This report describes work conducted by four grantees—Connecticut, Indiana, South Carolina, and Wisconsin—under funding opportunity number HHS-2008-ACF-OPRE-PD-0059 of the United States Department of Health and Human Services (HHS) Administration for Children and Families (ACF). The report was prepared by the Urban Institute under contract number GS23F8198H, order number HHSP233200800561G. The views expressed here are those of the authors and should not be attributed to the Urban Institute, its trustees, the grantees, or HHS/ACF. We would like to thank the grantees for taking the time to help us understand their projects and progress, Mary Murphy and Gretchen Rowe for contributions in the first half of the project, and Caroline Ratcliffe and Sheila Zedlewski for review and comments to earlier versions of the report.
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In the fall of 2008, the Department of Health and Human Services (HHS), Administration for Children and Families (ACF) provided grants to four states—Connecticut, Indiana, South Carolina, and Wisconsin—to enhance their use of Temporary Assistance for Needy Families (TANF) and related administrative data for operational, administrative, policy development, or research purposes. The grantees proposed to use the data linkages created under their projects to identify unreported employment in Indiana and South Carolina, to develop outcome measures in Connecticut and South Carolina, and to analyze Connecticut’s employment and training program, Wisconsin’s TANF application process, and changes in the characteristics of South Carolina’s and Wisconsin’s TANF caseload. The Urban Institute was selected as the Technical Assistance Contractor for the grant, to facilitate collaboration among the grantees and provide technical assistance, monitoring, and documentation for the project.

ACF expressed particular interest in supporting projects that use the National Directory of New Hires (NDNH). The NDNH is a national database maintained by the federal Office of Child Support Enforcement (OCSE). The database is constructed for child support enforcement purposes and contains data on newly hired individuals, quarterly wages reported by employers to the Unemployment Insurance (UI) system, and UI applications and benefits. TANF agencies are permitted to request matches with the NDNH in order to help them carry out their responsibilities under the TANF program. Federal law also allows researchers to request de-identified NDNH data for TANF and child support research purposes.1

During the three years of the project, the grantees met most of their proposed objectives, but some plans were dropped or scaled back due to data limitations, unexpected costs, or competing agency demands. Unexpected costs and limitations of the NDNH for research purposes caused Connecticut to scale back its plans for use of the NDNH and South Carolina and Wisconsin to drop planned use of the NDNH altogether. Indiana obtained NDNH matches for employment verification as proposed, but major changes in the administration of the state’s TANF program prevented other grant objectives from being met, and Indiana returned most of its grant funds to the federal government. South Carolina’s project faced challenges due to the competing demands on agency staff arising from the combined effect of increased caseloads and staff reductions, as well as from a reorganization of the state’s workforce agency that resulted in the need to renegotiate a long-standing data sharing agreement allowing access to state UI wage data. While scaling back work in some areas, Connecticut, South Carolina, and Wisconsin pursued new objectives that were consistent with the overall goals of the grant but were not originally proposed.

This report describes the status of each state’s project at or near its conclusion.2 Information was obtained from each state’s grant application, interviews, meetings, and teleconferences held over the course of the contract, and final telephone interviews

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1 42 USC 653 (j)(5).
2 Work continues in South Carolina, which received an extension through September 2012 and in Connecticut, which received an extension through March 31, 2012.
conducted with the grantees in December 2011 and January 2012. Where available, we have also reviewed draft or final reports and presentations prepared under grant funds.

Section I describes the agencies and organizations involved in each state, the history of collaboration between these entities, the process by which each state developed its plan, and the rationale for the resulting division of work between government and contract staff. Section II describes each state’s goals and achievements, including new database linkages and the types of activities, analyses, and reports made possible by the linked data. Sections III and IV describe the grantees’ views on factors presenting challenges and factors contributing to success. Section V discusses the collaborative activities and technical assistance provided by the Urban Institute, and section VI concludes with a summary and recommendations for supporting future state efforts. Additional details concerning the NDNH and individual state projects are provided in the appendices.

I. Agency and Contractor Involvement and Plan Development

Table 1 shows the agencies and organizations involved in the work conducted under each state’s grant. In Indiana, South Carolina, and Wisconsin, the lead agency was the department responsible for the administration of the state’s TANF program. In Connecticut, the project was headed by the Connecticut Department of Labor (DOL), which administers the state’s Jobs First Employment Services (JFES) program. Three of the states (Connecticut, South Carolina, and Wisconsin) partnered with university researchers, all of whom had worked with the state on prior projects involving administrative data and played key roles in developing the plans for the current project. Indiana initially contracted much of its work to the IBM-led coalition that had operated the state’s TANF program since 2007. With the cancellation of Indiana’s contract with IBM in October 2009, remaining work under the grant was carried out by state employees and subcontractors that continued to work for the state.
### Table 1: Agencies and Organizations Involved, by State

<table>
<thead>
<tr>
<th>State</th>
<th>Lead Agency</th>
<th>Consulting Agency</th>
<th>Private Contractor</th>
<th>Research Institution</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Connecticut</strong></td>
<td>Department of Labor: Office of Research &amp; Welfare to Work Unit</td>
<td></td>
<td></td>
<td>University of Connecticut</td>
</tr>
<tr>
<td><strong>Indiana</strong></td>
<td>Family and Social Services</td>
<td>Office of Research and Statistics, State Budget and Control Board</td>
<td>IBM-led coalition (IBM and subcontractors)(^1)</td>
<td>University of North Carolina, Greensboro; Institute for Families in Society, University of South Carolina(^2)</td>
</tr>
<tr>
<td><strong>South Carolina</strong></td>
<td>Department of Social Services: Division of Family Resources</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Wisconsin</strong></td>
<td>Department of Children and Families, Bureau of Working Families</td>
<td></td>
<td></td>
<td>Institute for Research on Poverty, University of Wisconsin</td>
</tr>
</tbody>
</table>
The team had prior expertise with the data, having already used a subset of the data for other nonexperimental analyses. The director of the Office of Research at the project’s outset was a long-time proponent of evaluation who had been committed to these activities through staff hires and data development for many years. He had hired several Ph.D. economist candidates from UConn to work in his office as analysts while completing their studies, some of whom had gone on to permanent positions with the DOL. Upon his retirement in the second year of the grant, the project continued with the support of a new research director, Andrew Condon.

The university researcher associated with the project had a history of collaboration with DOL dating back to 2003 and had worked with the DOL to create and analyze a linked database consisting of state UI quarterly wage data and data from the Quarterly Census of Employment and Wages (QCEW) and the Department of Motor Vehicles (DMV). The DOL Welfare to Work manager had a close working relationship with the director and staff of Connecticut’s TANF program—Temporary Family Assistance (TFA)—and received regular data updates from TFA.

Prior to the grant announcement, the university researcher associated with the project had approached the DOL about the possibility of using past experimental data and state administrative data to conduct an evaluation of JFES outcomes using nonexperimental methods. Soon after bringing up this idea, the grant announcement came out. The DOL added to the proposal the idea of developing outcome measures, and UConn and DOL put forward the joint plan for study for the grant. The Welfare to Work manager joined in the collaboration, given her knowledge as director of the JFES program and access to the necessary JFES and TFA data.

The division of responsibility across project members arose naturally from their areas of expertise and past working relationships. The director of the Office of Research (as of the beginning of the project) was an expert on Connecticut’s linked administrative dataset combining the UI quarterly wage, QCEW, and DMV data. His responsibilities included collecting and reporting the state UI quarterly wage data, and he had arranged the agreements required for development of the linked dataset. The director’s role in the grant was to provide overall management of the project, manage the programmers on his staff, and negotiate access to the additional data required for the project. The Welfare to Work manager helped analysts understand the JFES and TFA data and served as a conduit to TFA for additional information. The UConn researcher led the evaluation analysis, working closely with an economist and research analyst/programmer at DOL, provided input required for negotiating access to the NDNH, and directed the analysis of the flow of clients through TANF and the employment services system. The director of the Office of Research, the Welfare to Work manager, the UConn researcher, and the TFA director and staff were all involved in discussions concerning the outcome measures developed under the project.
Indiana

The Division of Family Resources of the Family and Social Services Administration (FSSA) was the lead agency for Indiana’s grant. The project was directed by Jim Dunn, the program manager for TANF and Indiana Manpower Placement and Comprehensive Training (IMPACT) policy. Under the plans described in Indiana’s grant application, most of the work was to be handled by the IBM-led coalition that was then handling welfare eligibility determination and employment and training services for the state. Deloitte, the state’s contractor for the welfare eligibility computer system, was also to be involved in the project.

The relationship between FSSA and the IBM-led coalition began in December 2006 when Indiana privatized its welfare system with the award of a 10-year contract to the IBM-led coalition. However, Indiana was not satisfied with IBM’s performance and cancelled the privatization contract in October 2009 (one year into the grant period). Beginning in 2010, the state began phasing in a “hybrid” model that retained some of the infrastructure that worked under privatization and abandoned or modified what did not work. Transition to the hybrid model continued throughout the remainder of the grant period, with completion anticipated in February 2012.

Indiana pursued the grant primarily because the state was open to receiving additional federal funds and because Arbor, the IBM subcontractor responsible for employment and training programs, was interested in using the NDNH to increase Indiana’s TANF work participation rate. Indiana had tested use of the NDNH in 2005, submitting cases one by one through a manual match. However, the state found that the level of effort required for the manual match was not worthwhile given the low match rate and abandoned the effort. When Arbor suggested matching against the NDNH, the state agreed, as long as grant funds would pay for automation of the process.

