May 12, 2020

Commissioner Laura Ryan  
Texas Transportation Commission  
125 E. 11th Street  
Austin, TX 78701

Re: North Houston Highway Improvement Project

Dear Commissioner Ryan,

The Transportation Policy Council of the Houston-Galveston Area Council will shortly vote to adopt the 2021-2024 Transportation Improvement Program, including funding for Segment 3 of the North Houston Highway Improvement Project (NHHIP). In advance of that action, I thank you for the opportunity to provide the following comments.

The NHHIP is a potentially transformative project that can provide more options for both people and freight and provide flexibility for the future. For many years, TxDOT has been working with their partners to develop a project with significant, lasting benefits for the city. The City of Houston looks forward to its continued collaboration with TxDOT to design and build the NHHIP in such a way to further the goals and objectives identified by the Mayor’s Advisory Task Force, business/community and advocacy groups, and the thousands of people who participated in various community engagement meetings. If done right, this project can advance the goals of TxDOT and bring about significant improvements to I-45 in its present configuration, while improving the quality of life of those who live and work along the I-45 corridor. To put it mildly, I believe we can all agree that this is a once-in-a-generation investment that will shape the City of Houston for decades to come. This is our chance to rise to the challenge and chart a new course for transportation in the region. It is crucial that every opportunity is taken to design and construct the best possible project.

My goals for this project are below and center around a major theme of reducing the environmental impact and disruption of neighborhoods, while embracing growth:

- Strengthen Houston’s economy.
- Reduce flooding on and off the freeway.
- Make travel safer for all road users.
- Provide long term capacity for all users of the roadway, including automobile, freight and transit.
- Serve and preserve the neighborhoods along the corridor while enhancing connectivity between neighborhoods.
- Mitigate impacts to existing parks and greenspace while creating additional opportunity for green space.
- Limit right-of-way to the extent necessary to meet project goals, i.e., reduce the current footprint of the proposed plan.
- Ensure accessible evacuation routes.
In order for the project to meet our goals, I established an advisory group of Houston citizens to review the project. In addition, I asked the City of Houston Planning and Development Department to recommend ways to improve the project. Over the past year, the advisory group has met monthly and the Planning Department have listened to the public by hosting nine public meetings and reading through 1,130 written comments received to date by the City and TxDOT.

With these goals in mind, we have worked with all City departments, and partners at the County and METRO, to develop a design vision for the project. The elements of this vision are described in detail in the attached pages.

The coordination between the City, TxDOT and our partners has identified opportunities for civic improvements in neighborhoods around Segment 3. These are shown in the Technical Appendix and relate to improved connections, additional park spaces, urban design enhancements, future development opportunities, reuse of ROW and transit improvements. It is critical to continue this coordination with TxDOT through procurement, design and construction to enable the realization of these highly desired civic improvements that will make NHHIP a signature project. I would also point out this list of improvements in Segment 3 includes several critical items needed to maintain the functionality of the George R. Brown Convention Center, and are also detailed in the attached pages. The city recommends that Segment 3 be constructed to accommodate the improvements noted.

For Segments 1 and 2, we incorporated the Technical Appendix herein this letter and attached it for your reference. We ask that you consider the following:

- Design an alternate lane configuration for Segments 1 and 2 that measurably reduces the required right-of-way.
- Work with METRO to determine how regional express bus and bus rapid transit can reliably operate in the corridor as part of the voter approved METRONext plan, including stops that serve the surrounding communities.
- Study how bridges and other highway elements can be designed to accommodate future flood mitigation and open space projects on Halls and Little White Oak Bayous.
- Study how frontage roads can be designed to improve safety and accommodate all road users.
- Retain and expand local street connectivity, particularly for people walking and biking. Identify ways of improving the freeway aesthetics, especially through trees and landscaping.

Additionally, I request that TxDOT work with the city to develop programs to ensure that all displaced residents can relocate in their neighborhoods and affordable housing supply is not reduced.

Together, these elements significantly contribute to the City’s goals. We propose to work in close coordination with TxDOT to evaluate how these elements may be incorporated into the final design of Segments 1 and 2. In order to allow for sufficient review as revisions are proposed and incorporated, I suggest that Segments 1 and 2 be constructed through a Design-Bid-Build process, rather than the currently planned Design-Build.

