; however, the impacts along Pine Street would be less compared to the four-lane section. This alternative was evaluated for detailed study and was referred to as Build Alternative 1 in the 2009 FSEIS. However, Build Alternative 1 has been determined to an Adverse Effect under Section 106, uses Section 4(f) resources, displaces businesses and may potentially impact the EPA's remedy to the PSBC.

7. C-1 Section, C-2 Section and C-6 Section – Pine Street (four-lane)

This alternative would consist of the C-1 Section, C-2 Section and C-6 Section as a four-lane roadway with turn-lanes, as needed. The C-6 Section would utilize Pine Street from Lakeside Avenue to Main Street to provide access to the CCD. This alternative was initially considered for traffic comparison purposes to the Null Alternative. The widening of Pine Street to accommodate a four-lane section would eliminate parking on Pine Street and substantially reduce the existing green space. As a result of the substantial environmental, socio-economic and right-of-way impacts this alternative was not evaluated for detailed study.

8. C-1 Section, C-2 Section and C-6 Section – Pine Street (two-lane)

This alternative would consist of the C-1 Section, C-2 Section and C-6 Section as a two-lane roadway with turn-lanes, as needed. The C-6 Section would utilize Pine Street from Lakeside Avenue to Main Street to provide access to the CCD. The environmental, socio-economic and right-of-way impacts along Pine Street would be substantially less compared to the four-lane section. This alternative was evaluated for detailed study and was referred to as Build Alternative 2, the Preferred Alternative, in the 2009 FSEIS. This alternative is the Selected Alternative.

9. C-1 Section and C-2 Section Only (two-lane)

This alternative would consist of constructing the C-1 Section and the C-2 Section only. The C-1 Section would involve reconstruction of the I-189/Shelburne Street (U.S. Route 7) Interchange, and construction of the Southern Connector/Champlain Parkway to approximately Home Avenue. This portion of the project has been constructed as a four-lane facility. Within the limits of the previously built section, lane and shoulder

reconfiguration would provide one lane in each direction. Additional improvements would include replacing a majority of the existing concrete median barrier with a raised grass median, removal of excess pavement, lighting and landscaping to enhance the entrance to the City. A new shared-use path would also be constructed connecting Pine Street to Shelburne Street (U.S. Route 7) along the northern side of the C-1 Section. The C-2 Section would commence at the northern terminus of the C-1 Section, near Home Avenue, and extend northerly, as far as Lakeside Avenue. The C-2 Section would be a two-lane facility with dedicated turn lanes providing access to the existing local street network where permitted. At the terminus of the C-2 Section, traffic would be directed easterly on to the existing Lakeside Avenue to Pine Street. Traffic could then proceed north on the existing Pine Street to its intersection with Maple Street or divert to the local street system. Traffic could proceed westerly on Maple Street to Battery Street or continue northerly on Pine Street to Burlington's CCD. This alternative was not evaluated further because it would result in unacceptable levels of congestion during peak hours due to the increase in traffic volumes along the northern section of Pine Street, specifically in the area of Maple Street and King Street.

10. C-1 Section, C-2 Section and geometric improvements along Pine Street (two-lane)

This alternative would consist of constructing the C-1 Section and the C-2 Section and providing geometric improvements along Pine Street. The C-1 Section would involve reconstruction of the I-189/Shelburne Street (U.S. Route 7) interchange, and construction of the Southern Connector/Champlain Parkway to approximately Home Avenue. This portion of the project has been constructed as a four-lane facility. Within the limits of the previously built section, lane and shoulder reconfiguration would provide one lane in each direction. Additional improvements would include replacing a majority of the existing concrete median barrier with a raised grass median, removal of excess pavement, lighting and landscaping to enhance the entrance to the city. A new shared-use path would also be constructed connecting Pine Street to Shelburne Street (U.S. Route 7) along the northern side of the C-1 Section. The C-2 Section would commence at the northern terminus of the C-1 Section, near Home Avenue, and extend northerly, as far as Lakeside Avenue. The C-2 Section would be a two-lane facility with dedicated turn lanes providing access to the existing local street network where permitted. At the terminus of the C-2 Section, traffic would be directed easterly onto Lakeside Avenue to Pine Street. Traffic could then proceed north on Pine Street to Burlington's CCD. Pine Street would be reconstructed as a two-lane roadway with dedicated bicycle lanes, sidewalks and turn-lanes at intersections, where required. The addition of turn-lanes would require additional roadway width than currently exists. This would result in property impacts and acquisitions along Pine Street. A parking lane would be provided along Pine Street where feasible; however, on-street parking between Maple Street and Main Street would not be provided to limit impacts to adjacent residential buildings. As a result of substantial socio-economic issues associated with the loss of on-street parking along Pine Street in the vicinity of Maple Street, King Street and Main Street; this alternative is not being evaluated further at this time. Consideration was also given to expanding the geometric improvements to include widening the Pine Street pavement to provide on-street parking between Maple Street and Main Street as well as the additional pavement width for the required turn lanes. This scenario is not being evaluated further at this time because it would create substantial right-of-way impacts, socio-economic impacts and historical/archaeological impacts.

11. C-1 Section, C-2 Section and C-6 Section with one-way street patterns.

This alternative would consist of constructing the C-1 Section, C-2 Section and reconstructing Pine Street from Lakeside Avenue to Pine Place. This alternative would require the construction of a new roadway from the southern terminus of South Champlain Street to Pine Street in the vicinity of Pine Place. This section of roadway is referred to as the South Champlain Street Extension. This new alignment would almost parallel the Battery Street Extension. Pine Street would be one-way northbound between Kilburn Street and Main Street. South Champlain Street would be one-way southbound between Main Street and Pine Street. Maple Street would be one-way eastbound between Battery Street and Pine Street. King Street would be one-way westbound between Pine Street and Battery Street. The need to provide only one travel lane within the existing curblines would allow for dedicated bicycle lanes and on-street parking lanes. The South Champlain Street Extension would impact Curtis Lumber's (formerly Gregory Supply) current business operations and facility located on Pine Street. The former Burlington Street Department property would also be impacted. This alternative is not being evaluated further due to the right-of-way, socio-economic, Section 4(f) and rail yard impacts.

All of the above alternatives were described in more detail in Section 2.2 Scoping of Alternatives in the 2009 FSEIS.

The 2017 environmental reevaluation described design upgrades to the existing rail crossings at Home Avenue and Flynn Avenue. These improvements are well outside of the Maple and King Street Neighborhood. These modifications and changes in affected environment generally resulted in minor changes in project impacts and proposed mitigation. The Purpose and Need for the project remained valid and unchanged.