FSSA staff created the plan, with agreement from the IBM-led coalition and Deloitte to complete the work. The division of responsibility reflected the nature of Indiana’s then-privatized system and the various roles and responsibilities of IBM, its subcontractors, and Deloitte. FSSA was to administer the grant and distribute the work to coalition members as necessary. IBM and Deloitte were to be responsible for implementing the systems changes necessary to incorporate the results of matches with the NDNH, and Arbor and Affiliated Computer Services (ACS) were to be responsible for administering the matches in the second and third years of the project. The project included funds for additional subcontractors—Keane, for fees related to changes to the data warehouses; and First Data, to provide evaluation services for the project. With the cancellation of the contract with IBM, remaining work on the grant was carried out by state employees and subcontractors who continued to work for the state.

South Carolina

South Carolina’s project was designed as a three-way partnership between the South Carolina Department of Social Services (DSS), University of North Carolina at
Greensboro (UNCG), and Office of Research and Statistics (ORS) of the State Budget and Control Board, which manages South Carolina’s data warehouse. Under the proposed project plan, Marilyn Edelhoch, DSS director of research and analysis, would serve as research director, playing a central coordinating role for the entire project. David Ribar, professor at UNCG, would serve as co-investigator, handling much of the research related work. ORS would carry out much of the work to generate statistics and develop reporting tools, with Diana Tester, ORS program manager/senior consultant, serving as the ORS project liaison. Linda Martin, DSS director of the Division of Economic Services, would be engaged in the project—attending project meetings and advising the project to ensure that the state’s TANF needs were met.

All key proposed personnel remained involved throughout the project, although there were some changes in their roles and extent of involvement. The DSS research director left state employment but continued work on the project as a consultant, managing the project throughout the first two years of the grant. The original ORS liaison for the project left ORS and joined DSS early in the project, taking on data analysis work at DSS and handling much of the project management in the third year of the grant. A new ORS liaison, Sarah Crawford, was designated for the project. A second university researcher, Qiduan Liu (from the Center for Child and Family Studies, University of South Carolina), joined the project as a consultant in the first year. She was previously employed by DSS and was the person mainly responsible for the development of past reports using TANF administrative data.

Collaboration between DSS and ORS dates back to 1994, and several members of the DSS and ORS project team entered the project with more than twenty years of collaboration. The lead UNCG researcher entered the project with six years of prior experience collaborating with DSS and ORS on administrative data projects.

The director of the Division of Economic Services was the primary motivator for the project. Departures of three key staff members and other organizational changes had left the DSS without the means to obtain important caseload information about the TANF program. It was anticipated that the grant would provide the opportunity for South Carolina to examine its needs with respect to caseload and performance measures, review what other states are doing in this area, design and create caseload and performance measures and reporting tools, and develop the division’s statistical capacity by enabling the hiring and training of a statistician. In addition, members of the project team had recently completed a longitudinal analysis of food stamp program participation that had enabled field workers to understand how important administrative factors are in influencing food stamp take-up and spell duration. The grant provided South Carolina with the opportunity to extend this analysis to the TANF program.

The project plan was prepared primarily by the lead UNCG researcher, following the broad outlines provided by DSS. All project partners provided input and reviewed the resulting plan. Project members report that staffing of the project arose naturally out of the past experience and working relationships of members of the project team.
Wisconsin

Most of the work under Wisconsin’s project was carried out by the Institute for Research on Poverty of the University of Wisconsin (IRP). Key project members at IRP included Maria Cancian, Jennifer Noyes, Pat Brown, and Eunhee Han. The Research and Statistics Section of the Bureau of Working Families within Wisconsin’s Department of Children and Families (DCF) provided project management and in-kind services for the grant. Michael Soref, chief of the Research and Statistics Section, oversaw the project until his retirement in the second year of the grant. Responsibility for the project was then transferred to Melissa Wavelet, the head of DCF’s Bureau of Performance Management, Office of Performance and Quality Assurance, Office of the Secretary.3

At the time of the grant announcement, Wisconsin’s TANF program was housed in the Department of Workforce Development (DWD), but the state had announced a reorganization that would bring together programs involving children into a single unit—DCF. DWD/DCF and IRP have a long-standing history of collaboration on administrative data research projects. The relationship between the two entities dates back to the 1980s, and key staff involved in the project had collaborated for nine or more years at the start of the project.

Staff at DCF and IRP spotted the grant announcement and thought that it looked like an excellent opportunity for Wisconsin. A key goal of the creation of DCF was to better coordinate child welfare services with other programs serving children. The funding and three-year window provided by the grant gave Wisconsin the means to further this goal by linking the child welfare administrative data with data from other child-related programs. The grant opportunity also appealed to Wisconsin because it provided the opportunity to do a follow-up study to a 2006 TANF applicant study and to perform an analysis of TANF recipients. In addition, the administrative data focus of the grant would enable Wisconsin to invest in consolidating, refining, and documenting administrative data systems developed under past projects and to prepare the foundation for a data system containing the full universe of cases with involvement in any of Wisconsin’s child-related programs. IRP staff took primary responsibility for writing the grant application, with DWD providing extensive input and review.

The decision to contract the work to IRP arose from the existing relationship and past collaborative efforts between DWD/DCF and IRP and was motivated by the history of collaboration between IRP and DCF, the administrative data and program expertise developed on past projects by IRP staff, and the mutual interest of IRP and DCF in the work to be performed under the grant.

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3 Melissa Wavelet has since been promoted to Deputy Division Administrator. Project members note that the transfer of responsibility for the project from a program division to a position with departmentwide responsibilities reflects DCF’s commitment to the work.
II. Project Goals and Achievements

Each of the grantees proposed to use grant funds to enhance its state’s ability to link and use administrative data from various sources, including (if possible) the NDNH, to improve the administration of its TANF program. Beyond this common goal, work funded under the grant fell into three broad categories: (1) identifying unreported employment of TANF clients in order to take action on individual cases and increase the TANF work participation rate; (2) developing standard outcome measures to inform state and local administrators and staff; and (3) providing specific analyses or evaluations to help inform policy decisions. Table 2 lays out the proposed and completed work of each state.

Identifying unreported employment was Indiana’s primary objective and a secondary objective for South Carolina. Indiana met its goal of using the NDNH to identify unreported employment. South Carolina dropped this objective out of concern for the potential burden on caseworkers and based on Indiana’s finding that the NDNH match was not cost effective. Due to unexpected costs and limitations of the NDNH for research purposes, Connecticut scaled back and South Carolina and Wisconsin dropped plans for a research match with the NDNH. All three states successfully completed matches with the other administrative data sources proposed in their grant applications, and South Carolina and Wisconsin incorporated additional datasets that were not originally proposed. Connecticut and South Carolina met their objectives of developing standard outcome measures to inform state and local administrators and staff about caseload characteristics and outcomes. South Carolina had also proposed to develop desktop applications to deliver this information to state and county administrators in a customizable format. Some initial work was performed toward this goal but the objective was not fully realized due to competing demands on agency staff.
<table>
<thead>
<tr>
<th>Goals</th>
<th>Connecticut</th>
<th>Indiana</th>
<th>South Carolina</th>
<th>Wisconsin</th>
</tr>
</thead>
<tbody>
<tr>
<td>Identify unreported employment for action on individual cases</td>
<td></td>
<td>X</td>
<td>(dropped)</td>
<td></td>
</tr>
<tr>
<td>Develop ongoing program outcome measures</td>
<td>X</td>
<td>X</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Produce additional analyses/evaluation</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td><strong>Data Development and Reporting Tools</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Develop longitudinal linked database</td>
<td>X</td>
<td>X</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>Develop desk-top report generating tool for state and county administrators</td>
<td>(initial</td>
<td></td>
<td></td>
<td>work)</td>
</tr>
<tr>
<td><strong>Key Issues to be Examined</strong></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Post-TANF outcomes</td>
<td>X</td>
<td>(dropped)</td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>TANF spell length and duration</td>
<td></td>
<td></td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>Characteristics of TANF recipients</td>
<td></td>
<td></td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>Earnings and program history of TANF applicants</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>Multiple program participation</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>Outcomes of TANF application process</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
</tbody>
</table>

1 An X indicates that a task was proposed and completed. If the state did not propose work on a particular task, the table cell is left blank. Proposed work that was later dropped or partially completed is indicated in parentheses.

Connecticut, South Carolina, and Wisconsin proposed and completed in-depth analyses and evaluations under the grant. Indiana’s grant application mentioned examining post-TANF outcomes, but this was a lower priority and Indiana never addressed this objective. Connecticut completed an analysis that tested the use of nonexperimental methods to analyze the impact of Connecticut’s welfare to work program, but found that although the methods held promise, they could not rule out the possibility of misleading results. As a result, the project dropped plans to use the methods to analyze current program impacts and refocused efforts toward production of a report analyzing the flow of clients through TANF and the employment services system. Wisconsin completed its proposed studies focused on TANF applicant and recipient cohorts, as well as a proposed paper describing the multi-sample person file (MSPF) developed under the grant. Additional analyses made possible by the MSPF were
produced under other funding during the period covered by the grant. In the first year of the project, South Carolina proposed a TANF cohort analysis based on the approach used in Wisconsin. As of December 2011, project members had presented descriptive results of the analysis at a conference and prepared a draft report, and plans were underway for further econometric analysis.

