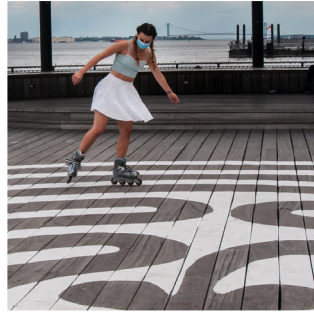


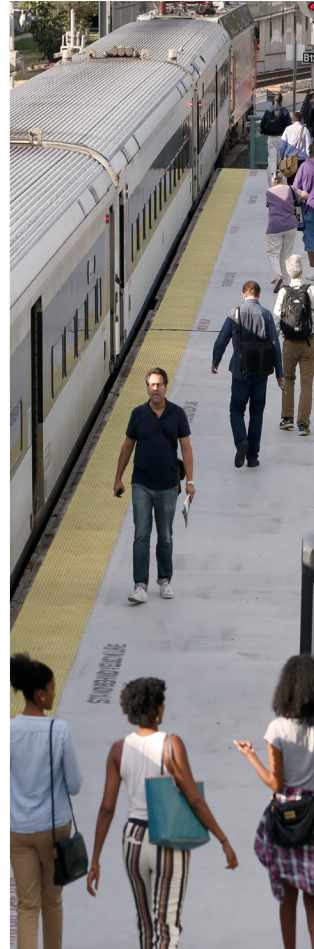
PLAN 2050



► *Transportation*



► *People*



► *Opportunity*



EXECUTIVE SUMMARY

Plan 2050 - Executive Summary

Transportation. People. Opportunity. These themes are the focus of this plan and the work of the [North Jersey Transportation Planning Authority \(NJTPA\)](#). They signify not only the goal of investing wisely to improve the roads, rails and other infrastructure, but to shape these investments to meet the needs of transportation users and support a thriving, sustainable regional economy that benefits all.

This plan helps chart a course through uncertain and challenging times to continue progress towards a more efficient and sustainable transportation future. It seeks to help the region recover from and respond to the tumultuous and life-altering events of 2020-2021 — the pandemic, social isolation, racial reckoning and environmental threats.

At the same time, this plan is one of continuity, carrying out NJTPA’s responsibilities and mandates for ensuring the safe and efficient functioning of North Jersey’s extensive transportation system, which forms the foundation for the regional economy and quality of life.

This plan fulfills federal requirements for metropolitan planning organizations like the NJTPA, ~~which must to~~ update long-range plans every four years in order for the region to be eligible receive federal transportation funding. This requirement in federal law (23 CFR 450) reflects the need for transportation investments to be based on a ~~comprehensive~~ “continuing, cooperative, and comprehensive” assessment of long-term needs planning process that provides “for the development of an integrated multimodal transportation system ... to facilitate the safe and efficient movement of people and goods in addressing current and future transportation demand.”

The plan was developed under the direction of the NJTPA Board of Trustees in close collaboration with partner agencies, including member city and county “subregions,” the New Jersey Department of Transportation (NJDOT), NJ TRANSIT, the Port Authority of New York & New Jersey (PANYNJ), the state’s eight Transportation Management Associations (TMAs), and the Together North Jersey (TNJ) consortium, among others. It was guided by NJTPA’s seven goals for regional transportation:

- Protect and improve natural ecosystems, the built environment and quality of life.
- Provide affordable, accessible and dynamic transportation systems responsive to all current and future travelers.
- Retain and increase economic activity and competitiveness.
- Enhance system coordination, efficiency, overall safety and connectivity for people and goods across all modes of travel.
- Maintain a safe, secure and reliable transportation system in a state of good repair.
- Create great places through select transportation investments that support the coordination of land use with transportation systems.
- Improve overall system safety, reducing serious injuries and fatalities for all travelers on all modes.

Public Outreach

In keeping with the people-focus of this plan, extraordinary efforts were undertaken during the plan’s development to gather input from the region’s residents and users of the transportation system. While the pandemic made public outreach more challenging, it also opened new opportunities for residents who cannot easily go to physical events.

