



Transportation Data Equity Initiative

A USDOT ITS4US CompleteTrip project

This innovative data infrastructure project, with a broad partnership among state departments of transportation, transportation service providers, industry and community partners, seeks to enable mobility equity by **creating an interoperable, shared data infrastructure to fill in gaps in current transportation data** and ultimately, provide travelers needed information they can trust. Detailed, accurate data about pedestrian networks, travel environments (transit facilities, etc.) and on-demand travel services is crucial for any trip planner, trip concierge, wayfinding, or exploratory mobile application, in particular applications and mobile experiences serving the needs of people with disabilities, older adults, veterans, suburban and rural populations. The massive breadth of this project will be achieved through an accelerated timeline on currently planned technology innovations led by the DOT's in each state, WA, OR and MD.

Our team of private and public partners will sustainably build and accelerate the future of equitable mobility and access to transportation by achieving three goals:

- (1) Create, improve and extend data formats to describe (a) sidewalks and footpaths in the built environment (pedestrian routing graph) (b) travel paths through transportation stations and hubs (from bus stops to multi-level transit hubs) and (c) demand responsive travel services
- (2) Publish and maintain for 5 years the full data infrastructure for six U.S. Counties
- (3) Deploy mobility applications, experiences, and **planner dashboards** consuming standardized data that demonstrate the versatility and scalability of the data infrastructure

Innovations

- New OpenSidewalks pedestrian transportation network data describes sidewalk graph in a routable, digital manner in all six counties.
- New GTFS-flex data describes demand-responsive transit service across all six counties.
- New GTFS-pathways data describes transit facilities in routable, digital manner.
- Planner dashboards and software to improve accessibility and equity impact metrics, to assess and comparatively score walksheds accounting for diverse mobility requirements
- National dissemination of shared, standardized, interoperable data ensuring all riders, planners and application developers have access to data and information services

Approach

Coordinated engagement of agencies and riders through:

- DOTs
- Transit Associations
- Private Industry
- Rider Advocacy Groups

Data standardization achieved through:

- Community-Based Participatory Action
- Transit Association Outreach and Trainings
- Key Technology Product Creation

Benefits

- Improved Complete Trip and transit experiences for users with accessibility needs and preferences.
- Improved data about pedestrian right of way, transit paths and on-demand transportation in the participating jurisdictions will improve accessibility, mobility equity and economic activity.
- Improved planning processes: the availability of routable pedestrian graphs allows planners to perform a wide variety of important analyses that facilitate data-driven decision making about where infrastructure investments are most needed to support accessible active transportation and sustainable, resilient neighborhoods.

Contact:

For further information, email transitequity@cs.washington.edu.

Watch our website: <https://transitequity.cs.washington.edu>

Key Partners:



Funding & Timeline:

Concept application accepted 2021.

Phase I funding began in 2021, ending June, 2022.

Applications for Phase II are due in March, 2022. Phases II and III will last into 2025.