**Administrative Data Linkages**

A key project goal for Connecticut, South Carolina, and Wisconsin was to expand upon existing linked longitudinal databases in order to address research and programmatic questions under the grant and to build capacity to answer additional questions in the future. In addition, Wisconsin proposed investigating the feasibility of constructing a linked administrative database containing the full universe of individuals in various government programs. The project quickly moved beyond investigation to development of the MSPF. Because the three states built upon an extensive body of past work, a number of data linkages were in place prior to the start of project or had been linked on an ad hoc basis in prior work (table 3). Additional administrative datasets were linked with TANF administrative data as part of the work proposed and completed under the grant (table 4).
| **Table 3: Existing Data Linkages, by State**<sup>1</sup> |
|---------------------------------|-----------------|-----------------|-----------------|
| **Wages/New Hires Data**        | Connecticut     | Indiana         | South Carolina  | Wisconsin       |
| State UI Wage Data              | X               | X               | X               | X               |
| State New Hires Data            |                 | X               |                 |                 |
| The Work Number<sup>2</sup>     |                 | individual case look-up | individual case look-up | |
| **Program Data**                |                 |                 |                 |                 |
| TANF Eligibility/Job Services<sup>3</sup> | X               | X               | X               | X               |
| SSI<sup>4</sup>                 |                 |                 | X               |                 |
| Food Stamps                     |                 |                 | X               | X               |
| Child Care                      |                 |                 |                 | X               |
| Child Support                   |                 |                 |                 | X               |
| Medicaid/CHIP                   |                 |                 |                 | X               |
| **Other Data**                  |                 |                 |                 |                 |
| Quarterly Census of Employment and Wages (employer characteristics) | X               |                 |                 |                 |
| Department of Motor Vehicles   | X               |                 |                 |                 |

1. State data systems may include additional linkages beyond those shown here. The linkages shown here are those relevant to the work proposed under the grant that were in place or had been previously linked as of the beginning of the grant in 2008.
2. Indiana and South Carolina access The Work Number on a case by case basis (not batch) for employment verification.
3. Connecticut and South Carolina proposed analysis of TANF-related employment services. Employment services and TANF eligibility are in separate systems but had been linked in the past and were proposed as linkages under the grant. Wisconsin and Indiana did not propose to analyze employment services.
4. Wisconsin's SSI data come from the CARES system and do not cover all SSI recipients.
Table 4: New Database Linkages, by State
(X= New Linkage Proposed and Completed, Blank = Existing or Not Proposed)

<table>
<thead>
<tr>
<th>Wages/New Hires Data</th>
<th>Connecticut</th>
<th>Indiana</th>
<th>South Carolina</th>
<th>Wisconsin</th>
</tr>
</thead>
<tbody>
<tr>
<td>NDNH</td>
<td>X</td>
<td>X</td>
<td>(dropped)</td>
<td>(dropped)</td>
</tr>
<tr>
<td>The Work Number</td>
<td></td>
<td></td>
<td>(dropped plans to automate)</td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Program Data</th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>TANF Eligibility/Job Services</td>
<td>X</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Medicaid/CHIP</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>Child Welfare</td>
<td>X</td>
<td></td>
<td>X</td>
<td></td>
</tr>
<tr>
<td>Corrections/Jail Data</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
<tr>
<td>State UI Benefits Data</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Other Enhancements</th>
<th></th>
<th></th>
<th></th>
<th></th>
</tr>
</thead>
<tbody>
<tr>
<td>Updates to Prior Linkages</td>
<td>X</td>
<td></td>
<td>X</td>
<td>X</td>
</tr>
<tr>
<td>Creation of Multi-sample Person File</td>
<td></td>
<td></td>
<td></td>
<td>X</td>
</tr>
</tbody>
</table>

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1 See table 3 for linkages that were already in place at the start of the project or had been linked in prior work.
2 Connecticut linked TANF eligibility, job services, and NDNH data to an existing database that combined state UI wage data with Department of Motor Vehicles and Quarterly Census of Employment and Wages data.
3 Indiana accesses The Work Number on a case by case basis (not batch) for employment verification. Indiana proposed automating the process but dropped plans to do so due to higher than expected costs to access the data.
4 South Carolina dropped plans for use of the NDNH due to data and access limitations and redirected funds to other project goals. South Carolina did not include Medicaid/CHIP and child welfare data in its grant application, but included them as part of the cohort analysis that was added to the project in the first year of the grant.
5 Wisconsin dropped plans to use the NDNH due to data and access limitations and redirected funds toward incorporating the state UI benefits data, which had not been included in the original proposed work. Wisconsin’s grant application proposed investigating the feasibility of creating a multi-sample person file (MSPF) containing the full universe of persons involved in any of a number of programs, but the project quickly moved on to actual development and prepared a technical report documenting the creation of the MSPF and lessons learned from the effort (Brown 2011). Wisconsin incorporated state corrections and Milwaukee jail data into the MSPF under separate funding.
**NDNH**

When announcing the grant, ACF expressed a clear interest in projects that would use the NDNH, and all of the grantees proposed use of the NDNH in their grant applications. The NDNH is a national database maintained by OCSE for child support enforcement purposes. It contains data on newly hired individuals (obtained from W-4 forms), quarterly wages reported by employers to the UI system, and UI applications and benefits (OCSE 2009). The NDNH data are assembled from state and federal sources. Each state enters new hires data for employers in that state into a state directory of new hires. The state workforce agencies in each state are responsible for collecting and managing UI quarterly wage and UI benefit data for their state. States transmit their new hires and UI data to OCSE for inclusion in the NDNH. Data on federal employment are obtained from the federal government. Some workers are not included in the NDNH or underlying state and federal data sources—namely, the self-employed and persons working “off the books.”

The primary reason for a state to use the NDNH instead of the State Directory of New Hires or state UI quarterly wage data is that information is available about people who have obtained work or claimed unemployment insurance in another state, or are employed by the federal government. Multistate employers are allowed to submit all of their new hires data to only one state, so the NDNH is particularly useful for identifying new employment by interstate employers who report their new hires data to another state (ACF 2009).

Although the NDNH has been extensively used for identifying unreported TANF employment, it has been used less for TANF-related research purposes. In the first year of the project, Connecticut, South Carolina, and Wisconsin learned of key limitations regarding research use of the NDNH for the purposes planned for their projects. The limitations include the lack of historical NDNH data beyond two years, the inability to obtain longitudinal data with personal identifiers, and the potentially high cost of an NDNH match for research purposes (appendix A). As a result of these limitations, Connecticut scaled back and South Carolina and Wisconsin dropped plans for a match with the NDNH. Wisconsin redirected its resources to incorporating state UI benefits into its analysis. South Carolina incorporated child welfare and Medicaid/CHIP data, although these were not included in its original plan.

**Connecticut’s Administrative Data Linkages**

The Connecticut DOL maintains a longitudinal linked file that combines state UI quarterly wage data with data from the QCEW and DMV. The QCEW supplies data on each worker’s employer (such as industry and size) and the DMV supplies data on age and gender.

Under grant funding, project members linked DOL’s database to data from Connecticut’s JFES and TFA data. The JFES and TFA data were used to identify the employment services received, the timing of receipt, and whether the case was time-
limited or exempt, as well as to provide information on individuals such as age, family structure, and time on TFA.

JFES data were available to the researchers on this project, and the DOL had an existing agreement with the Connecticut Department of Social Services (DSS) for regular updates of TFA data matched to the JFES data. The TFA data are received on a monthly basis and include information for individuals receiving JFES services and a draw of all families in the TFA database (including those who are exempt, etc.).

Connecticut’s project also required access to data from a 1990s experimental evaluation of Connecticut’s welfare-to-work program and comparable DSS data on recipients from the same time period who were not in the treatment or control groups for the experiment. A separate negotiation was necessary to access these data from DSS and discussions began prior to submission of the grant application. An agreement was reached and analysis of the data began in the first year of the project.

Connecticut had proposed pursuing a research match with the NDNH in order to obtain earnings and employment data for persons not covered by Connecticut’s UI quarterly wage records, but scaled back plans in the first year of the project after learning of limitations associated with the NDNH. The project would ideally have had information for individuals prior to and after receiving JFES services, and had hoped to obtain NDNH data for the time period corresponding to the 1990s experimental evaluation. However, because OCSE deletes NDNH data after two years, data from the time of the experimental evaluation no longer exist, and little information is available on individuals prior to their time on JFES. Despite these limitations, project members pursued and obtained a research match that provided the most recent available quarterly wages for individuals in the 1990s experimental evaluation and comparable DSS clients from the same time period.\(^4\) The research team found that the NDNH supplied wage data for less than 2 percent of the DSS clients without UI quarterly wage data and did not affect the overall findings of the analysis. As expected, the NDNH match revealed employment in neighboring states and seasonal migratory employment in Florida, as well as additional employment distributed across the country.

**Indiana’s Administrative Data Linkages**

Indiana matches its TANF caseload against the State Directory of New Hires and state UI quarterly wage data in order to identify employment that has not been reported by TANF clients. In addition, Indiana submits individual case queries to The Work Number®—a payroll services provider that provides employment and wage data for more than 1,500 employers nationwide, covering about 28 percent of the employed population in the United States (Kellaher 2004).