The 2019 environmental reevaluation described changes to the project design, project impacts, and proposed mitigation that had happened subsequent to the 2009 FSEIS. A section by section of the changes were as follows:

C-2 Section

- The Grocery Spur tracks will be removed to eliminate the at-grade crossing.

C-6 Section

- The addition of a shared-use path along the western side of Pine Street between Lakeside Avenue and Kilburn Street.
- Traffic calming features on Pine Street including curb bump-outs and pedestrian actuated rectangular rapid flashing beacons at mid-block crosswalks were added.
- On-street bike lanes between Lakeside Avenue and Locust Street, and Kilburn Street and Maple Street will be added.
 - Between Lakeside Avenue and Locust Street, the design will accommodate a 13-foot southbound combined bike/turn lane, one 11-foot travel lane in each direction, and a five-foot bike lane in the northbound direction.
 - Between Locust Street and Kilburn Street, and between Maple Street and Main Street, the design will feature a two-foot shoulder and 11-foot shared lane, a four-foot painted parking lane buffer and a seven-foot parking lane.

- Between Kilburn Street and Maple Street, the design consists of an 11-foot travel lane, 1.5-foot bike lane buffer and 5-foot bike lane in both directions.
- The Pine Street Rail Spur will be partially removed.
- The proposed shared-use path has been relocated from the southern side to the northern side of Lakeside Avenue to connect to the proposed share-use path on Pine Street.
- The City of Burlington received VTrans' approval to underground overhead utilities on Lakeside Avenue.

These design modifications and changes in affected environment generally resulted in minor changes in project impacts and proposed mitigation. The Purpose and Need for the project remained valid and unchanged.

The 2020 environmental reevaluation described the results of the Environmental Justice screening completed within the study area. Although it was determined that none of the study area census tracts meet the criteria for low-income populations, Census Tract 10 was identified as a minority population given the substantially higher percentage of minority residents than the City or county. The residential portion of this census tract that is within the study area comprises much of the Maple and King Street neighborhood.

The City, FHWA, and VTrans assessed whether all the Project's environmental impacts were adequately considered and if any of the impacts may rose to the level of significance. Based on this assessment, it was determined that all other environmental resource impacts summarized in the 2009 FSEIS have been reassessed in the 2017 environmental reevaluation associated with the rail crossings and the 2019 environmental reevaluation of the overall Parkway project and the conclusions included in each of those environmental reevaluations remain valid.

However, because there was a new standard of practice related to EJ analysis that wasn't applicable at the time the 2009 FSEIS was prepared, and because of the demographic changes in portions of the project study area, VTrans recommended that the preparation of a Limited-Scope Supplemental EIS focused on EJ considerations in the Maple and King Street neighborhood.

There were no design modifications in the 2020 environmental reevaluation. The Purpose and Need for the Project remained valid and unchanged.

Summary of the Build Alternatives Selected for Further Study

Build Alternative 1 and Build Alternative 2 were carried forward for detailed study in the 2009 FSEIS. Both Build Alternatives are described in detail in the 2009 FSEIS and the environmental analyses in the 2017 and 2019 environmental reevaluations. Build Alternative 2 is described in this ROD first, because it remains the Selected Alternative.

Build Alternative 2 – Selected Alternative

Build Alternative 2 (Selected Alternative) consists of a roadway alignment along the C-1 Section, C-2 Section and C-6 Section that will be constructed as a two-lane roadway with turn-lanes, as

needed. This alternative connects I-189/U.S. Route 7 (Shelburne Street) to Battery Street. The three sections of Build Alternative 2 are described below:

C-1 Section:

The C-1 Section will consist of reconstruction of the I-189/Shelburne Street (U.S. Route 7) interchange, and construction of the Southern Connector/Champlain Parkway to approximately Home Avenue. This portion of the project has been previously constructed as a four-lane facility. Within the limits of the previously built section, lane and shoulder reconfiguration will reduce the roadway cross-section to one lane in each direction. Additional improvements will include replacing a majority of the existing concrete median barrier with a raised grass median, removal of excess pavement, inclusion of lighting and landscaping to enhance the entrance to the City of Burlington. This section of the project will provide a transition between the interstate and the city street system. A new shared-use path will also be constructed connecting Pine Street to Shelburne Street (U.S. Route 7) along the northern side of the C-1 Section.

C-2 Section:

The C-2 Section will commence at the northern terminus of the C-1 Section, near Home Avenue, and extend northerly on new location for approximately 0.7 mile, as far as Lakeside Avenue. A four-lane concept for this portion of the project was previously approved and designed, and right of way that corresponded to that design has been acquired. The C-2 Section was never constructed. Similar to the C-1 Section, modifications have been proposed for the C-2 Section design subsequent to the 1979 FEIS. The C-2 Section will be a two-lane facility with dedicated turn lanes at the local street at-grade intersections where permitted. A new shared-use path will also be constructed along the eastern side of the C-2 Section.

C-6 Section:

Build Alternative 2 will reconstruct a portion of Lakeside Avenue, from the terminus of the C-2 Section to its intersection with Pine Street. Build Alternative 2 will proceed north along Pine Street from Lakeside Avenue to its intersection with Main Street. Build Alternative 2 will provide direct access to Burlington's CCD.

Pine Street (Lakeside Avenue to Pine Place):

Build Alternative 2 will consist of cold planing and resurfacing the existing Pine Street pavement, drainage improvements, new curbing, new concrete sidewalk, and construction of a new shared-use path between Lakeside Avenue and Pine Place on the western side. Between Lakeside Avenue and Locust Street, the design will accommodate a 13-foot southbound combined bike/turn lane, one 11-foot travel lane in each direction, and a five-foot bike lane in the northbound direction. Between Locust Street and Pine Place, the design will feature a two-foot shoulder and 11-foot shared lane in the southbound direction while the northbound direction will consist of an 11-foot shared lane, a four-foot painted parking lane buffer and a seven-foot parking lane. A continuous sidewalk will also be provided along the eastern side of Pine Street from Lakeside Avenue to Pine Place. Traffic calming features including curb bump-outs; raised intersections at Howard Street and Marble Avenue are also incorporated into the design.

Build Alternative 2 will not provide relocated utilities unless conflicts with proposed features occur; therefore, the existing overhead utilities located along Pine Street will remain in their current location.