I appreciate TxDOT’s continued engagement with the city throughout the design process and look forward to working with you to design a project with positive impacts for the community, the City of Houston, and the greater region.

Sincerely,

[Signature]

Sylvester Turner
Mayor

Enclosure: Technical Appendix
North Houston Highway Improvement Project
Technical Appendix to letter from Mayor Turner

Footprint
Segment 1 and 2

Public comments resulted in one design concept for Segments 1 and 2 of the North Houston Highway Improvement Project. The footprint and lane configuration of this vision is described as follows:

- Rebuild the highway within the current footprint as much as possible.
- No added main lanes.
- Current reversible HOV lane is replaced with two-way, dedicated transit lanes.
- Design exceptions and lane widths and shoulder widths as required to keep the footprint within the current right of way.
- Reconstruction of interchanges and on- and off-ramps.

The City requests to partner with TxDOT to study this and other alternate configurations for Segments 1 and 2. This study would include:

- A confirmation of goals amongst TxDOT, Harris County, METRO, and the City.
- The development of a new alternative as described, along with any other alternatives that TxDOT may identify.
- Traffic modeling for the new alternative with agreement on the parameters for that traffic modeling
- Robust public input

Segment 3

No significant changes to configuration or footprint as currently designed. Some modifications to ramps and structures to allow for improvements listed in other sections. Ensure seamless transition with new alternative selected for Segment 2.

Transit

This project should expand transit options, increase the reliability of transit, and support the voter-approved METRONext plan.

Segment 1 and 2

Segments 1 and 2 should be designed to reliably accommodate two-way all day transit service, as envisioned in the METRONext plan. The City believes this will be best accomplished with dedicated transit lanes, separated by barriers from main lanes and other managed lanes, which would be used by METRO's planned North Bus Rapid Transit (BRT) service as well as regional express service by multiple agencies.

TxDOT should work with METRO to integrate the planned North BRT service in the design of this project. This should include intermediate stations in the freeway, with METRO doing a parallel planning
study and coordinating with TxDOT to identify the station locations. This should also include a direct connection from IH-45 to a new transit center at Greenspoint, to be implemented by METRO as a coordinated project.

Segment 3

The current Katy Freeway HOV connector should be maintained, or a replacement connector built, for use as transit only lanes for BRT and regional express buses. This should be designed to integrate with METRO’s funded and taxpayer approved Inner Katy project.

All Segments

In all segments, where NHHIP includes the reconstruction of existing HOV lanes or ramps to existing HOV lanes, it should be designed to allow for the conversion of those lanes to full time two-way operation as part of METRONext. The City of Houston is interested in finding opportunities to accelerate these conversions in conjunction with this project.

The transit facilities can be part of a larger multijurisdictional Transportation Demand Management strategy.

Freight

This project should be part of a regional strategy for freight movement that supports the regional economy while minimizing impacts on neighborhoods.

All Segments

TxDOT, H-GAC, and the City should join together to evaluate the best ways to accommodate freight demand throughout the corridor. This should include all available capacity (both road and rail) and management techniques, with the express objective of shifting through-truck volumes away from downtown unless destined for downtown and out of the heaviest rush hour traffic flows. This should also look at the impacts of freight movement on neighborhoods and identify ways to minimize those impacts.

Housing

This project must leave residents and communities whole. That means ensuring that all displaced residents can relocate in their neighborhoods and affordable housing supply is not reduced.

All Segments

The best outcome for residents is minimizing displacement, which is why the City of Houston favors remaining within the existing right of way in Segments 1 and 2.

For the residents who are displaced by this project, TxDOT should provide assistance above and beyond what is required by state and federal law. Payments to homeowners should cover the cost of similar properties within the neighborhood, not just the market value of the property affected. For renters, these payments should cover deposit, first/last month rent, and other charges. All affected residents must have access to navigators who understand the local communities. TxDOT should consider working with local nonprofits to do this. Affected residents should be clearly notified of their rights, options and responsibilities, at least 180 days in advance as opposed to the legally required 90.
The city requests that you coordinate with my designees in the Planning and Housing departments to work towards these higher standards.