Indiana’s primary objective for the grant was to match the TANF caseload against the NDNH in order to identify additional unreported employment. The data agreement

\(^4\) As required under the rules regarding an NDNH research match, the match was performed by OCSE and the results were returned to Connecticut as a de-identified file.
for the match was completed in the first year of the project and matches were conducted throughout the second and third years, with Indiana requesting matches for adults without known employment. Indiana had originally proposed to expand the match to include all adults in the caseload, including those known to have some employment. These plans were dropped due to competing priorities and because the matches that had been submitted returned little new information. Indiana had also proposed automating the match with The Work Number, but abandoned this idea in the first year of the project after further investigation showed the costs would be prohibitive.

South Carolina’s Administrative Data Linkages

South Carolina entered the project with an existing data warehouse—the Client History and Information Profile System (CHIPS)—that includes eligibility, benefit, and demographic information for applicants to and recipients of TANF and food stamp benefits dating back to 1989. Data on TANF related employment services and work activities are contained in the Participation and Tracking System (PATS). While CHIPS and PATS information had been linked to state UI quarterly wage data in the past on a project by project basis, the state planned to use grant funds to generate regular data linkages that would contribute to an ongoing, longitudinal dataset. Although not included in the original grant application, South Carolina incorporated child welfare and Medicaid/CHIP data into its linked data system in support of the cohort analysis that was proposed and approved in the first year of the grant. As of December 2011, South Carolina had incorporated PATS data into the linked data system, and was working to more efficiently automate the process.

South Carolina had originally planned to use the NDNH data longitudinally—tracking the employment of TANF participants before, during, and after their spell of TANF participation. South Carolina’s project involved the development of longitudinal earnings histories based on the state’s UI quarterly wage data, and it was hoped that the NDNH could be used to expand those histories to include information on out-of-state and federal employment.

As a result of information obtained during the first year of the project, South Carolina decided against pursuing a research match with the NDNH. While it is conceivably possible (under the research provisions of the NDNH) to construct longitudinal samples beginning with currently available data and extend that into the future, South Carolina’s project team felt there are too many uncertainties regarding the cost, time to set up an agreement, and limitations on use of the data for South Carolina to pursue this approach. South Carolina also investigated performing an employment identification match with the NDNH. Plans for an employment identification match were dropped based on Indiana’s finding that the NDNH match was not cost effective, and out of concern for the additional burden this would place on agency staff who were facing budget and staffing cuts along with increased caseloads.

South Carolina’s project members had not anticipated that any new data agreement other than the NDNH would be required to support the work performed under
the grant. However, with the addition of the cohort analysis in the first year of the grant, project members pursued and obtained an agreement with the Department of Health and Human Services for use of Medicaid/CHIP data. The project also had to renegotiate access to the state UI quarterly wage data when South Carolina’s Employment Security Commission (which had been responsible for the data) was replaced with a new Department of Employment and Workforce (DEW) in the spring of 2010. Final agreement was not reached until mid-way through the third year of the contract (spring of 2011). Although some preliminary analysis was possible using previously linked data, other work was delayed until receipt of the UI quarterly wage data. As a result, South Carolina requested and received an extension through September 2012 to conclude the work planned under the grant.

**Wisconsin’s Administrative Data Linkages**

Wisconsin’s Client Assistance for Re-Employment and Economic Support (CARES) database contains data back to the mid-1990s covering TANF, child care, food stamps, Medicaid, and the Children’s Health Insurance Program (CHIP). The data also include Supplemental Security Income (SSI) information obtained through a data exchange with the Social Security Administration. Wisconsin has previously linked CARES data to state UI quarterly wage data and state child support data. Wisconsin’s grant application proposed linking these sources of data as well as child welfare data.

Wisconsin had originally planned to include NDNH data in its linked data files and analyses. However, information obtained in the first year of the project showed that Wisconsin would not be able to access the NDNH as originally hoped—as a longitudinal database with personal identifiers. Based on these limitations, Wisconsin dropped plans for a match with the NDNH and redirected project resources toward incorporating UI benefits data into its linked data system and analyses. State Corrections data were also incorporated under separate funding.

Wisconsin’s grant application proposed investigating the feasibility of creating a linked dataset containing the full universe of cases involved in any of a number of government programs. The project well surpassed this goal with the creation of the MSPF—a longitudinal data system containing information about all program participants in the TANF, child care, food stamp, Medicaid/CHIP, child welfare, child support, state corrections, Milwaukee jail, and UI benefit programs. UI wage data are also included (for persons in at least one of the other programs). Data included in the MSPF date back to the 1990s for most programs.\(^5\)

The MSPF differs from Wisconsin’s prior data linkage efforts in that it contains information about all recipients in each of the represented programs, rather than just those in the sample of interest for a particular study (such as TANF recipients). Developing a linked data system containing the full caseload for each program enables analysis of the extent to which families participate in multiple programs—whether simultaneously or

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\(^5\) Child welfare data are included beginning in 2004 and UI benefits are included beginning in 2006.
over time. Project members documented the methods used to create the MSPF and lessons learned from the effort in a technical report (Brown 2011).

Data-sharing agreements for most datasets were in place prior to the start of the project. Modifications were required to an existing agreement to enable greater access to the Wisconsin Statewide Automated Child Welfare Information System (WiSACWIS), a process which took about four months. An agreement was also necessary to allow access to the UI benefits data. The corrections data were initially drawn from a publicly available database and therefore did not require a data-sharing agreement, although the project paid a small fee to have the data converted to an electronic format. Subsequently, a data-sharing agreement with the Wisconsin Department of Corrections was achieved providing access to corrections data with personal identifiers.

**Employment Identification**

TANF agencies are permitted to request matches with the NDNH in order to help them carry out their responsibilities under the TANF program, and a number of states have used matches with the NDNH to identify unreported employment (ACF 2009). Federal law requires that employment identified through an NDNH match be independently verified before action can be taken on the case.

**Indiana**

Indiana’s primary objective for work under the grant was to match its adult TANF caseload against the NDNH new hires data to identify unreported employment and improve the state’s work participation rate. In the first year of the project, Indiana completed the appropriate agreements with OCSE to receive monthly matches with the NDNH new hires data. Indiana submitted its first match request for adults without earnings in November 2009 and continued to submit monthly match requests through September 2011. When a match was found, the TANF caseworker first checked to see if the employment could be verified through The Work Number. If the employment was not identified by The Work Number query, then a written verification request was sent to the employer. If the employer failed to respond within two weeks of the request, a written request for verification was sent to the recipient.

Indiana originally planned to continuously track the outcomes of the employment verification process. By February 26, 2010, processing was complete for 1,385 of the 1,795 matched cases from the first monthly match. Of the 1,385 completed cases, 88 percent of the information obtained from the NDNH had no bearing on the case. In many of these cases, Indiana had already become aware of the employment through other means, such as from the State Directory of New Hires match or through delayed reports by clients. In other instances, caseworkers had been notified of the employment by the time the match file was submitted, but the employment had not yet been entered into the

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6 As of the end of June 2010, there were still 278 incomplete matches from November 2009. This may have resulted from these case records simply not being updated. However, due to resource constraints, Indiana was never able to further research these cases.
computer system. In some cases, employment was discovered through the NDNH match but did not affect eligibility or benefits.

Most of the processed matches from the January 2010 NDNH match had no impact on the case, either because the employment had already become known or because the employment had no effect on eligibility or benefits. Additionally, few of the February, March, and April 2010 TANF participant case closures were traced to NDNH matches.

Indiana originally planned to complete a formal report estimating the overall cost of conducting the NDNH matches—both payments for use of the NDNH data and verification/labor costs—versus the cost savings from reductions in benefits and case closures. Although a detailed evaluation was never completed, Indiana conducted several rough cost/benefit estimates throughout the grant period, all of which found the match to be cost ineffective.

The project director performed a final estimate when deciding whether to continue matching beyond the grant period. An analysis of NDNH matches returned in August 2011 resulted in identification of previously unknown employment for 191 individuals, resulting in $6,061 in avoided costs. Assuming that each case costs the state $40 to process and that the monthly number of cases would remain constant, the total annual savings would have been $72,732 ($6,061*12) and the total processing costs would have been $91,680 ($40*191*12), not counting the additional $40,319 the state would have been charged for the NDNH match or the cost of processing the 331 matches whose employment had already become known to the state.\(^7\) Based on these estimates, the project director determined that the match was not cost effective and so did not pursue an NDNH match agreement for federal fiscal year 2012.

Indiana’s grant application had also proposed automating the match with The Work Number, although this proved to be cost prohibitive. Indiana continued submitting cases to The Work Number on a case by case basis, and used The Work Number as the first step in verifying employment identified by the NDNH. Indiana’s plan to expand the NDNH matches to adults with earnings was never realized due to competing priorities and because the matches on adults without earnings had returned little new information.

**South Carolina**

South Carolina also proposed to use the NDNH to identify unreported employment of TANF clients, although this was not the primary objective for the grant. Plans were dropped due to concerns over the increased burden verification would place on caseworkers and as a result of Indiana’s finding that the NDNH yielded little additional employment information beyond what was already available from state sources.

\(^7\) According to Indiana’s project director, Indiana’s TANF caseload dropped substantially over the course of 2011, so both costs and savings may be overstated.
**Standard Outcome Measures**

Under grant funding, Connecticut and South Carolina developed standard outcome measures that can be produced on a regular basis to inform state and local administrators and staff about caseload characteristics and outcomes. South Carolina also proposed to implement desktop applications to enable administrators and county managers to view program statistics and generate custom reports. While some initial brainstorming was done regarding providing online access to custom reports, further work was not pursued due to competing demands on agency staff.