More than 3,000 people submitted online surveys or participated in virtual public meetings, symposia, or targeted outreach to engage underserved populations, including focus groups and a children’s activity. Extensive social media messaging was used to reach a broad audience, resulting in about 33,000 engagements.

The NJTPA found people and organizations were eager to share their experiences and views, and that their comments were largely consistent with the NJTPA’s regional goals. Among the most commonly expressed concerns:

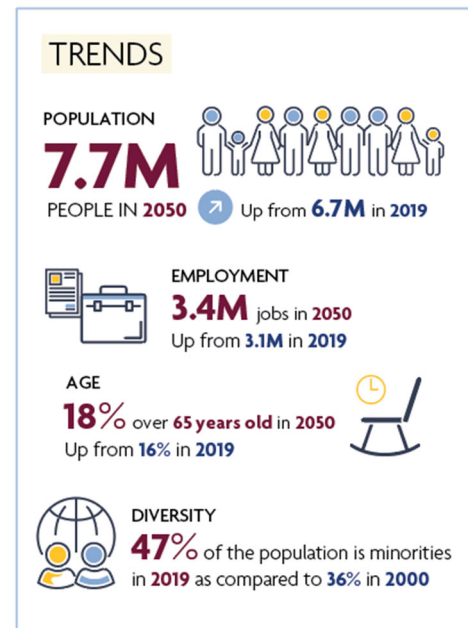
- Transit is oriented toward New York City and North Jersey’s major cities but often falls short in meeting intrastate travel needs within cities and towns and between less densely populated communities.
- Affordability of housing and transportation are barriers to opportunity for many.
- Technology, such as real time transit information and fare integration, are within reach and are critical to improving access and mobility.
- People want to continue the flexible use of streets experienced during the pandemic that give more public space for walking, biking, and socializing instead of just for vehicles.
- Transportation policies have historically discriminated against minority communities and failed to meet their needs.

Context

The context for Plan 2050 is a growing and economically dynamic region. Forecasts anticipate an additional 1 million people and 300,000 jobs will be added by 2050. While these forecasts and others are based on data that predates the COVID-19 pandemic, this plan assumes that the region will largely recover to pre-pandemic growth levels after a five- to 10-year setback. Many previous trends will reassert themselves.

One such trend is the attraction of people, offices and economic activity to urban areas and denser downtowns that gained momentum in the rebound from the Great Recession of 2008. At the same time there were some countervailing trends, with millennials beginning to raise families and seeking out suburban homes, and rising housing costs driving people away from sought-after denser locations.

The pandemic altered the housing market, with rising demand and prices mostly in outlying areas and scattered declines in urban areas. But the long-term impacts are unknown. Suburban and rural areas could draw growth from more urbanized parts of the region if companies restructure operations around remote work on a large scale and reduce reliance on central offices. The distribution of growth will be driven mostly by the market but also influenced by public policy and investment decisions. Among other trends:



- The region's population will continue to age. From 2014 to 2019, the NJTPA region saw the share of residents older than 54 years of age increase from 26 percent to 29 percent.
- Mirroring national trends, the region's population is increasingly composed of racial and ethnic minorities (principally Asians, Blacks and Latinos). Minorities are more than half the population in five counties. These residents also rely more on transit for day-to-day mobility, raising equity concerns that have been brought into stark relief during the pandemic. Minorities also face mobility challenges due to the legacy of institutional racial discrimination, which this plan recognizes and seeks to redress.
- The pandemic brought a steep and dramatic decline in employment. The state lost 717,200 jobs by April 2020 but gained back 54 percent (384,500) of the jobs it lost by March 2021, which is lower than the national recovery rate of 62 percent during the same timeframe.
- Even with a higher than average median income, about one-tenth of the residents in the region live in poverty. Poverty rates are highly correlated with race. New Jersey's income disparities mean large numbers of residents face limited life choices. This plan seeks to address racial and income inequity in the transportation sector.
- While the state has long been a center of freight and goods distribution to the northeast and mid-Atlantic consumer market, the growth of e-commerce has fueled a surge in development of distribution facilities in recent years. E-commerce accelerated during the pandemic and is expected to continue to reshape New Jersey's economy and land use. These facilities must be planned and managed to preserve open space and limit traffic impacts.
- The region's economic fortunes are still very much tied to those of New York City and the larger metropolitan area. In recent years, 10 percent or more of the region's population has commuted to New York City. Investments in the Hudson River tunnels and larger Gateway Program are needed to safeguard this crucial economic interdependence.