We urge TxDOT to avoid condemnation of existing affordable housing developments. When condemnation is unavoidable, adequate compensation must be provided to owners to provide replacement housing options to vulnerable residents of the city. The City commends TxDOT’s proactive efforts to ensure the complete replacement of units affected by the displacement of Clayton Homes and Kelly Village, which we contend will result in an improved condition for those residents. We remain concerned, however, that displacement of housing in Segments 1 and 2 may further compound the existing affordable housing crisis. Therefore, the City requests that TxDOT contribute to grant funding for the construction of housing to replace units displaced by the project. To ensure residents must only move once, this should be completed before highway construction begins, as is being done with the HHA properties near Downtown.

**Flooding**

This project must not only reduce the incidence of flooding on the freeway but also reduce the flood risk in the surrounding neighborhoods.

**All Segments**

The City of Houston is interested in working with Harris County, Harris County Flood Control District, and TxDOT to agree on a general framework for how these agencies can collaborate on property acquisition and construction on transportation projects so that those projects can be part of a larger watershed-wide flood risk reduction strategy and maximize the effectiveness of taxpayer dollars.

TxDOT should work with the City of Houston, Harris County, and Harris County Flood Control District to determine the feasibility of raising the elevation of the frontage roads at Halls Bayou to reduce frontage road flooding and designing bridges to allow for a future flood control project that could reduce flooding in the watershed. Those bridges should also be designed to allow the creation of a pedestrian/bike path along the bayou that crosses underneath the frontage roads and freeway.

TxDOT should work with the City of Houston, Harris County, and Harris County Flood Control District on completing a comprehensive study of Little White Oak Bayou and its tributaries, with extensive opportunities for public input before adopting a plan. TxDOT should then work with the same agencies to implement a flood risk reduction project that will significantly reduce the flood risk for surrounding neighborhoods. The highway should be designed to enable this project, including bridges instead of culverts at all crossings and improvements to tributaries that cross the highway. The flood mitigation for the freeway projects should be integrated and coordinated with this watershed wide flood control, and the right of way for the freeway and flood risk reduction should be coordinated.

No construction should be done on the freeway or the flood control project until there is a complete plan for the watershed.

TxDOT should install flood warning technology and remote controlled closure infrastructure along the freeways constructed in this project so that traffic can be diverted away from segments of the freeway that are flooded or at immediate risk of flooding.

TxDOT should design to the flood control standards that Harris County Flood Control District has requested, including ATLAS 14 rainfall rates, MAAPnext the latest HCFCDF criteria. The City of Houston will look to HCFCD to review and approve all drainage design.
Connectivity and Local Streets

This project must retain and expand neighborhood connectivity, accommodate freight movement, and make travel safer for everyone, whether on the highway or a local street, on foot or on a bike or in a car.

All Segments

The City of Houston has not seen a traffic study that analyzes impacts on the proposed project on local streets. TxDOT must do a study to see where the project is likely to increase vehicle traffic on local streets due to on- and off-ramp changes and changes in local street connectivity, and propose traffic mitigation, funded as part of the project, to address these. Before this work is completed, the city would like to work with TxDOT to create a toolbox of traffic mitigation tools.

The frontage roads and frontage road intersections should be designed as city streets and not highways. Lane widths and intersection geometry should follow city standards. An off-street bike paths or shared bike/ped path should be provided. Trees should be planted on both sides of the roadway. Sound walls should typically be located between the frontage roads and the mainlanes. The City requests a collaborative design process for these roadways and a final signoff on the design. The City will provide a spreadsheet of requested roadway cross sections at cross streets.

Segments 1 and 2

There should be no frontage roads from the BNSF railroad track to IH-610 in Independence Heights.

A North Main on- and off-ramp should be included in the project.

TxDOT should construct a wide bridge on North Main, with wide plaza-line sidewalks, to create a safer and more pleasant pedestrian crossing of the freeway. TxDOT should also provide ground level pedestrian crossings a Dell and Norma, appropriately signalized crossings of the frontage roads.

To mitigate the loss of pedestrian connectivity due to the closure of North Street, TxDOT should build a pedestrian overpass at North Street was well as a pedestrian path, with connections to the surrounding streets, that crosses under the freeway along Little White Oak Bayou.