**Connecticut**

Connecticut used its assembled administrative data to develop longitudinal measures reflecting the outcomes of the JFES program and to describe the flow of clients through the TFA and JFES programs. The original goal was to develop a set of measures that would be more informative than previously used measures for operational and administrative staff and would be produced on an ongoing basis. Examples of outcomes include longitudinal averages of earnings and employment of participants and measures of long-term employment stability. As the project progressed, this goal was expanded to develop a broader set of tables that describes clients’ movement through JFES and TFA and to prepare a descriptive report based on this information.

The analysis focused on demographic characteristics, spell length by recipient characteristic, program activities, spell length by activity, and earnings and employment experiences before, during, and after the program. The analysis divides clients into the following four groups: (1) those continuously exempt from work requirements throughout their spell, (2) those time-limited throughout their spell, (3) those who start out exempt and then become time-limited, and (4) those who start out time-limited but then become exempt. The tables on which this analysis is based can be easily rerun with future data to update the analysis.

**South Carolina**

South Carolina’s grant application proposed development of three categories of longitudinal outcome measures to be produced on a regular schedule once development work was complete. The measures include participation event histories (e.g., length of time on TANF in the current spell and overall), earnings histories, and earnings outcomes. South Carolina had originally proposed that the participation event history measures include hazard and survivor functions, but after further communication with DSS in the first year of the grant it was decided that reporting results in a transition framework (focusing on the characteristics of entering and exiting cases) would be more helpful. Team members completed development of the reports, refining them over the

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8 A hazard function shows the probability that a spell of participation ends at a given point, given that it lasted that long, and a survivor function shows the probability that a spell lasts beyond a certain point. Hazard and survivor functions can be easily generated using the assembled data should the need arise.
course of the project to show results by type of assistance (federally funded, state-funded two-parent, and state-funded disabled) and case characteristic (education level, race, ethnicity, and prior program participation), and to distinguish child-only from other types of cases.

The reports generated under the grant funds were used to help inform a new administration that came into office in January 2011, and additional reports were created to help inform and track program goals of central interest to the new administration. For example, reports were developed to show the extent to which closures are “positive” (e.g., closed due to increased earnings, child support income, or unearned income) and how this compares to targets at the state level and by region and county office. Reports were also developed to track success in meeting goals regarding provision of economic services, job placements, job developer orders, job applications, and job interviews.

South Carolina’s grant application proposed development of report generating tools to enable administrators and county managers to generate custom “dash-board” reports using web-based queries. Team members engaged in some initial brainstorming concerning enabling online queries, but further work was not pursued due to competing priorities. Although online queries are not yet supported, the reports generated under the grant provide the content of a dashboard report, showing key program data at various levels of aggregation, and are distributed regularly to state, regional, and local administrators.

**Additional Analyses and Evaluation**

Connecticut, South Carolina, and Wisconsin identified additional analyses they would undertake under the grant. A key goal expressed in Connecticut’s grant application was a nonexperimental impact evaluation of the JFES program. In the first year of the grant, South Carolina proposed an additional study not included in its grant application—a cohort analysis of TANF clients in 2006 and 2008 (the study was later extended to include a 2009 cohort). Wisconsin proposed two studies—one focused on TANF applicants and one focused on TANF recipients. The two studies would use data from the MSPF and help test and inform further development of the MSPF.

The three states pursued the work as planned, although Connecticut dropped plans to evaluate the impact of JFES on current clients when tests of the nonexperimental methods to be used in analysis suggested this analysis would not be fruitful. As of December 2011, South Carolina had completed a descriptive analysis of the TANF cohorts in its study and was making plans for econometric analysis, and Wisconsin had completed the proposed work under the grant.
Connecticut—JFES Impact Evaluation

Connecticut proposed to analyze the impact of the JFES program on participants’ employment and earnings outcomes using nonexperimental methods, in particular, fixed-effect, random-growth, and propensity score techniques. Without conducting experimental research (where individuals are randomly assigned to receive or not receive services), these techniques can provide estimates of JFES impacts using information on participants and nonparticipants. These methods address the problem that the experiences of non-JFES participants are an imperfect reflection of what would have happened to JFES participants if they had not participated. Members of the project team had used these methods in prior research with DOL data.

Before conducting the impact evaluation using the current JFES program data, a major part of the project was to validate these nonexperimental techniques using data from the late 1990s Connecticut Jobs First random assignment experiment. Project members created alternative comparison groups from the client data from the time period of the experimental evaluation and conducted least-squares, fixed-effects, random growth, and propensity score tests. Model checks using these nonexperimental techniques showed promise in reducing the range of program evaluation estimates which lie far away from estimates obtained using the experimental data. Nonetheless, the researchers concluded that misleading estimates of program impact remained from the nonexperimental methods even after performing all of the available tests and checks of model misspecification.

A draft of a paper describing the results was presented at a conference during the summer of 2010, and results from the paper were presented at the 2010 fall APPAM conference. A final paper was completed and is in the journal review process (Chen and Couch 2011).

Given the nonexperimental methods did not perform as expected, use of these methods on the contemporary data was not carried out. Instead, the project expanded the work on standard outcome measures, adding the analysis that tracks clients through the JFES program.

South Carolina—Cohort Study

In the first year of the grant, South Carolina proposed performing an additional study using grant funds. The study is a cohort analysis based on similar work performed by Wisconsin under funding from the grant. The study uses administrative data to compare demographics, employment histories, and other information for recent cohorts of TANF applicants (from before and during the economic downturn)—focusing on families applying for TANF in the first quarters of 2007, 2008, and 2009.

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In the second year of the grant, project members developed initial tables showing TANF applications and denials from 2007 through 2009, median quarterly wages during the quarters before and after application, and Medicaid costs and foster care involvement. This work was presented at the National Association for Welfare Research and Statistics (NAWRS) conference in Los Angeles in September 2010.\(^\text{10}\)

In the third year of the grant, project members worked to refine the cohort analysis, drafted a paper describing employment outcomes of the three cohorts, and began plans for econometric analysis to analyze differences in employment outcomes for families participating in South Carolina’s TANF program compared to the control group (food stamp participant families who applied for TANF but whose applications were not approved). South Carolina’s grant has been extended through September 2012, during which time the project team plans to perform the econometric analysis and finalize a paper describing the results.

**Wisconsin—Applicants Study**

Wisconsin’s applicant analysis expands upon a 2006 pilot study of TANF applicants in four TANF agencies. The 2006 study followed TANF applicants and determined at what point they left the application process, their reason for leaving, and their earnings outcomes one year after application. Under the grant, the analysis was extended by obtaining more follow-up information on the 2006 sample, incorporating information on the involvement of the applicants with child welfare services and analyzing a second sample drawn from the same four agencies in 2008. The two samples were compared in order to help Wisconsin understand the effects of a policy change that reduced the extent to which applicants can receive case management without cash benefits.

During the first year of the project, researchers conducted site visits to observe TANF application procedures. Members of the project team downloaded and manually coded case notes for more than 2,000 TANF applicants. A report was prepared providing a detailed comparison of the application process in 2008 compared to 2006 (Ybarra and Noyes 2009).

A second report compared applicants who went on to participate in TANF to those who were denied eligibility or dropped out of the application process. Most of the work was completed in the second year of the grant, including the incorporation of child welfare data into the analysis. Results were produced for the 2006 and 2008 cohorts, showing applicants’ demographic characteristics, prior employment and TANF receipt, prior involvement with child welfare, and income and program participation in various programs in the year following application (Cancian, Noyes, and Chung 2010).\(^\text{11}\)


\(^{11}\) The study examined receipt of food stamps, child support, earnings, SSI, Medicaid, and child care subsidies in the year following application. The study also showed the estimated eligibility of applicants for the earned income tax credit (EITC) and the extent of involvement with Child Protective Services (screened-in reports and substantiated cases).
analysis was extended to a cohort of 2010 TANF applicants under a separate study funded by ACF.\textsuperscript{12} A final paper prepared under the grant describes potential modifications to the TANF administrative data system based on findings from the original applicant analysis, the analysis completed under the grant, and the subsequent study funded by ACF (Noyes 2011).

\textit{Wisconsin—Recipients Study}

Wisconsin’s second analysis was initially proposed as an analysis of TANF recipients, but was broadened over the course of the project to include examination of multiple program participation among recipients in the various programs included in the MSPF. The analysis began in the second year of the project using the completed MSPF, and a report describing the results was completed early in the third year of the grant (Cancian and Han 2010). The analysis focuses on families with resident parents aged 18 to 65 in 2008 that had at least one minor child on December 31, 2008, and shows the extent to which participants in a given program (TANF, child care subsidies, SNAP, Medicaid, child support, child welfare) also participate in each of the other programs. The paper explores how the overlap varies depending on time frame—month, year, or three-year period (2006–2008); examines the number of additional types of assistance received; and examines multiple program participation among 2007 TANF recipients in 2006, 2007, and 2008 by whether the recipient entered the program in 2007, was already participating at the beginning of 2007, or left the program in 2007. UI benefits data were accessed and incorporated into the analysis in the third year of the project. A report incorporating the UI benefits data and extending the analysis of multiple program participation to 2010 was completed under separate funding from ACF (Cancian, Han, and Noyes 2011).\textsuperscript{13}

\textbf{III. Factors Presenting Challenges}

In preparing each of the evaluation reports completed under the grant, we asked the grantees about factors that presented challenges. As discussed below, Indiana faced major challenges involving the IBM-led coalition and the subsequent cancellation of the IBM contract and transition to a hybrid administrative model. Connecticut, South Carolina, and Wisconsin had to adjust their plans for use of the NDNH based on information obtained in the first year of the project. The creation of a new agency responsible for South Carolina’s UI wage data complicated and delayed the project’s efforts to obtain access to the data, and the combined effect of budget cuts, staff reductions, and increased caseloads arising from the economic downturn caused some of South Carolina’s objectives to become secondary priorities. The grantees also mentioned several additional challenges related to administrative data agreements or processing, and timing/scheduling.