Pine Place to the CCD:

Build Alternative 2 will continue north along existing Pine Street to the intersection with Main Street providing the preferred connection to the CCD.

Build Alternative 2 will consist of cold planing and resurfacing the existing Pine Street pavement, drainage improvements, new curbing, new concrete sidewalk, and construction of a new shared-use path between Pine Place and Kilburn Street on the western side. Between Pine Place and Kilburn Street, and between Maple Street and Main Street, the design will feature a two-foot shoulder and 11-foot shared lane in the southbound direction while the northbound direction will consist of an 11-foot shared lane, a four-foot painted parking lane buffer and a seven-foot parking lane. Between Kilburn Street and Maple Street, the design consists of an 11-foot travel lane, 1.5-foot bike lane buffer and 5-foot bike lane in both directions. The project will extend along Pine Street up to and including the Main Street intersection.

A continuous sidewalk will also be provided along the eastern side of Pine Street from Pine Place to Main Street and along the western side of Pine Street from the terminus of the shared-use path at Kilburn Street to Main Street. Traffic calming features including curb bump-outs and a raised intersection at Kilburn Street are also incorporated into the design.

Right-of-way acquisitions are anticipated to be limited to properties adjacent to Pine Street's intersections with Maple Street and King Street. These potential acquisitions are associated with the installation of new traffic signals at these two intersections and any utility relocation required to accommodate these new traffic signals. Temporary easements are anticipated to complete the construction along Pine Street. Build Alternative 2 will not result in any impact to the State of Vermont's existing rail yard, the former Burlington Street Department property or Curtis Lumber (formerly Gregory Supply Company).

Given the limited focus of the 2021 LS FSEIS, only the Selected Alternative was evaluated in the 2021 document. The 2021 LS FSEIS was focused on environmental justice (EJ) analysis, not the project design, so no other alternatives were evaluated. Considering the range of uses and competing needs occurring throughout the entire project corridor, Build Alternative 2 including the design modifications to pedestrian and bicycle accommodations as summarized in the 2019 environmental reevaluation is the Selected Alternative because it provides an appropriate balance of design elements that facilitate this range of uses while minimizing impacts to the affected environment resulting in a Section 4(f) de minimis determination. Build Alternative 2 continues to satisfy the Project's purpose and need.

Build Alternative 1 (Dismissed from Further Study)

Under Build Alternative 1, the C-1 Section and C-2 Section would have been identical to Build Alternative 2. The C-6 Section would have been similar to Build Alternative 2 until the alignment

reached the vicinity of Pine Place. Build Alternative 1 would have proceeded northwesterly on new location from Pine Street to the intersection of Battery Street and Maple Street. This connection is referred to as the Battery Street Extension. From the intersection of Battery Street and Maple Street, Build Alternative 1 would have proceeded north along existing Battery Street to its intersection with Main Street, providing a connection to the CCD.

This alternative departs from Pine Street, just north of the Pine Place intersection in the vicinity of the former Burlington Street Department property, and proceeds northwesterly, traversing the former City of Burlington Street Department property, Curtis Lumber's (formerly Gregory Supply Company) property and the VTR rail yard. The typical roadway section in this area would consist of two 12-foot travel lanes with two-foot shoulders, curbing and a sidewalk along the eastern side of the roadway. Right-of-way acquisitions would be required for the construction of this alternative. Build Alternative 1 would require the demolition of approximately one-quarter of the former Burlington Street Department building, a Section 4(f) resource. The extent of this demolition would be determined upon the completion of a feasibility assessment of this structure. This alternative would also relocate the existing rail spur to the west of the proposed Battery Street Extension; therefore, no railroad grade crossings would be created along this portion of the proposed roadway. As part of Build Alternative 1, a rail yard mitigation plan would need to be included for impacts to portions of VTR's operations within the State of Vermont's existing rail yard. This rail yard mitigation was discussed further in Section 4.2.2 of the 2009 FSEIS.

Improvements along Battery Street from Maple Street to Main Street would also be required. The typical section for Battery Street in this area would consist of two travel lanes with left-turn lanes at the intersections and parking lanes on both sides of the street. Approximately a seven-foot shift in the eastern curblin between Maple Street and King Street would be required to accommodate the additional parking lane. This would create a reduction in green space for this entire area; however, no other substantial features are affected as a result of this change. The western curblin would remain unchanged. Currently, Battery Street, south of Maple Street ends at the rail yard with no clear physical definition. When the proposed improvement is in place, it would be a defined street with curbs and pavement adjacent to the rail yard. A new traffic signal is proposed at the intersection of Maple Street and Battery Street. No additional right-of-way acquisitions are anticipated for construction in this area.

E. Basis for the Decision

The No-Build Alternative will not satisfy the purpose and need of the Project.

Build Alternative 1 will result in an Adverse Effect under Section 106, would require the use of Section 4(f) resources, would displace businesses and may potentially impact the EPA's remedy to the PSBC.

The selection of Build Alternative 2 for further development is based on the following:

- Build Alternative 2 meets the Purpose and Need
- Build Alternative 2 minimizes Section 106 and Section 4(f) impacts
- Build Alternative 2 minimizes potential impacts to the PSBC and related properties
- Build Alternative 2 avoids impacts to the rail yard
- Build Alternative 2 minimizes the construction costs compared to Build Alternative 1.
- Once project upgrades have been implemented and potential adverse impacts are mitigated, there will be no disproportionately high and adverse effects on any minority

and/or low-income populations in accordance with the provisions of EO 12898 and FHWA Order 6640.23A.

Based on the above, FHWA has determined that Build Alternative 2 is the environmentally preferable alternative in accordance with 40 CFR 1505.2(b).

Considering the range of uses and competing needs occurring throughout the entire project corridor, Build Alternative 2 including the design modifications to pedestrian and bicycle accommodations as summarized in the 2019 environmental reevaluation is the Selected Alternative because it provides an appropriate balance of design elements that facilitate this range of uses while minimizing impacts to the affected environment resulting in a Section 4(f) de minimis determination. Given the limited focus of the 2021 LS FSEIS, only the Selected Alternative was evaluated in the 2021 document. The 2021 LS FSEIS was focused on environmental justice (EJ) analysis, not the project design, so no other alternatives were evaluated.