Segment 3

The City of Houston intends to work with TxDOT to identify funding for the extension of San Jacinto Street to the Near North Side so that this connection can be built at the same time as NHHIP. The highway should be designed to accommodate this connection.

The City of Houston believes that the relocation of portions of the Terminal Subdivision would have significant benefits in improving traffic flow on and off the freeway, improving local traffic flow, increasing flood resilience, improving safety, decreasing the impacts of freight rail on neighborhoods that are also impacted by the NHHIP project, and increasing regional freight capacity and reliability. The city also believes that this project can only be implemented if the NHHIP is designed for it, and that coordinated implementation would allow significant cost saving compared to a later relocation of freight rail. Therefore, the city would like to work with TxDOT, UP, and H-GAC to fully study this opportunity (with public input) to find a way to fund and implement this rail relocation as part of NHHIP, and at the very least include provision for it in the design.
An underpass should be included in the project to maintain Runnels Street in its current alignment, passing under the railroad tracks and the freeway. Lane widths and intersection geometry should follow city standards.

Federal funds have been allocated, and the City has identified a local match for, the grade separation of Commerce and Navigation at the West Belt railroad tracks. However, this funding is not sufficient to build this as a standalone project. The City believes it would make sense to incorporate this project as part of the NHHIP construction, and that the resulting economies of scale may eliminate this gap. Lane widths and intersection geometry should follow city standards.

TxDOT must mitigate the closure of Polk, a key route between the East End and Downtown, by creating a continuous high comfort bikeway connection from Downtown to the Columbia Tap to replace the existing bikeway on Polk, by working with the City and METRO to implement bus priority measures for METRO’s 40 and 41 routes, and by studying the construction of grade separation at Leeland and Cullen streets and the West Belt railroad tracks.

Northeast Connector Ramps: the City requests TxDOT maintain the IH-69 ramp connections to Jackson and Chenevert Streets in lieu of DEIS proposed connection to “Old” Hamilton to relieve congestion on the southbound frontage roads.

- Coordinate with HPW 3-lane turn movements from Jackson St to Congress St.
- Coordinate in the City abandonment of “Old” Hamilton for enlarged development blocks east of Minute Maid Park from Commerce St to Texas Ave.
- Coordinate highway detention sites of Frosttown Park with widened ingress/egress ramps.

Houston Avenue Connector: the City requests TxDOT maintain vehicular and pedestrian connections into Downtown and area parks by:

- Supporting pedestrian and cyclist movement under the new highway with all existing trails to be preserved or reconstructed.
- Engineering turn movements on Houston Ave southward extension to facilitate pedestrian crossings to Buffalo Bayou and Sam Houston Park.
- Removing highway embankments structures from the bayou waterway.
- Spacing columns for new highway components to reduce or eliminate columns in the bayou.

Cleburne Street Bridge and Caps: the City requests TxDOT maintain the continuity of Cleburne St and its' connection of Midtown's future innovation hub to Third Ward, TSU and UH by:

- Extending Cleburne St across the future IH-69 trench.
- Responding to community requests for caps that flank the Cleburne St Bridge.
- Providing waterproofing and fill material for cap areas.

Gregg Street Exit: based on TxDOT’s community engagement, the City requests TxDOT provide an exit from IH-10 eastbound to Gregg St. for access to Fifth Ward and East End neighborhoods.

- For Fifth Ward connectivity, the City requests TxDOT provide a westbound extension of the IH-10 (East Freeway) frontage street from Meadow St. to Jensen Dr.
- To provide safe intersections for all users, the City requests TxDOT provide frontage street traffic signalization on Rothwell and Providence at North San Jacinto, McKee, Hardy, Jensen and Meadow.
Park Space and Urban Design
The project should minimize impacts on parks and facilitate the creation of new green space, and the design of the project should recognize the history and character of the surrounding neighborhoods.

Segments 1 and 2
TxDOT should work with the City of Houston, Harris County, and Houston Parks Board on a continuous off-street trail network and greenway connecting all the neighborhoods along Little White Oak Bayou. This project would use right of way acquired for the freeway and for flood control, and the freeway should be designed to accommodate it. TxDOT should mitigate the impacts on the White Oak Bayou Greenway by funding portions of this greenway to provide similar recreational space accessible by residents of the Near North Side.