\textsuperscript{12} “Enhancing the Child Support Knowledge of TANF-Eligible Families and TANF Caseworkers: A Collaborative Strategy to Improving Outcomes for Low-Income Children and Their Families” (Grant Number 09FD0159).

\textsuperscript{13} The funding was provided through the U.S. Department of Health and Human Services’ Administration for Children and Families as part of the University-Based Research Partnerships on Disconnected Families.
Indiana – IBM-Led Coalition and Transition to Hybrid Model

The primary challenge facing Indiana in the first year of the project was to resolve concerns raised by IBM and the subcontractor responsible for eligibility determination. The eligibility subcontractor was concerned about the additional work that would be required by the project, and that it would be held responsible for any project-related eligibility work performed by the employment and training subcontractor (which was a key motivator for the study). Resolving these issues led to a six-month delay in the start of the project.

IBM’s contract was cancelled at the beginning of the second year of the grant, and the state’s transition to the hybrid administrative model continued through the end of the grant. The organizational changes did not present a problem for the NDNH match process itself, but they did present challenges for assessing the costs and benefits of the match with the NDNH. First, the changes that IBM made to the system for the project were not billed to the grant account, so it was not possible to determine how much that work cost. Second, Indiana’s administrative systems made it difficult to track the cost savings attributable to the match with the NDNH and the labor cost of verification. In particular, it was difficult to determine whether benefit reduction or case closure resulted from the match with the NDNH or if the reductions and closures would have happened anyway.

Due to the high priority of implementing the hybrid model, other projects, including the expansion of the use of NDNH data matching to include cases with reported employment and the development of a comprehensive cost/benefit analysis were not pursued. Indiana returned the majority of its grant money to the federal government in the third year of the project.

NDNH

A common challenge faced by Connecticut, South Carolina, and Wisconsin was the difficulty in accessing the NDNH and the limitations associated with the use of the NDNH data for the research-related activities planned for these projects. The three states took different approaches to dealing with the limitations presented by the NDNH—Connecticut completed a scaled-down research match, South Carolina dropped plans for a research match and eventually also dropped plans for an employment identification match, redirecting project resources to other goals. Wisconsin dropped plans for a research match in the first year of the project and redirected funds toward incorporating state UI benefits data into its linked administrative data.

Administrative Data Agreements

Connecticut encountered a lengthy process in obtaining the experimental JFES data required for the analysis. Although Connecticut began discussions to obtain the data prior to submission of the grant application, it still took several months for legal staff to negotiate the agreement, and the data were not obtained until May 2009.
Indiana had hoped to perform an automated match with The Work Number but dropped plans to automate the match after learning in the first year of the grant that the costs would be prohibitive.

South Carolina’s DSS had a long history of matching TANF and UI wage data and had not anticipated any difficulty in obtaining the necessary UI wage data for the analysis. However, when responsibility for the data was transferred to a new Department of Workforce in the second year of the grant, new negotiations were required and additional limitations were put on access to the data—delaying and complicating work planned under the grant. These issues were resolved in the third year of the contract, and South Carolina received an extension to its grant to allow for completion of the planned work.

**Pressures from Broader Economic Environment**

The grant period lasted from 2008 to 2011, coinciding with a period of recession and high unemployment rates. The combined pressures of high unemployment rates, rapidly expanding state caseloads, and budget and staffing cutbacks caused South Carolina to drop or scale back objectives that would have placed burdens on agency staff. Plans to conduct an NDNH match for the purpose of employment verification were dropped in part due to the additional burden that would be placed on staff to verify the employment information returned by the match. Plans to produce an online dashboard reporting system were also postponed to enable agency staff to focus on higher priorities.

**Administrative Data Processing**

South Carolina faced the unexpected challenge of how to define basic concepts such as what constitutes a TANF “case.” The project team had expected that a uniform definition would be in place, but upon reviewing earlier programs and reports, found that different definitions had been used. For example, approaches differed with regard to how to treat cases with zero or very low benefit amounts and those in which a benefit associated with a particular month was not delivered until a later month. The project team devoted considerable effort to reviewing past definitions, consulting with stakeholders concerning how best to construct various definitions, examining individual case records to determine the implications of different definitions, and developing and proposing the standard definitions.

Wisconsin faced two sets of challenges. The first set of challenges involved the use of the child welfare data. To incorporate the child welfare data, project members had to learn about the child welfare system and obtain an in-depth understanding of the structure and content of the child welfare administrative data. Examples of specific challenges cited by project members include developing an understanding of the meaning of the variables in the child welfare data, determining the relationships between adults and children involved in a case, and determining how to handle situations in which some case details are not initially provided but become available at a later date.
Wisconsin’s second set of challenges involve more general issues affecting administrative data linkage projects. The project team was already familiar with these challenges, and the grant provided the opportunity to investigate alternative solutions and prepare a technical report documenting the lessons learned (Brown 2011). As stated in the report:

These challenges were: (1) whether to use samples or the universe of individuals; (2) how to structure the data (by individual, by case, by family unit, or by child/adult status); (3) how to determine useful identifying variables; (4) how to pre-process or “clean” administrative data; (5) how to address considerations of legally accurate data, “fuzzy” matching, over-matching, under-matching, and cross-matching; (6) how to determine which matching technique to use (probabilistic, deterministic, or a mix of the two); and (7) how and when to update the MSPF data system.

**Scheduling/Timing**

Scheduling issues presented some challenges for South Carolina. In response to an immediate need for caseload reports, South Carolina began work that was originally not scheduled until year three—with the result that the development of both the caseload measures and caseload reports must be handled simultaneously. In addition, the delay in the award of the grant raised scheduling problems for the key university researcher associated with the project. 

**IV. Factors Contributing to Success**

In addition to asking about challenges, we asked the grantees about the factors that had contributed to the success of their projects.

Indiana’s project director indicated that overall improvements in the administration of the state’s TANF program brought about by the transition to the hybrid model had helped the project move forward.

The success of Connecticut’s, South Carolina’s, and Wisconsin’s projects appears to be attributable to several factors, including (1) a long history of collaboration between the organizations and individuals involved in the project, (2) the presence of existing data linkages and data-sharing agreements for most of the administrative databases used for the project, (3) strong support for administrative data research efforts from agencies and staff within the state government, (4) expertise and interest in administrative data research by university partners, and (5) experiences gained from prior projects. South Carolina and Wisconsin also benefit from an administrative structure that places many of the programs of interest into the same department and information system.

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14 The due date for grant applications was March 28, 2008. However, the states did not learn of the award until September 2008, and work began in October 2008.
History of Collaboration

Connecticut, South Carolina, and Wisconsin benefit from long collaborative relationships among the main organizations and personnel involved in their projects. The relationship between South Carolina’s DSS and ORS dates back to 1994, and some of the state personnel involved in the project have collaborated for twenty years or more. Wisconsin and IRP have collaborated since the 1980s, and all key personnel on the project had collaborated for nine or more years at the start of the project. The university researchers involved with Connecticut’s and South Carolina’s projects had previously collaborated with their respective state agencies for six years. This history of collaboration appears to be beneficial because it provides members of the project team with a common background and understanding of the data and issues of interest and fosters an open and trusting work relationship between the parties involved.

Existing Data Linkages and Agreements

Most of the data agreements and linkages necessary to support the work under the current grant were developed under prior projects. Prior to the grant, Connecticut had data agreements and linkages covering five administrative data sources, South Carolina had agreements and linkages covering four programs of interest to the project, and Wisconsin had agreements and linkages for seven programs. With the exception of the NDNH, Connecticut, South Carolina, and Wisconsin required one new data sharing agreement for work planned under their projects and incorporated one or two new data sources into their linked data systems. As noted previously, obtaining data agreements and forming initial data linkages can present challenges, so the fact that so many agreements and data linkages were already in place was a clear benefit to these projects.

State Agency Support

The state agencies and personnel in Connecticut, South Carolina, and Wisconsin demonstrate a strong commitment to administrative data research in general as well as to the work proposed under this grant. In all three states, the project directors for the grant are directors of research within their departments and have extensive experience with administrative data research. In addition to the project directors, Connecticut’s Welfare to Work manager and South Carolina’s Economic Services director had central leadership roles, contributing their program expertise and providing the advice and input necessary to ensure that the work performed under the project meets their agencies’ goals.

The project directors, Connecticut Welfare to Work manager, and South Carolina Economic Services director also played key roles in facilitating access to data, information, and agency personnel. For example, the Connecticut Welfare to Work manager provided access to and knowledge about the state’s linked TANF and JFES data and facilitated communication between the project and the state’s TANF agency, the South Carolina Economic Services director communicated the project’s caseload report recommendations to her staff and obtained their review and input, and Wisconsin’s project director facilitated IRP’s access to state administrative data and caseworkers.
The three projects also benefited from the technical and analytical expertise provided by state agency staff. Much of the data linkage, variable construction, and data analysis work was performed by staff within Connecticut’s DOL and South Carolina’s ORS. IRP performed most of this work for Wisconsin’s project but benefited considerably from advice, information, and in-kind support provided by state agency staff who work with the administrative data.