F. Environmental Justice

The FHWA in cooperation with VTrans and the City of Burlington released the Limited-Scope Final Supplemental Environmental Impact Statement (LS FSEIS) for the Champlain Parkway project between Interstate 189 and Main Street in Burlington, Vermont. This LS FSEIS was limited in the scope of environmental analysis, and it only assessed the project impacts on low-income and minority populations. Based on the Executive Order (EO) 12898 Federal Actions to Address Environmental Justice in Minority Populations and Low-Income Populations, and FHWA's December 16, 2011 Guidance on Environmental Justice and NEPA, it is FHWA's policy to identify and address any disproportionately high and adverse effects of FHWA actions on the health or environment of minority and low-income populations to the greatest extent practicable and permitted by law. The LS FSEIS addressed a limited portion of the Project along the Pine Street section of the Selected Alternative, between Maple Street and Main Street. During the Limited-Scope Draft Supplemental Environmental Impact Statement (LS DSEIS) review of the Selected Alternative, FHWA identified minority populations between Maple Street and Main Street, and adjacent to Pine Street between Kilburn Street and Flynn Avenue. The LS DSEIS was issued for public and agency review on July 10, 2020. The comment period for the LS DSEIS closed on August 24, 2020.

The City, FHWA, and VTrans provided various opportunities for public involvement and conducted a targeted public outreach meeting at the Contois Auditorium located in the Burlington City Hall on September 26, 2019. To ensure meaningful engagement of the minority community, the meeting announcement was translated into Bhutanese-Nepali, Swahili, Somali (Mai-Mai), Burmese, and French. Flyers were mailed directly to residents and City staff went door-to-door distributing flyers. The targeted public outreach meeting was hosted at City Hall, a well-known public landmark that is ADA accessible and within walking distance (i.e., two blocks or approximately 0.3 mile) of the Maple and King Street Neighborhood. The neighborhood gathering at the King Street Center on October 7, 2019 was useful for promoting additional dialogue with concerned citizens, stakeholders, and the Project team.

FHWA, VTrans, and the City of Burlington followed FHWA, federal, state, and local guidance as well as Vermont's H.681 legislation amending the Vermont Open Meeting Law (1 V.S.A. §314) in conducting the public outreach for the Limited-Scope Draft Supplemental Environmental Impact Statement (LS DSEIS). To provide further targeted public outreach, prior to the July 29, 2020 public hearing on the LS DSEIS, direct mailings were sent to approximately 800 residents

in the Maple and King Street Neighborhood and Census Tract 8, Block Group 1. Outreach materials, including information sheets and narrated videos, were made available on the Project's website in English, Burmese, French, Nepali, Somali, and Swahili in addition to the public hearing.

FHWA independently reviewed and analyzed all public comments including the verbal comments provided at the public hearing and written comments submitted via regular mail, email, or through the project website and collaborated with the appropriate federal, state, and local government agencies prior to responding to the comments. FHWA found that no additions or changes to the June 2020 LS DSEIS were required in response to the public comments.

Based on the review performed during the LS DSEIS and LS FSEIS process which involved various opportunities for public involvement including a targeted public outreach meeting resulting in public comments that have been addressed in the LS FSEIS, FHWA has determined that once project upgrades have been implemented and potential adverse impacts are mitigated, there will be no disproportionately high and adverse effects on any minority and/or low-income populations. These project upgrades involve Work Zone Safety and Mobility features including construction phasing and scheduling, temporary pedestrian and bicyclist traffic control plan, time of day restrictions, and Public Involvement Plan (PIP). Therefore, in accordance with the provisions of EO 12898 and FHWA Based Order 6640.23A no further environmental justice analysis is required.

G. Section 4(f) Analysis

It has been determined that the Section 106 process of the National Historic Preservation Act will result in a determination of "no adverse effect" for Build Alternative 2. FHWA has coordinated with VTrans Historic Preservation Officer (HPO) regarding their intention to make a de minimis determination for Build Alternative 2. The 2006 DSEIS defined the uses of Section 4(f) property resulting from Build Alternative 2. The 2006 DSEIS was circulated for public comment from November 1, 2006 through December 29, 2006.

Due to the minimal impacts to Section 4(f) resources, which will occur under the Selected Alternative, Section 4(f) requirements are satisfied by the de minimis provisions of SAFETEA-LU (dated August 10, 2005). For historic sites, a de minimis impact means that FHWA has determined (in accordance with 36 CFR Part 800) that either no historic property is affected by the project or that the project will have "no adverse effect" on the historic property. In accordance with 23 CFR 774, Build Alternative 2 satisfies the de minimis criteria; therefore, no avoidance alternative analysis is required. Measures to minimize harm have been satisfied for the purposes of Section 106 analysis.

The Selected Alternative will not require the use of most Section 4(f) resources with the exception of the Battery Street Historic District. Pine Street, from approximately Maple Street to just south of Main Street is located within the Battery Street Historic District. Build Alternative 2 will primarily utilize the City's existing right-of-way; however, it is anticipated that the traffic signal installations proposed at the intersections of Pine Street at Maple Street and Pine Street at King Street will require the acquisition of a minor strip of land from the adjacent contributing structures located within the Battery Street Historic District.

As a result of FHWA's Section 4(f) de minimis determination for Build Alternative 2, the requirement to develop measures to minimize harm is satisfied by incorporation of the mitigation measures developed under the Section 106 process.

A detailed description of the Section 4(f) resources in the study area is provided in Section 5.4 of the 2009 FSEIS.

Since the completion of the 2009 FSEIS and the issuance of the 2010 ROD, there have been some minor revisions to the Project. A Section 106 Amendment/ No Adverse Effect was issued on April 6, 2017 and an additional Section 4(f) de minimis determination was issued on May 5, 2017. This additional site and records review was performed to consider the potential consequences of reconstructing the Home Avenue and Flynn Avenue grade crossings which were added to the Project's scope. Both determinations were confirmed by VTrans HPO and FHWA. As such, the original ROD remains unchanged for the Section 4(f) analysis and determination.

H. Executive Order 11990 – Protection of Wetlands

Based on the analysis in the 2009 FSEIS, FHWA has determined that all practicable alternatives to new construction in wetlands have been considered and that all practicable means have been taken to minimize harm to wetlands resulting from construction of the Selected Alternative.

I. Measures to Minimize Harm - Environmental Justice

The Selected Alternative will be located within the current Pine Street right-of-way in the Maple and King Street Neighborhood, although temporary right-of-way access will be necessary to complete construction of sidewalks and other project amenities.