Finally, improved aesthetics for the freeway corridor itself through enhanced landscaping and trees are essential because I-45 North is a major gateway to Houston.

Segment 3
The NHHIP should minimize impacts on parks and facilitate the creation of new green space. The design of the NHHIP should recognize the history and character of the surrounding neighborhoods and strive to minimize adverse impacts to the greatest extent possible.

Central City Theme (Green Ribbon 2.0): the City requests TxDOT adopt, design and build new highway components with a neutral theme so that highway elements visually recede and green landscaped components become more prominent.

Garden Bridges: the City requests TxDOT rebuild COH street bridges following COH Street Standards and COH Walkable Places by providing:

- Trees and elements that provide shade
- Bike lanes
- Streetlights
- Roadway lights
- Accent pavers
- Fencing with the Central City Theme (Green Ribbon 2.0).

White Oak Detention Garden: TxDOT should work with the City of Houston and local stakeholders to minimize the open space, visual, sound, ecological, and public safety impacts of the highway on the White Oak Bayou greenway and the adjacent Near North Side and First Ward neighborhoods through the following strategies:

- Refining the freeway geometry
- Recontouring the topography
- Creating new hike and bike connections
- Spacing columns farther apart with fewer columns and fewer visual obstructions.
- Adopting Green Ribbon 2.0 standards so that columns visually recede.
- Designing detention areas to be used as parks with plantings and trails (similar to current Sabine Street Promenade).
- Developing a hike and bike trail system on the southwest side of the bayou.
Fourth Ward Gateway: the City requests TxDOT reconnect Fourth Ward and Downtown by:

- Providing an enhanced pedestrian crossing on the new Andrews St Bridge to accommodate the installation of historic pavers that reflect the heritage and character of the Fourth Ward streets.
- Creating a more generous greenway along Heiner St that can be used for pedestrians, cyclists and programmed events, from Midtown to Buffalo Bayou Park.
- Widening the Andrews St Bridge from 36' to 66' to allow for programmed community events and to create a strong visual impact, signaling the importance of this historic Houston community.
- Reconciling METRO Bus Staging, detention, and Pierce Skypark entry, all proposed in the same location at the south end Downtown Connector ramps.

Buffalo Bayou Promenade: the City requests TxDOT maintain and improve the visual impact/recreational benefit of this corridor by:

- Replacing landscape and hardscape under and along Buffalo Bayou in the TxDOT ROW.
- Working with COH representatives to salvage the Paul Killuson artwork on I-45 over Buffalo Bayou.
- Demolishing embankments under IH-45 to allow for future uses, either as a pedestrian plaza or surface parking lot. Minimize new embankments to allow for high clearances under the new Downtown Connector and associated ramp structures.

Frostown Park: the City requests TxDOT create usable recreation space at the inline detention facility, also referenced as the “South Canal,” by delivering the following:

- A broad bayou bench sized for soccer or other recreation fields.
- Preservation of the railroad trestle under IH-69, to be repurposed as a pedestrian connection across Buffalo Bayou.
- Collaborate on the installation of new trail connections along the north and south banks of Buffalo Bayou.

Third Ward Detention Tank: the City requests TxDOT mitigate the visual impact of the proposed Detention Tank by:

- Obscuring the tank to the greatest extent possible with planting and by in-grade submersion.
- Contributing to the procurement and installation of artwork that can enhance the appearance of this area.

Four Corners Detention Park: the City requests TxDOT determine co-located detention/recreation opportunities for Third Ward and EaDo by:

- Providing understory sidewalk and bikeway connections between Third Ward, Midtown, EaDo and Downtown.
- Sculpting land to support recreational uses.
- Collaborating with adjacent Management Districts for City detention sites.

Third Ward Bridges: the City requests TxDOT provide arched bridges following COH Street Standards and COH Walkable Places by providing:

- Trees and elements that provide shade
- Bike lanes
- Streetlights
• Roadway lights
• Accent pavers
• Landscape buffers
• Signature lighting.

All Segments
As noted above, the feeder roads should be fully landscaped.

TxDOT should work with the City of Houston, Harris County, Houston Parks Board, and others to design detention areas so that they are fully landscaped and can be utilized as parks and greenspace.

