



New Jersey Statewide Data System Research Agenda 2024-2027

Consistent with its mission to develop and maintain a statewide longitudinal data system linking administrative records for state agency partners to inform policymaking and decision-making in New Jersey, the following vision guides the research agenda:

NJSDS aims to help the public and stakeholders make data-informed decisions to improve public policies and practices for New Jersey residents. This includes facilitating longitudinal and linked-data research, providing statistical data, and publishing reports on the NJSDS website.

The research agenda for 2024 through 2027 was guided by stakeholder feedback and a review of policy priorities in the state. It is presented first through overarching priorities, then through high-level research areas of interest.

Priorities

I. Cross-Sector Data and Accuracy

There are several priority areas stakeholders identified related to improving the scope of the data in NJSDS and the quality of administrative data across the state and within the system. Efforts aligned with this priority area include:

- More comprehensive data collection on social determinants of health and sexual orientation/gender identity variables
- More nuanced and shared definitions of variables such as disability type
- Stakeholders across sectors noted the importance of expanding the scope of NJSDS data to include additional linkages to better understand holistic individual experiences throughout their service and program pathways:
 - To health records
 - Homelessness and other content-specific survey data
 - Licensure data
 - Industry certification data
 - Justice data
 - Treasury/self-employment records
 - Human services data

Regarding source data provided by state agencies, a related priority area is improving data quality to ensure administrative data is useable. This may include exploring how to enhance the State's ability to manage ID resolution internally within each agency, as well as across sectors. In addition, expanded data

collection and quality assurance measures may be required to complete analyses as outlined for this work. Finally, further developing an accurate measure of annual wages responsive to the population and research topics explored in future products will be prioritized.

II. Applying an Equity Lens

Conversations with stakeholders and the mission of our shared organizations and system highlighted the importance of identifying the equitability of individual experiences, access, outcomes, and opportunities. Addressing this, NJSDS will center the role individual factors and intersectionality play in the outcomes explored. To the extent possible, all analyses will include additional research questions related to how outcomes differ by individual characteristics and provide results to the most granular disaggregation of characteristics that disclosure policies allow.

III. Ensuring Stakeholder Collaboration

Conversations with external stakeholders highlighted key groups who were not currently involved in the NJSDS research development or dissemination process. Future efforts will be made for each deliverable to ensure better inclusion of perspectives in the development and review process and broader dissemination and product feedback and suggestion process. In addition, while the broad research areas below guide the system, efforts will be made to include stakeholders in specific topic areas to pursue which align with the research agenda.

Research Areas

I. Exploring pathways through services and systems to understand outcomes and patterns of service use.

A primary strength of the NJSDS system is its ability to explore pathways through various sectors and experiences. This research agenda will focus on analyses that explore such pathways through the services and systems available in the data currently available while exploring opportunities for expanding data sources in the future. Research topics under this area may include:

- How individuals experience behavioral and mental health services; developmental health; justice services; higher education and workforce training; social services; healthcare and employment, and how interactions with these services relate to one another
 - Outcomes such as mental health, employment, economic success, graduation rates, educational enrollment, service utilization
- Pathways of individuals between work and education, how they build credentials during and between work experiences, and how those relate to outcomes, with a particular focus on bringing in non-credit credential data to the system

II. Assessing outcomes of human capital investments, program participation, or service receipt and factors and experiences that impact long-term outcomes.

Research and evaluate the effectiveness of policies, experiences, and programs offered by each of the public agency members. These policies and programs may include, but are not limited to, adult literacy; apprenticeships; career and technical education; college access and completion; financial aid and lending; career training, placement, and retention programs, etc.

Additional topics under this area include assessing and monitoring how state programs address disparities in outcomes (such as credential attainment, career trajectories, etc.) of populations historically disadvantaged and economically excluded on the basis of characteristics such as age, race, ethnicity, gender, nationality, citizenship, residence, etc.

Additionally, this topic area can include studies that address return on investment of state programs and resources. Addressing questions such as:

- How can we leverage NJSDS to understand the value of state programs/resources?
 - Public accountability: enhance transparency and public accountability by showcasing the tangible outcomes of state programs
 - Track the outcomes of state programs over time, allowing for a quantitative assessment of their impact on various metrics such as educational attainment, workforce participation, and economic contributions

Finally, research related to long-term outcomes and factors which influence them may include topics such as:

- Intergenerational impact of services on child wellbeing
- Enrollment in postsecondary education and educational outcomes for those who were previously incarcerated
- Impact of experiences and characteristics (foster care, disability), experiences (advanced placement, extracurricular), or services/resources (subsidized childcare, financial aid) on outcomes (educational attainment, employment, service utilization)
- Intermediary outcomes of education and training receipt

IV. Exploring Predictive Analytics to Offer Early Intervention Warnings

This agenda will emphasize a fuller use of NJSDS to explore the potential of predictive and explanatory analyses to make connections between key transition points and to assess their likely impact on outcomes across systems and over time. Such efforts would offer template tools and code based on the large dataset of NJSDS to allow more granular adoption and data to inform decision-making. Stakeholders noted the importance of utilizing the rich data source to better understand predictors of key outcomes of interest, including, among other priority areas that would be defined by stakeholders:

- Patterns of instability (frequent employment change, educational enrollment, downward earnings trends)
- Predictors of program or educational retention, post-education positive outcomes
- Predictors of negative outcomes such as violence and overdose for individuals in New Jersey
- Predictors of disparities in educational and employment outcomes for individuals, programs, and sectors defined by stakeholders
- Social determinants of health for individuals in New Jersey
- To the extent possible with the data, exploring potential tools to better predict CIP-SOC-NAICS pathways and codes
- Factors influencing pipeline exits across sectors of interest to be defined by stakeholders