University Partners

University researchers played a central role in the Connecticut, South Carolina, and Wisconsin projects, bringing with them considerable expertise, interest, and commitment to administrative data research. In all three states, university researchers worked closely with state partners to formulate the project plan and then took primary responsibility for writing the grant application. The university researchers lead or co-lead analytical tasks for the project and advised the development of outcome measures. Wisconsin’s IRP handled the additional responsibilities of obtaining data agreements and performing the data linkage and processing work—responsibilities handled primarily by state partners in Connecticut and South Carolina.

Experiences Gained from Prior Projects

Connecticut, South Carolina, and Wisconsin benefited from experiences gained in prior related projects. Connecticut built upon knowledge gained in past studies that used longitudinally linked administrative data to analyze the impact of mass job layoffs on earnings and older workers. South Carolina’s project built upon a related food stamp participation study and past administrative and dashboard reports developed for the TANF program. Wisconsin’s staff had been involved in many prior projects using linked data; the current project built upon prior data linkage work and also enabled expansion and replication of the 2006 applicants pilot study.

V. Technical Assistance and Collaboration Activities

The Urban Institute was selected as the technical assistance contractor for the grant, to facilitate collaboration among the grantees and provide technical assistance, monitoring, and documentation for the project.

Collaboration

To support collaboration among the grantees and communication between the grantees and ACF, the Urban Institute hosted quarterly teleconferences and three annual meetings in Washington, D.C. Nearly all of the teleconferences and meetings had at least one team member from each state and a representative from ACF. Often, multiple team members from a state would join the call or meeting. The Urban Institute compiled notes from the meetings and teleconferences for submission to ACF and the grantees. In addition to the
teleconferences and annual meetings, the Urban Institute organized and submitted a panel to the 2010 National Association of Welfare Research and Statistics (NAWRS), at which project members from Connecticut, South Carolina, and Wisconsin discussed their experiences with establishing, using, and maintaining linked administrative datasets.

At ACF’s suggestion, the annual meetings were scheduled for the day prior to the start of ACF’s Welfare Research and Evaluation Conference (WREC). The Urban Institute received favorable feedback on this decision. At least one project member was able to attend WREC who would otherwise have been unable to do so, and scheduling the meeting to coincide with WREC saved time and transportation costs for project members who had planned to attend both events.

The teleconferences and meetings included updates from the Urban Institute on its activities related to the grant, and updates or presentations from the grantees about their progress to date. The grantees also used the teleconferences as an opportunity to address questions to ACF.

In the first year of the contract, the grantees were particularly interested in learning about how to access the NDNH data. The Urban Institute researched the rules concerning access to the NDNH, communicated this information to the grantees through teleconferences, the annual meeting, and e-mail, and sought additional information and clarification from the OCSE data access team through a series of e-mail communications. In addition, the Urban Institute coordinated three teleconferences focused on the NDNH—two with the ACF/OFA to discuss the match of TANF and NDNH data used for employment identification, and one with MDRC researchers who had used the NDNH for research purposes. At the invitation of the Urban Institute, the deputy to the chief economist from the HHS Office of the Assistance of Planning and Evaluation (ASPE) presented the results of his research using matched TANF, NDNH, and child support data at the first annual meeting for the project. The Urban Institute invited the OCSE data access team to participate in a teleconference, but the Data Access Team declined, requesting instead that the grantees submit their Federal Parent Locator Services (FPLS) request forms.

**Technical Assistance**

The Urban Institute’s contract provided funds for technical assistance to the grantees. South Carolina and Wisconsin requested several tasks to be performed under this funding. The Urban Institute suggested two additional relevant tasks to ACF and pursued these tasks upon receiving ACF’s approval.
Technical Assistance Tasks for South Carolina

Technical assistance tasks performed at the request of South Carolina include

- a summary of the types of performance measures used in various states or proposed by the federal government and an annotated bibliography containing references to papers and websites related to this issue.\(^{15}\)
- an investigation into the possible use of The Work Number\(^ {16}\) as a source of wage data for research purposes.\(^ {17}\) Although The Work Number retains historical wage data, the data cover only an estimated 34 to 54 percent of the workers in South Carolina and the cost of a batch match appears likely to be prohibitive. Therefore, South Carolina decided against pursuing a match with The Work Number.
- assistance to investigate the possibility of establishing a match agreement allowing access to NDNH data.

Technical Assistance Tasks for Wisconsin

Technical assistance tasks completed for Wisconsin include

- a memorandum summarizing recent literature and online reviews of data linkage software. The memorandum provided links to available free and low-cost record linkage software, along with short summaries of the products and cost information.\(^ {18}\) Wisconsin selected a data linkage product based on the information provided in the memorandum.
- a memorandum describing the results of an investigation into the extent to which other states collect and retain data on TANF applicants (who do not necessarily go on to receive TANF).\(^ {19}\) The investigation was performed by reviewing the literature and speaking with knowledgeable experts. Eight states were identified as the most likely to retain detailed data on TANF applicants.
- an annotated bibliography of publications addressing the different techniques that have been used for merging multisample databases.\(^ {20}\)
- review and comments regarding the proposed outline for a paper describing the creation of the multi-sample person file.\(^ {21}\)

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\(^{15}\) "TANF Performance Measures," by Mary Murphy, Caroline Ratcliffe, and Laura Wheaton, June 2009.

\(^{16}\) The Work Number is a payroll services provider that provides employment and wage data for more than 1,500 employers nationwide, covering about 28 percent of the employed population in the United States (Kellaher 2004).

\(^{17}\) The investigation was conducted by Michael Martinez-Schiferl of the Urban Institute.


\(^{19}\) "TANF Applicant Tracking Memo," by Pamela Loprest, August 2010.

\(^{20}\) The annotated bibliography “Literature on Matching Techniques” was prepared by Molly Scott of the Urban Institute in the summer of 2010.

\(^{21}\) The review was completed by Molly Scott of the Urban Institute during the summer of 2010.
Technical Assistance Task Proposed by the Urban Institute

The Urban Institute proposed conducting two tasks under the technical assistance funds for the project—a literature review of research using the NDNH and a report describing alternative sources of UI quarterly wage data, including the NDNH, WRIS, LEHD, and ADARE. The results have been combined into a single report that describes each source of data, provides information on criteria for use, and includes examples of research performed using each data source.

- “Investigating Alternative Sources of Quarterly Wage Data: An Overview of the NDNH, LEHD, WRIS, and ADARE,” by Christin Durham and Laura Wheaton, January 2012

Monitoring and Documentation

The Urban Institute monitored the progress of the grantees through the regularly scheduled teleconferences and annual meetings, and through other informal project communications. In addition, the Urban Institute interviewed the grantees about their project’s status at intervals throughout the project and summarized their status in the following reports:

- “Initial Assessment of Grantee Plans (TANF and Related Administrative Data Project),” by Laura Wheaton, Pamela Loprest, and Mary Murphy, June 2, 2009
- “First Year Evaluation Report (TANF and Related Administrative Data Project),” by Laura Wheaton, Pamela Loprest, Mary Murphy, and Gretchen Rowe, January 27, 2010
- “Second-Year Memorandum on Grantee Progress,” by Laura Wheaton, Pamela Loprest, Mary Murphy, and Gretchen Rowe, June 7, 2010

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23 Name standardization tables are used to identify different variants of the same name (for example, to indicate that Robert, Bob, and Bobby may refer to the same person). The technical assistance task involved investigating the availability of free or low-cost name standardization tables, compiling first name matches from publicly available sources, creating an Excel utility to add name pairs from the Church of Jesus Christ of Latter-Day Saints name standardization database, and summarizing the results of our work in a memorandum. See “Name Standardization for Merging Administrative Data,” by Jim Kaminski and Laura Wheaton, the Urban Institute, October 12, 2010.
VI. Conclusion and Recommendations

The grant funds successfully enabled Connecticut, South Carolina, and Wisconsin to substantially improve their linked administrative data systems, provide new information about the characteristics and outcomes of their caseloads, and pursue in-depth research questions of key interest to the state. Despite a major upheaval in the administration of its TANF program, Indiana completed its primary objective of obtaining employment verification matches with the NDNH. However, other grant objectives could not be achieved and Indiana returned the majority of its grant funds to the federal government. The Urban Institute provided technical assistance, collaboration, monitoring, and documentation services throughout the three-year grant period.

When ACF announced the grant, it expressed particular interest in supporting projects that would use the NDNH. All of the grantees proposed using the NDNH in their projects, but one scaled back plans and two dropped plans after learning of limitations associated with the NDNH data. Throughout the project, ACF expressed interest in understanding “lessons learned” from the project that would be beneficial in supporting future state administrative data linkage efforts. We therefore conclude with recommendations on how to encourage future use of the NDNH for research and TANF administrative purposes and offer a summary of lessons learned for encouraging future state administrative data linkage efforts.