TxDOT should work with neighborhoods to identify opportunities to recognize and strengthen the history and cultures of the surrounding neighborhoods. This may include urban design and artwork for gateways where local streets meet the freeway and for cultural corridors where they cross the freeway.

Air Quality
We should find every way we can to reduce and mitigate the significant air quality impacts that highways have regionally and the neighborhoods surrounding them.

All Segments
City of Houston would like to continue to work with TxDOT to find ways to address air quality, including air quality monitors and mitigation for sensitive populations like schoolchildren.

Development Coordination
The NHHIP should support the restoration and development of the EaDo Cap area as it holds the greatest potential economic impact for the City.

Segment 3

George R. Brown Convention Center (GRBCC): the City requests TxDOT collaborate with Houston First Corporation (HFC) to address the operational and infrastructural needs along the eastern half of the GRBCC and consider the new highway alignment impacts relative to future development expansion of the GRBCC:

• Maintain GRBCC Operations Area and marshalling yard during and after construction.
• Develop management plans to reduce noise, vibration, air quality, drainage, and tunnel ventilation impacts during and after construction.
• Consider land usage opportunities within existing and surplus ROW.
• Support GRBCC plans for an eastside entrance and Ballroom.
• Support GRBCC plans for a southside expo hall expansion including a southern approach ramp from Hamilton, Leeland and Bell for upper level loading docks.

EaDo Cap: the City requests TxDOT complete the cap to a safe base level for the community by:

• Waterproofing over beam structures to protect the highway lanes below.
• Providing adequate fill material (soils and geofoam) over the waterproofing to allow for installation of landscape sod, with provisions for site drainage and irrigation.
• Providing block-perimeter street trees and other infrastructure required by COH Street Standards on all streets crossing the cap and the full limits of “new” southbound Hamilton St and northbound St Emanuel St.

**TxDOT Surplus ROW**

The project should maximize opportunities for the City to restore connections to the street grid that would also encourage new development.

**Segment 3**

**I-10 at I-45 ROW Disposition:** the City requests TxDOT reconnect city streets in this area by:

• Conveying surplus ROW to the City.
• Working with Planning & Development Department to replat the area for public and private development, including new street right-of-way and METRO bus storage facility.
• Working with Houston Public Works and adjacent Management Districts/ TIRZs to support additional connectivity and infrastructure for streets including:
• Lyons Avenue – Fifth Ward Connection to Downtown.
• Nance St, Dart St and Burnett St reconstructions and extensions.

**Pierce Elevated ROW Disposition:** the City requests TxDOT support the future development of the Pierce Corridor by:

• Preserving the elevated structure for alternative public connectivity and recreational use and for adjacent private development.
• Conveying surplus ROW to the City.

**SH-288 Ingress/ Egress Ramps:** the City requests TxDOT convey to the City surplus ROW where SH-288 ingress/ egress ramps in southeast Midtown will be abandoned with NHHIP construction.

• Area to be replatted by City for 2-way street infrastructure and development sites.
• TxDOT to dispose of surplus right-of-way for private development.

**Midtown Design Bid Build:** the City requests TxDOT continue to work with area stakeholders and METRO on the development of cap projects, street bridges, and utility bridges in this area.

**Design Coordination**

**Segments 1 and 2**

To allow for sufficient review as revisions are proposed and incorporated, the City requests that Segments 1 and 2 be constructed through a Design-Bid-Build process, rather than the currently planned Design-Build.

**Segment 3**

The City requests TxDOT establish the mechanism by which City departments, METRO, HFC, and impacted Management Districts/ TIRZs collaborate in the design and construction process with TxDOT.
and the selected Design-Build Contractor, including agency review of the design development and a public communications plan.

**Construction**

**All Segments**

The City is also concerned about impacts during construction. The city wants to make sure that the impacts on neighborhoods and on the ability to move around the city in a car, on foot, on a bike, or on transit are minimized.

The City believes the scale of this project will require new approaches such as additional transit service during construction, TDM, and improved ped/bike connections as part of construction mitigation. The city will have further comments on construction, and wants to be a full part of a robust collaboration with TxDOT, METRO, and the county on construction.