While the Project is expected to have limited footprint and construction impacts in the Maple and King Street Neighborhood, the Project will increase traffic volumes by approximately 1,400 vehicles per day (vpd) (approximately 9%) on Pine Street north of Lakeside Avenue, including in the Maple and King Street Neighborhood, when compared with the No-Build condition. The increased traffic within the Maple and King Street Neighborhood was evaluated for adverse effects through an environmental justice analysis. It was determined, through this analysis, that the installed coordinated traffic signals will improve traffic operations and decrease congestion on Pine Street in the Maple and King Street Neighborhood. It was further determined that these upgrades will lead to smoother traffic flow, improved intersection operation, and decreased delay. They are expected to address any adverse effects resulting from the increase in traffic volumes.

To minimize project impacts within the Maple and King Street Neighborhood, Pine Street will not be widened. Instead, all improvements will occur within the existing right-of-way, except temporary easements necessary to complete the work. The Project will improve traffic operations compared to the No-Build condition and will address increased traffic flow and overall intersection operations. The installation of traffic signals at the Maple and King Street intersections with Pine Street will be coordinated with an upgraded signal at Main Street and Pine Street, resulting in smoother traffic flow, improved intersection operations, and decreased delay.

The new and upgraded signals will include pedestrian phases with countdown timers to provide safer crossing opportunities for pedestrians, which include WALK signals in an exclusive phase where all vehicles are stopped. This operational improvement will improve intersection safety for pedestrians utilizing these intersections and overall traffic flow for motorists. Curb extensions and crosswalks will be constructed at several intersections as part of the Project and will further improve pedestrian safety by increasing visibility and reducing the crossing distance. These Project improvements will be particularly beneficial to pedestrians traveling in groups with children, the elderly, and the disabled. Mobility and access for pedestrians and bicyclists will be

improved by providing new continuous ADA-compliant sidewalk and ramps along both sides of Pine Street. These new accommodations will improve pedestrian accessibility and safety compared to the No-Build condition and will mitigate the negative effect of the Project's traffic increases.

These new and reconstructed sidewalks, combined with a new shared-use path to the south and enhanced on-road bicycle treatments, will expand the network and quality of facilities available to pedestrians and bicyclists having origins/destinations within the Maple and King Street Neighborhood and the City at large. These new facilities will better accommodate pedestrian and bicyclist safety and movement, ADA compliance/accessibility and on-street parking in and around the community.

Construction of the Project in the Maple and King Street Neighborhood will involve temporary impacts to normal traffic, pedestrian, and bicycle patterns due to paving and temporary sidewalk closures with detours to construct the new curbing, sidewalk, and traffic signal equipment. Concerns and comments regarding construction and work zone impacts were raised from members of the Maple and King Street Neighborhood during the public outreach events. These concerns were noted and will be mitigated to the greatest extent possible during the construction phase for the Project.

As illustrated in Table 4-3 and in the body of the LS FSEIS, identified neighborhoods within the Study Area will share both the Project's improvements and some adverse impacts. After additional review of the proposed improvements and public involvement engagement, the Project will not cause disproportionately high and adverse effects on any minority populations in the Maple and King Street Neighborhood in accordance with the provisions of EO 12898 and FHWA Order 6640.23A. No further environmental justice analysis is required.

All practicable measures to minimize harm have been implemented for the Selected Alternative. Previous commitments from the 2009 FSEIS, and 2017, 2019 and 2020 environmental reevaluations, and the 2020-2022 Limited-Scope Supplemental NEPA review focused on environmental justice analysis relevant to the Selected Alternative have been included. The following summarizes the mitigation measures and commitments that have been made by FHWA, VTrans and the City of Burlington for the Selected Alternative.

J. Measures to Minimize Harm - Other Affected Environment

All practicable measures to avoid and minimize harm have been implemented for the Selected Alternative. Previous commitments from the 2009 FSEIS, and the environmental analyses in the 2017, 2019 and 2020 environmental reevaluations, and the 2020-2022 Limited-Scope Supplemental NEPA review focused on environmental justice analysis relevant to the Selected Alternative have been included and will be implemented. The following summarizes the mitigation measures and commitments that will be implemented and have been made by FHWA, VTrans and the City of Burlington for the Selected Alternative.

Traffic Operations

- The Selected Alternative does not result in negative impacts to traffic compared to the 2028 No-Build Alternative.
- While the Project is expected to have limited footprint and construction impacts in the Maple and King Street Neighborhood, the Project will increase traffic volumes by

approximately 1,400 vehicles per day (vpd) (approximately 9%) on Pine Street north of Lakeside Avenue, including in the Maple and King Street Neighborhood, when compared with the No-Build condition. The increased traffic within the Maple and King Street Neighborhood was evaluated for adverse effects through an environmental justice analysis. It was determined, through this analysis, that the installed coordinated traffic signals will improve traffic operations and decrease congestion on Pine Street in the Maple and King Street Neighborhood. It was further determined that these upgrades will lead to smoother traffic flow, improved intersection operation, and decreased delay. They are expected to address any adverse effects resulting from the increase in traffic volumes.

- The average queues during peak hours will be accommodated within the existing block spacing between adjacent intersections. 95th percentile design queues will be longer and may cause periodic additional delay at adjacent intersections, but the Pine Street queues will still be less than would occur without the Project's improvements. It is noted however, that the 95th percentile queues along Maple Street will generally be longer than in the No-Build condition. This is because of the priority given in the signal timing to favor Pine Street traffic movement consistent with the arterial function of this roadway.
- One of the characteristics of the current AWSC is that it does not differentiate between the functional roles of the intersecting streets and therefore cannot assign priority to Pine Street which is an arterial roadway whose primary function is traffic mobility, and which is also intended to carry more traffic than other area streets such as Maple Street or King Street. The process of right-of-way transfer between pedestrians at the crosswalks and vehicle traffic is also less efficient with the AWSC operations under higher volume conditions such as exist because of added decision time used by pedestrians to confirm that it is safe to cross and then for drivers to reestablish who goes next when there is vehicle demand on more than one approach following the pedestrian crossing. This process of right-of-way assignment also induces through traffic to divert to Maple Street and King Street rather than continuing along Pine Street to access the CCD.
- The Project will improve traffic mobility along Pine Street in the Maple Street and King Street area of the Project by signalizing the Pine Street/Maple Street and Pine Street/King Street intersections and coordinating the operations of these two intersections with the existing signal at the intersection of Pine Street and Main Street. This improvement will promote smoother traffic flow along Pine Street by reducing vehicle delays and reducing the length of queues. The signals will also provide safer crossing opportunities for pedestrians by providing an exclusive pedestrian phase where all vehicles are stopped.
- The signal operations will also promote a more stable and uniform travel speed through the corridor, as the signals will be timed to provide for coordinated movement through the three signals on Pine Street from Maple Street to Main Street at the City's statutory speed limit of 25 mph or lower. This reduction of "stop-and-go" traffic and reduction of the time spent idling at the intersections are expected to have a corresponding reduction in traffic noise. These improvements will also reduce vehicle emissions and contribute to improved air quality in the corridor.
- The Selected Alternative design treatments have been incorporated to mitigate any potential adverse effects of the changes in traffic volumes and patterns (in the Maple and King Street Neighborhood), which include traffic calming features, improved pedestrian and bicycle accommodations, and streetscape features. Traffic calming measures will be

included to alert drivers to pedestrians along Pine Street and improve pedestrian and bicycle safety throughout the Project, including in the Maple and King Street Neighborhood.