Despite uncertainties about the future, the region has substantial assets on which to rebuild from the pandemic and support continuing economic progress. These include an educated work force, good quality of life and extensive transit and highway facilities.

System Performance

In recent years, the daily onslaught of cars, trucks, and buses travelling the road network has created severe congestion in some locations, hampering commerce and commuting, and caused growing safety and environmental concerns. While the mass transit system offers a convenient alternative for many trips, constrained funding has left it struggling to meet demand. All aspects of the transportation system are hampered by aging infrastructure. And not all segments of the population share equally in the benefits of transportation access.

These problems have demanded attention and investment — \$2 billion or more annually in recent years — and this plan discusses much more that needs to be done. Still, judging by transportation performance in recent years, by-and-large the system has worked well in its essential functions, underpinning the region’s dynamic economy, and supporting the lives and livelihoods of the region’s residents. The transportation system makes possible future growth and progress — the “opportunity” that is a central theme of this plan.

This is the first NJTPA long range plan update to include a report on the region’s progress toward federally mandated performance targets. This performance-based planning and reporting ensures accountability and transparency and provides for better investment decisions. The NJTPA works with NJDOT and NJ TRANSIT, PANYNJ and the subregions to analyze data and set performance targets for the region. Among the transportation performance issues facing the region:

- Planning must continue to shift its focus away from moving vehicles to one of accessibility — that is, using a variety of modes to give people convenient and affordable access to jobs, education, and other opportunities. This approach makes efficient use of resources, helps protect the environment, and can promote equity.
- Minority and low-income communities have faced greater barriers to accessibility, including access to jobs, healthy food, health care, and education. To help address this priority, equity is factored into the criteria used to prioritize projects for funding. In addition, in fall 2020, the NJTPA Board adopted an updated Title VI plan which establishes NJTPA’s civil rights and anti-discrimination policies and guides environmental justice efforts.
- At the beginning of 2020, the network handled an estimated 151 million vehicle miles of travel (VMT). The NJTPA forecasts that this will increase 11 percent to 168 million VMT by 2050. To address future demands on the system, NJTPA planning aims to prioritize investment where it can moderate unpredictable or extreme congestion or provide travel alternatives to allow travelers to avoid congestion hot spots.
- The regional freight system faces growing challenges including congestion on roads, lack of truck parking and inadequate rail infrastructure in places. The system must accommodate a growing volume of e-commerce, projected to increase to more than 390 million packages by 2050—growth of more than 400 percent.
- Travel safety remains a top concern. Motorists are the largest segment of roadway users injured and killed in crashes in the state and region, but pedestrians remain the most vulnerable. Pedestrians and cyclists account for about 9 percent of non-commute trips in the region but comprise more than

30 percent of those killed in crashes. New Jersey’s pedestrian fatality rate is nearly double the national average.

- Much of the region – and the nation – remains oriented to accommodating autos as the primary mode of travel. This plan supports efforts – including Transportation Demand Management – to steadily expand travel options, particularly bus and rail transit and walking/biking, as opportunities present themselves and through balanced transportation investments.
- For walking, bicycling and other active transportation modes, accessibility is often contingent on a basic foundation of complete streets (roads designed to safely accommodate all modes and users) that is lacking in many areas.
- Aging infrastructure imposes a heavy financial burden, with up to 64 percent of all available funding devoted to repairing and maintaining existing infrastructure, leaving less for improvements. Transportation agencies must play constant catch-up to keep pace with accumulating needs.

These and other findings of the NJTPA’s performance-based planning work allow the region to better adapt plans and programs to implement cost-effective solutions to support a growing population and expanding economy over the long term.