- The design for Pine Street, within the Maple and King Street Neighborhood, will not require widening. Traffic volumes on Pine Street in the Maple and King Street Neighborhood will increase, when compared with the No-Build Alternative. However, the installation of traffic signals at the Maple and King Street intersections with Pine Street will be coordinated with the existing signals at Main Street and Pine Street, resulting in smoother traffic flow, improved intersection operation, and decreased delay.
- The Project will improve traffic safety in the Maple and King Street Neighborhood and on the segment of Pine Street between Maple Street and King Street. This project will also improve traffic safety in and around the Champlain Elementary School area which is located on Pine Street just south of the Maple and King Street community.
- The predominant types of crashes in the Maple Street-to-Main Street segment of Pine Street were rear-end and no-turn broadside events at the Maple Street and King Street intersections with Pine Street. These two crash types accounted for about 50% of the crashes in this area. This is consistent with the pattern that was identified in the assessment of the 2006-2010 data for the Act 250 permit process. While the Project will increase traffic volumes along this section of Pine Street, the geometric and signal control improvements proposed for this area will promote more orderly progression of traffic movement and more positive assignments of travel rights of way, which should help reduce these types of crashes.
- The new traffic and pedestrian signals will provide safer crossing for pedestrians using walk signals in an exclusive phase where all vehicles are stopped. Providing an exclusive pedestrian phase improves vehicular traffic flow because pedestrians know to wait for a cross signal instead of causing traffic to stop each time a pedestrian arrives at the crosswalk.
- VTrans and the City of Burlington will coordinate all other on-going and future roadway projects in the vicinity of the Champlain Parkway Project to avoid, minimize and mitigate traffic impacts to the neighboring communities, including the environmental justice communities identified in the limited-scope supplemental EIS. The interagency planning and coordination will also take into account work zone safety, mobility and accessibility considerations for all roadway users as well as appropriate mitigation to offset the traffic impacts.

Rail Operations

- Removing the Pine Street Rail Spur will allow the construction of the shared-use path in its place. The VTrans' Historic Preservation Officer recommended a Section 4(f) de minimis impact finding in 2011 for the Project wherever minor amounts of property are to be acquired, including the Pine Street Rail Spur. The affected landowners have been offered compensation for the relinquishment of their rail rights. The previous owners of rail rights to the Grocery Rail Spur and Pine Street Rail Spur have been offered just compensation and have all relinquished their rail rights. In addition, the removal of the Pine Street Rail Spur will allow for the extension of the shared-use path in its place.

Elimination of the Grocery Spur and Pine Street Rail Spur has no impact to rail operations.

- Railroad track alterations will be coordinated with the Vermont Railway, Inc. (VTR)

Bus Service

- No mitigation will be provided for impacts to existing park and ride facilities.
- Bus Service: There are no additional impacts to the Green Mountain Transit (GMT) bus routes beyond those discussed in the 2009 FSEIS for the Selected Alternative. Since the 2009 FSEIS, improvements to the Project including bus shelters on Pine Street and transit signal priority provide an added benefit to bus service in the City.
- Transit Signal Priority (TSP) will be incorporated at signalized intersections on Pine Street to facilitate the efficient flow of transit vehicles through the corridor.

Park and Ride Facilities

- No mitigation will be provided for impacts to existing park and ride facilities.
- No mitigation will be provided for the impacts to the existing PARC commuter parking lot for the loss of 70 parking stalls. Adequate parking exists within the remaining parking lot to continue to provide services at this location.

Bicycle/Pedestrian Facilities

- The Selected Alternative will include a shared-use path along the C-1 Section, from Shelburne Street to Pine Street. This path will provide mitigation for bicyclists and pedestrians that will no longer be able to access Queen City Park Road from Pine Street.
- The design includes the incorporation of bicycle pavement markings on the C-2 Section and C-6 Section as well as a shared-use path along the C-2 Section, Lakeside Avenue, and on Pine Street between Lakeside Avenue and Kilburn Street. These features will increase motorists' awareness of and safety for bicyclists. Curb extensions in conjunction with rectangular rapid flashing beacons on Pine Street will likewise increase pedestrian safety and provide additional crossing locations.
- The Selected Alternative, design treatments have been incorporated to mitigate the adverse effects of the changes in traffic volumes and patterns, which include traffic calming features, improved pedestrian and bicycle accommodations, and streetscape features. Consistent ADA-compliant sidewalks will be used to replace current sidewalks on Pine Street, within the study area, that are inconsistent, narrow, and in bad repair. Traffic calming measures will be included to alert drivers to pedestrians along Pine Street, and improve pedestrian and bicycle safety throughout the Project, including the Maple and King Street Neighborhood.
- The proposed design for Pine Street within the Maple and King Street Neighborhood includes cold planing and resurfacing the existing roadway, drainage improvements, consistent ADA-compliant sidewalks, and new curbing. The roadway layout will feature

a two-foot shoulder and 11-foot shared lane in the southbound direction. The northbound direction will consist of an 11-foot shared lane, a four-foot painted parking lane buffer, and a seven-foot parking lane. These improvements will mitigate the increased traffic volume on Pine Street in the Maple and King Street Neighborhood.

- The new traffic and pedestrian signals will provide safer crossing for pedestrians using walk signals in an exclusive phase where all vehicles are stopped. Providing an exclusive pedestrian phase improves vehicular traffic flow because pedestrians know to wait for a cross signal instead of causing traffic to stop each time a pedestrian arrives at the crosswalk.
- Curb extensions and high-visibility crosswalks will also improve pedestrian safety. The Project will also improve mobility for pedestrians and bicyclists by providing a new, continuous ADA-compliant sidewalk and ramps along both sides of Pine Street. This new and reconstructed sidewalk, combined with a new shared-use path to the south and enhanced on-road bicycle treatments, will expand the network and quality of facilities available to pedestrians and bicyclists having origins/destinations within the Maple and King Street Neighborhood and the City at large.

Emergency Vehicle Access

- An emergency vehicle preemption system will be installed on the Champlain Parkway and Pine Street as part of the Project. The design feature will not introduce additional impacts to emergency vehicle access beyond those discussed in the 2009 FSEIS and 2017, 2019 and 2020 environmental reevaluations.

Impacts to Neighborhoods

- The isolation of three houses, one on Home Avenue and two on Briggs Street, on the west of the C-2 Section is not considered to be an impact to the cohesiveness to the Flynn Avenue/Home Avenue neighborhood, because connectivity will be maintained at the Southern Connector/Champlain Parkway intersections with Home Avenue and Flynn Avenue.
- The Selected Alternative has been developed in accordance with the Agreement between Allan S. Hunt and the City of Burlington adopted November 18, 2013.

Right-of-Way Impacts

- The acquisition and relocation program will be conducted in accordance with the Uniform Relocation Assistance and Real Property Acquisition Policies Act of 1970, as amended and the relocation resources are available to all relocates without discrimination. There are no individuals being relocated as a result of any work associated with the Project subsequent to the 1997 FSEIS/Record of Decision. All relocations associated with this Project occurred as a result of the administrative action associated with the 1979 FEIS/Record of Decision.
- The Selected Alternative will have no substantial impacts to properties along the proposed alignment.

- The Right-of-Way is not required to be fenced in the limited access portion of the Selected Alternative as agreed between the City of Burlington and VTrans.

Consistency with Local and Regional Plans

- The Selected Alternative will provide pedestrian amenities that will enhance the project corridor for pedestrians, including landscaping, shared-use paths, sidewalks, crosswalks, and traffic signals with exclusive pedestrian phases.
- The new facility will be a City of Burlington responsibility and as such will be maintained by the City per the Finance and Maintenance Agreement between the City of Burlington and VTrans.
- The Selected Alternative has been developed in coordination with applicable local and regional plans, including:
 - City of Burlington “planBTV”
 - Downtown and Waterfront Master Plan
 - City of Burlington Great Streets initiative
 - City of Burlington planBTV Open Space Protection Plan (OSPP)
 - City of Burlington Climate Action Plan
 - City’s adoption of Complete Streets strategies

Wetland Impacts

- Based on the analysis in the 2009 FSEIS and the 2019 environmental reevaluation, FHWA has determined that all practicable alternatives to new construction in wetlands have been considered and that all practicable means have been taken to minimize harm to wetlands resulting from the construction of the Selected Alternative.
- Appropriate limit-of-work barriers and erosion and sedimentation control measures will ensure protection of the wetlands surrounding the Project and any indirect impacts.
- Mitigation for the impacts to wetlands will be made using the Ducks Unlimited – Vermont In-Lieu Fee (ILF) Program in accordance with permit conditions for the US Army Corps of Engineers Section 404 Vermont General Permit.

Historic and Archaeological Resource Impacts

- Under the Selected Alternative, no additional archaeological testing is anticipated because it is apparent that the areas associated with the anticipated construction limits have been previously disturbed. If during construction any artifactual materials are encountered, work in that area will be suspended pending examination of the remains by a qualified expert.
- The proposed traffic signals that are required at the Pine Street/Maple Street intersection and the Pine Street/King Street intersection will be historically compatible to blend into the surrounding Historic District. This will be accomplished by using pedestal mounted traffic signal poles. This equipment will also be painted to blend into the surrounding Historic District to the extent possible.

- Final project plans and any subsequent changes thereto will be subject to review and written approval by the VTrans Historic Preservation Officer before work begins.
- Brick style paving for crosswalks will be incorporated into the design at the intersections of Pine Street with Maple Street and Pine Street with King Street.

Air Quality Impacts

- The air quality analysis performed as part of the 2009 FSEIS remains valid.
- Under the Selected Alternative, no impacts are anticipated; therefore, no mitigation is required.

Noise Impacts

- The noise analysis included in the 2009 FSEIS remains valid. Noise abatement or other mitigation is not considered feasible or reasonable.
- No mitigation is proposed for noise impacts for the Selected Alternative. Abatement measures have not been found to be feasible or reasonable.

Public, Conservation and Recreation Land Impacts

- Under the Selected Alternative, no impacts are anticipated; therefore, no mitigation is required.
- Pocket Parks will be included under the Selected Alternative at the intersection of the Southern Connector/Champlain Parkway and Flynn Avenue.

Hazardous Materials Impacts

- The 2017 Supplemental Soil Quality Assessment and Disposal Pre-Characterization Report characterized soils within the Project area based on the applicable soil screening values. A Corrective Action Plan (CAP) has been prepared in accordance with the IRule, effective July 27, 2017 and in view of the VT DEC Procedure for an IWMEA Request for Storage or Use of development Soils in State and Local Highway Projects. This CAP describes the contamination on site and summarizes the results of the previous soils investigations. It also discusses the necessary monitoring activities during construction operations and provides a summary of locations where contaminated soils are likely to be encountered. In accordance with the CAP soils will be disposed of at a certified facility, relocated within Chittenden County, reused on site or otherwise relocated without any restriction or additional handling.

Visual Impacts

- Under the Selected Alternative, landscaping will be provided in accordance with project plans.

Construction Impacts

- The National Ocean Service (NOS) will be given at least 90 days' notice for the planned relocation of any geodetic control monuments which may be disturbed or destroyed by the Selected Alternative.
- **Work Zone Safety and Mobility**
The Project will include provisions that provide safe passage for pedestrians, bicyclists, and motorized vehicles during and after construction work hours while minimizing impact in the Maple and King Street Neighborhood during construction work hours. Construction phasing and scheduling will ensure safe pedestrian access through the construction area and to adjacent properties, buildings, residences, commercial properties and transit stops. Regular and timely coordination between the contractor, emergency response personnel, Green Mountain Transit, and school bus route operators shall ensure the continuity of these vital services.