Transportation Strategies

This plan provides a framework for setting priorities for workable and cost-effective solutions to complex transportation challenges. The NJTPA’s planning activities focus primarily on the earliest stages of project development where problems are explored and solutions identified. Working with its partners, the NJTPA allocates federal funds to projects that reach the implementation stage. A Project Index at the back of the plan lists planned improvements in the near- and mid-term, and those under study that could be realized in the long-term. Among the priority strategies identified in Plan 2050:

- **Reduce the backlog of needed road and bridge improvements** and upgrade facilities to meet growing demands and enhance safety. Investments must also prepare infrastructure for climate change impacts and accommodate walking, biking, and transit modes as part of complete streets.
- **Increase funding for local needs**, as county and municipal governments have responsibility for maintaining and upgrading the region’s largest total share of road miles and about 40 percent of bridges, burdening them with substantial costs. Future funding in the plan reflects increased support for these local needs. Also important is the NJTPA Local Capital Delivery Program through which counties can access federal funding to repair or replace bridges and other infrastructure. Priorities for future local investment include addressing growing travel demand, resiliency requirements and technology upgrades.
- **Reduce crashes and ensure the safety of all travelers.** This must continue to be a primary focus across all policies, programs, and investments. New Jersey adopted a Strategic Highway Safety Plan in 2020 to guide investments towards reducing serious injury and fatal crashes for all modes. With more people walking and biking, renewed safety measures are required, including NJTPA’s funding of local safety projects and support for expanding Street Smart NJ pedestrian safety campaigns.

- **Support active transportation.** Walking, biking and other active transportation modes saw dramatic growth during the pandemic. They help make the transportation system cleaner and more efficient and support public health. The plan supports more walking and cycling trails throughout the region, infrastructure upgrades and connections to provide better access to recreational, employment, residential and other destinations. Road projects should include bicycle or pedestrian elements. NJTPA programs support local land use regulations conducive to active transportation.
- **Support and improve North Jersey’s extensive transit system** to help solve some of the region’s most difficult mobility and environmental challenges. Completing new rail tunnels under the Hudson River and the larger Gateway Program are the highest transit investment priorities.
- Prioritize other transit investments, including: upgrading bus and rail transit service reliability with improved maintenance facilities, timely replacement of old vehicles, resiliency measures and expanded capacity; adding more frequent services to respond to and bolster demand where possible; extending commuter rail or light rail services in line with available funding where feasible; creating modern bus rapid transit systems and enhancing the network of services feeding and connecting to the transit system, including shuttle buses, on-demand vans and shared rides. Ferries and private bus services must also be supported.
- **Identify new and innovative [transit](#) funding sources** needed to complete the region’s many worthwhile and needed transit improvements. NJ TRANSIT is the largest public transit operator in the country and has made strides to improve its financial stability in recent years but has continued financial constraints.
- **Support local mobility services**, such as county and local bus systems, Access Link ADA paratransit, employment shuttles and first mile shuttles to transit, all of which are crucial in providing travel options for those who do not have access to a car, cannot drive, or who cannot take regular transit. NJTPA will continue to support and fund the eight TMAs serving the state, which have a crucial role in working with employers and in assessing local needs to integrate transit into communities and local economies.
- **Help municipalities capitalize on their transit facilities** to create Transit Oriented Development (TOD) through NJTPA programs and coordination with NJ TRANSIT and TNJ. TOD supports convenient bus and rail service and walkable, complete streets. These efforts extend to creating new mixed-use neighborhoods in suburban areas, rural villages, and redevelopment sites — former offices, malls and industrial areas. Improving parking near transit hubs and park-and-ride lots is important to supporting suburban and rural transit access.
- **Take advantage of transportation technology** that can make the transportation system safer and more efficient. Emerging technologies such as connected and automated vehicles promise even more dramatic benefits over the life of this plan. But the NJTPA and other agencies must guide how such new technologies are integrated into the transportation network and ensure they are applied equitably and respond to mobility needs. Near-term priorities include adaptive traffic signals and other Intelligent Transportation System (ITS) applications. In keeping with the themes of this plan, the NJTPA’s planning activities seek to ensure that technology deployment is people-focused — helping address genuine community needs and offering social benefits.
- **Respond to continued growth of freight** through the region’s port, air cargo, rail facilities and distribution centers. The growing goods movement sector presents important economic opportunities. Priorities for the freight sector include: providing sufficient and safe truck parking