Pedestrians may be directed around isolated work areas. The contractor is required to prepare a temporary pedestrian and bicyclist traffic control plan in advance of the plan being implemented to detail construction phasing and schedule as well as the specific methods of maintaining safe pedestrian and bicyclist access throughout the work zone. Other efforts that will mitigate temporary neighborhood impacts include the following:

- **Time-of-day restrictions on the contractor's activities**
Changeable message boards with timely and meaningful messages consistent with the current construction activities. Maintaining bicycle travel paths to be free of ruts, sand, mud and other debris. Providing pedestrian, bicycle, and traffic detours as necessary and ensuring that the site is not left inaccessible at night. Installing temporary pedestrian ramps as necessary. The Project will also be constructed in accordance with the City's noise ordinances which will place limitations on contractor's disruptive construction operations.
- **Public Involvement Plan**
In addition to work zone safety and mobility provisions, a Public Involvement Plan (PIP) was developed in October 2020 by the City, the Champlain Parkway Municipal Project Manager (MPM), the Federal Highway Administration (FHWA), and a dedicated Project Information Manager (PIM). This PIP will utilize communication strategies that seek to inform the general public and the EJ community of work zone impacts and the Project's changing conditions. The public information team will also conduct outreach to residents and businesses adjacent to construction activities. This outreach will include door-to-door outreach, posting informational flyers in local businesses, organizations, and other public places, stakeholder interviews, calls, and visits. A database of key constituents and stakeholders will be developed to share project information and updates throughout the construction of the Project. This list will include businesses and residents in the Maple and King Street Neighborhood. Informational outreach will include updates to provide advance warning of construction impacts such as traffic pattern changes or other disruptive activities and to identify community specific-issues or concerns before construction activities begin.

Print materials for education and outreach, such as project factsheets, door hangers, brochures, and flyers, will be produced as part of the PIP. These materials will be available in multiple languages. The target languages have been verified with city personnel as part of the ongoing EJ community public involvement effort. These materials will be posted in community locations, including in public buildings and businesses, throughout the Project Area and will be distributed to each residence. In addition to project-specific materials and meetings, press releases, other media alerts, and the City's social media platforms are anticipated to be used to inform the community about construction activities. A project hotline and email address for the public to submit questions and comments will be established and weekly project email updates will be sent to the stakeholder distribution list.

The Parkway's website (www.champlainparkway.com) will be used to provide information about construction progress and upcoming construction activities, including the overall construction schedule and the anticipated schedule of key construction activities. The website will be redesigned to be updated daily and will include an interactive project map to provide a closer look at the phased construction work and ongoing progress. The City's municipal website will include links to the Parkway's website (www.champlainparkway.com) to facilitate access to project updates.

K. Monitoring or Enforcement Program

Construction and environmental commitments for the Southern Connector/Champlain Parkway project will be supervised and controlled by the City of Burlington and VTrans with FHWA oversight. It is expected that the Army Corps of Engineers (ACOE), the Vermont Agency of Natural Resources (ANR), and the EPA will make compliance reviews to ensure that the various permit conditions are met.

Additionally, environmental commitments for the Southern Connector/Champlain Parkway project identified in the Act 250 Land Use Permit #4C0438-17 will be supervised and controlled by the City of Burlington. It is expected that the State of Vermont Natural Resources Board will make compliance reviews to ensure that the various permit conditions are met.

L. Action

To minimize the increase in traffic volumes within the Maple and King Street Neighborhood, under Build Alternative 2, Pine Street will not be widened. Instead, all improvements will occur within the existing right-of-way, except temporary easements necessary to complete the work. The Project will improve traffic operations compared to the No-Build condition and will address increased traffic flow and overall intersection operations. The installation of traffic signals at the Maple and King Street intersections with Pine Street will be coordinated with an upgraded signal at Main Street and Pine Street, resulting in smoother traffic flow, improved intersection operations, and decreased delay.

The new and upgraded signals will include pedestrian phases with countdown timers to provide safer crossing opportunities for pedestrians, which include WALK signals in an exclusive phase where all vehicles are stopped. This operational improvement will improve intersection safety for pedestrians utilizing these intersections and overall traffic flow for motorists. Curb extensions and

crosswalks will be constructed at several intersections as part of the Project and will further improve pedestrian safety by increasing visibility and reducing the crossing distance. These Project improvements will be particularly beneficial to pedestrians traveling in groups with children, the elderly, and the disabled. Mobility and access for pedestrians and bicyclists will be improved by providing new continuous ADA-compliant sidewalk and ramps along both sides of Pine Street. These new accommodations will improve pedestrian accessibility and safety compared to the No-Build condition and will mitigate the negative effect of the Project's traffic increases.

These new and reconstructed sidewalks, combined with a new shared-use path to the south and enhanced on-road bicycle treatments, will expand the network and quality of facilities available to pedestrians and bicyclists having origins/destinations within the Maple and King Street Neighborhood and the City at large. These new facilities will better accommodate pedestrian and bicyclist safety and movement, ADA-compliance/accessibility and on-street parking in and around the community.

Construction of the Project in the Maple and King Street Neighborhood will involve temporary impacts to normal traffic, pedestrian, and bicycle patterns due to paving and temporary sidewalk closures with detours to construct the new curbing, sidewalk, and traffic signal equipment. Concerns and comments regarding construction and work zone impacts were raised from members of the Maple and King Street Neighborhood during the public outreach events. These concerns were noted and will be mitigated to the greatest extent possible during the construction phase for the Project.

The analysis included was prepared in conformance with the EO 12898, U.S. DOT Order 5610.2(a) – updating the Department of Transportation's Final Environmental Justice Order effective May 2, 2012, the updated FHWA Order 6640.23A effective June 14, 2012 (canceling FHWA Order 6640.23 FHWA Actions to Address Environmental Justice in Minority Populations and Low-Income Populations dated December 2, 1998), and the FHWA Guidance memorandum on Environmental Justice and NEPA dated December 16, 2011.

As illustrated in Table ES-1 and in the body of the LS FSEIS, identified neighborhoods within the Study Area will share both the Project's improvements and some adverse impacts. After additional review of the proposed improvements and public involvement engagement, the Project will not cause disproportionately high and adverse effects on any minority populations in the Maple and King Street Neighborhood in accordance with the provisions of EO 12898 and FHWA Order 6640.23A. No further environmental justice analysis is required.

Based on this information, the 1979 Final Environmental Impact Statement, the 1997 Final Supplemental Environmental Impact Statement, and the 2009 Final Supplemental Environmental Impact Statement, the environmental analyses in the 2017, 2019 and 2020 environmental reevaluations, and the 2020-2022 Limited-Scope Supplemental NEPA review focused on environmental justice analysis, I am selecting Build Alternative 2 for further implementation.

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Federal Highway Administration – Vermont Division
Montpelier, VT