and rest areas; improving landside road and rail connections to maritime terminals and facilities; expanding waterborne movement of cargo on designated “marine highways” or via short sea shipping; and upgrading rail infrastructure to support national standards; among other measures. Practices are needed to effectively integrate these operations with other land uses and communities, particularly in greenfield locations.

Environment

New Jersey is the most densely populated state in the nation, and North Jersey includes the state’s most densely populated counties. Even so, much of the region is undeveloped, with large expanses of open space, including forests and preserved areas, parks, wetlands, and farmland. This plan recognizes the importance of protecting open space and enhancing environmental quality. The plan’s environmental chapter recognizes that well-planned transportation can be integrated into the environment with manageable impacts. Of particular importance:

- **Climate Change** – North Jersey is particularly vulnerable to climate change impacts due to its dense population and extensive coastline and waterways. NJTPA will use its programs to help reduce greenhouse gases generated by the transportation sector and to adapt infrastructure to meet climate impacts. This includes support for state climate change initiatives and policies which call for an 80 percent reduction in greenhouse gases by 2050. Among other measures, the plan calls for supporting vehicle electrification, low-carbon transit and walking/biking options; funding studies to address the vulnerability of transportation infrastructure to climate change; and allocating federal funds to clean air projects.
- **Clean Air:** The NJTPA is responsible for advancing transportation policies and projects that will help improve air quality. To address air quality non-attainment and maintenance, the NJTPA is required to demonstrate conformity with state air quality commitments for projects in this plan and in the Transportation Improvement Program (TIP). In addition, the NJTPA supports continued air quality progress through its programs using federal Congestion Mitigation Air Quality (CMAQ) funding including supporting a variety of Transportation Clean Air Measures such as adaptive traffic signal systems and less-polluting off-road diesel construction equipment, ferry engines and electric vehicles and infrastructure. CMAQ funding is also allocated to support local mobility options such as shuttles operated by the TMAs and counties.
- **Environmental Mitigation:** The NJTPA’s planning and project development programs are designed to address the impacts transportation projects can have on both the human and natural environments. Multi-disciplinary teams from the subregions, NJTPA and NJDOT work together on project development with the goal of avoiding impacts and minimizing and/or mitigating impacts that do occur. This includes mitigating impacts on water [resources \(including waterways and aquifers\)](#) and other natural features, and cultural and historical resources. NJTPA planning also seeks to preserve open space, ~~protect aquifers~~ and safeguard wildlife habitat.

Financial Element

Guided by the NJTPA’s long-standing goals for the region, this plan presents a balanced vision for investment in the transportation system through the year 2050. Projections prepared for the financial element of this plan look to a full economic recovery from the deep impacts of the pandemic over the next five to ten years.

For the long term, the region is projected to resume growth at a rate of 2.3 percent annually, in line with rates prior to the pandemic. While new methods of financing transportation will be needed –including to recoup fuel tax revenue lost to vehicle electrification – this plan foresees an average of \$4.2 billion in year of expenditure (YOE) dollars available annually for current and future transportation needs, including strategic system expansion. This totals just over \$~~120.4~~120.6 billion over the life of the plan. If additional funding can be secured, the region could fulfill a more aspirational approach to improving regional transportation with investment of \$5.1 billion per year.

Plan 2050 provides North Jersey with a foundation that will allow the region to flexibly meet the challenges and opportunities ahead. In guiding these efforts, this ambitious plan recognizes that maintaining and improving the transportation system, meeting the needs of people, enhancing opportunities, and adapting to change is our path to 2050.

This publication is financed by the Federal Highway Administration and Federal Transit Administration of the U.S. Department of Transportation. The NJTPA is solely responsible for its contents.