Encouraging Future Use of the NDNH

The grantees faced three primary challenges when pursuing use of the NDNH for their projects: (1) understanding the distinctions between research and administrative match agreements and how to proceed, (2) obtaining initial cost estimates for a research match and encountering substantial year-to-year variation in costs of an employment verification match, and (3) learning that it is not possible to obtain historical data (beyond two years) and identified data for research purposes. Addressing some of these challenges would require changes to federal law governing the use of the NDNH, but it is likely that other challenges could be alleviated through changes within the control of ACF.

Distinction between Research and Administrative Match Agreement

Projects pursuing a match with the NDNH for TANF related purposes would benefit from early advice on whether to pursue a match under the administrative or research provisions allowing access to the NDNH. In investigating how to pursue an NDNH match, we were first directed to staff at ACF/OFA who facilitate state TANF and NDNH match agreements for the purpose of employment verification. This was appropriate for Indiana’s project, which then went on to establish an employment verification agreement without difficulty. ACF/OFA referred the remaining grantees to the OCSE data access team for instructions on how to pursue a research match. We requested a teleconference with the OCSE data access team to discuss possibilities under a research match agreement. However, the OCSE data access team declined our request and would only respond to specific questions sent by e-mail. Having a webpage or ACF
contact who could define the two types of matches and advise projects how to proceed would facilitate the initial stages of pursuing a match agreement. Publishing a table showing the extent to which workers in each state have employment in other states could also help states assess the information gains that might be achieved through a match with the NDNH.

It would also be helpful if ACF could clarify an ambiguous area concerning match agreements. One of the grantees was interested in performing a match under the administrative match provisions that allow state agencies access to identified data (NDNH data with identifiers) in order to “assist states to carry out their responsibilities under Part A of the Social Security Act.” The ACF/OFA facilitated employment verification agreement falls under this provision but is written with the stated goal that the match will be used for employment verification. The grantee did not plan to take action on individual cases of employment revealed by the match, but the information provided would have been useful to the administrators of the program. After some further consideration, the grantee dropped plans for the match. We were never able to determine whether an administrative match for a purpose other than employment verification was possible, and if so, how to proceed.

Cost Considerations

A lack of information regarding the likely cost of an NDNH research match and substantial changes in the cost of employment verification matches presented challenges to the projects funded by the grant. Federal law requires that users of NDNH matched data reimburse OCSE for the costs of providing the data. OCSE sets rates according to a formula that takes into account three factors: (1) an access fee (split evenly across NDNH users), (2) the frequency of matches, and (3) the direct cost of performing the match. The cost reimbursement requirement undoubtedly contributes to cost variation and uncertainty. However, providing more up-front information on NDNH match costs and reducing the substantial year-to-year variation in the cost of employment verification matches would substantially facilitate considerations over whether to pursue a match with the NDNH.

The costs of an NDNH research match are far from clear. The OCSE data access team declined to give an estimate of the potential cost of a research match prior to submission of the forms requesting a match agreement, but did tell us it would exceed $10,000. Connecticut did not receive a cost estimate until six months into its negotiation to receive an NDNH match. In discussions with other researchers who had used NDNH match data, we were expecting costs in excess of $75,000, well in excess of the amounts budgeted by the grantees. Fortunately, Connecticut’s project achieved a match for a more modest amount ($21,000) that could be accommodated within its

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26 E-mail communication with Wendi Clark, OCSE Data Access Team, May 14, 2009.
budget. This lack of timely information regarding likely research match costs makes it difficult for researchers planning projects to know if an NDNH match can be afforded within the budget planned for their projects.

The annual costs for an employment verification match increased substantially over the course of the project, contributing to South Carolina’s decision not to pursue an employment verification match and Indiana’s decision to discontinue matches following the end of the grant. In FY 2007, a year’s worth of monthly matches against the new hires NDNH data would have cost Indiana $14,086 (ACS 2009); this increased to $40,319 by FY 2012. South Carolina would have been charged $7,558 for four quarterly matches of UI wage data in FY 2007, but this increased to $20,157 by FY 2011. ACF/OFA forwarded an e-mail communication to us from OCSE that explained cost increases in the employment verification match are driven by the fact that fewer states are participating (so each participating state has to bear a larger portion of the usage fee).\(^{27}\) The level and lack of information on cost ahead of time makes pursuing these matches less attractive.

**Historical and Identified Data for Research**

Two modifications to federal law or regulations regarding NDNH access would make the NDNH much more useful to the types of projects proposed by Connecticut, South Carolina, and Wisconsin. The first modification would allow all NDNH data to be archived for later research use. Federal law currently allows data to be maintained for longer than two years for research use, but because OCSE cannot anticipate what data will be required for research use, it deletes all data that are not part of an already approved research sample.\(^{28}\) Allowing all NDNH data to be archived and preserved for later research use would prove extremely beneficial to projects that are interested in understanding the employment history of welfare recipients and persons involved with the child support system.

The second modification would permit researchers working with state data to receive personally identified NDNH data that could be linked into administrative databases and retained beyond two years—facilitating the types of longitudinal research and analysis proposed by Connecticut, South Carolina, and Wisconsin. The current approach of submitting a research file with identifiers to OCSE and receiving a de-identified file is not feasible for a project such as South Carolina’s or Wisconsin’s in which the goal is to produce a linked database that continues to grow with the addition of more years and programs. Once the research file has been returned as a de-identified file, no further growth or modification to prior linkages is possible. Even if a project is willing to forgo further growth or modification to the linked database, the logistics associated with gaining the necessary permission from numerous agencies to transmit data to OCSE, transmitting the large volume of data to and from OCSE, and the work required of OCSE to de-identify such a large linked database, would likely preclude this approach. The requirement to receive de-identified data for research purposes also complicates single-

\(^{27}\) E-mail received from Holly Higgins ACF/OFA, October 2, 2009.
\(^{28}\) E-mail response forwarded by the OCSE data access team to ACF/OFA on January 28, 2009, in response to requests for information regarding work planned under this grant.
purpose analyses involving small research files. For example, although Connecticut succeeded in obtaining such an NDNH research match, the project team had to be very careful to obtain all variables needed for the research file prior to submission to OCSE, as it would not be possible to bring in additional variables once the de-identified file had been returned. At least one research study made arrangements with OCSE to perform the work necessary to create a two-year longitudinal database (Redcross et al 2009), but this required substantial involvement by OCSE. Data were processed and stored on an HHS server, only aggregate data were returned to the project, and all aggregate data were reviewed by OCSE prior to release (Redcross 2009).

A much more feasible approach would be for a state researcher to provide a list of identifiers to OCSE and receive the identified NDNH data in return. To be of practical use to most projects, the data would need to be able to be retained beyond two years—otherwise, there might not be enough longitudinal data available for the purpose of analysis. In addition, some research studies might not be completed within this time frame, and the research team would be unable to preserve the data for future reference as is typically required for journal publication.

Supporting State Administrative Data Development

The grant enabled three states—Connecticut, South Carolina, and Wisconsin—to build upon an impressive body of past work involving longitudinally linked administrative databases, and to use this data for analysis. The three-year window and flexibility provided by the grant were beneficial, allowing time for data-sharing arrangements to be reached and enabling the grantees to pursue new goals consistent with grant objectives when initial findings or external circumstances caused some original goals to be dropped or scaled back. The grant’s emphasis on developing administrative data capacity was highly beneficial, enabling greater investment in administrative data infrastructure than is possible when data linkage is simply a means to achieving an administrative or research goal for a particular project. Connecticut, South Carolina, and Wisconsin anticipate that capacity developed under the grant will help to support future efforts moving forward.

All three states benefit from strong partnerships between university researchers and government agency staff with considerable data and research expertise and a long-standing commitment to program analysis. Because these states built upon a large body of past work, many of the required data linkages and most of the required data agreements were in place prior to the start of the project. During our interviews, the grantees emphasized that the work completed under their projects would have been impossible to perform within the time and budget provided by the grant if they had been starting from scratch. The grantees expressed appreciation for the three-year period covered by the grant—which they indicated is important given the elapsed time required when working with administrative data. They also appreciated the fact that the grant was focused on data development—enabling them to focus on refining and documenting their data systems to a greater extent than would be possible under projects where the data work is simply a means to achieving the analytical goals of a project.
The grant funds succeeded in enhancing the grantees’ administrative data systems and supporting the use of these administrative data systems for employment identification, the development of standard outcome measures, and analyses and evaluations of key interest to the grantees. However, when drawing lessons from the experience of the current grant, it is important to keep in mind that Connecticut, South Carolina, and Wisconsin are building upon an extensive body of past work. If, in the future, ACF wishes to support the development of administrative data capabilities in states with less experience, then it will be important to recognize that such states would be able to deliver far fewer dataset linkages and analyses (for the same amount of funding and in the same time frame) than a state with considerable expertise and past experience in this area. Other states with less experience may also need additional technical support in areas such as how to create data-sharing agreements; how to support, document, and use linked databases; and how to estimate and outline the timeframe and steps required to create linked administrative data systems. Nevertheless, such an investment could be an important first step in providing the foundation for future work.
References


Cancian, Maria, and Eunhee Han. 2010. “Measuring the Multiple Program Participation of TANF and Other Program Participants.” Report to the Wisconsin Department of Children and Families, Madison, WI, November.

Cancian, Maria, Eunhee Han, and Jennifer L. Noyes. 2011. “From Multiple Program Participation to Disconnection: Changing Trajectories of TANF, SNAP, and Unemployment Insurance Beneficiaries in Wisconsin.” Report to the Wisconsin Department of Children and Families, Madison, WI, August.


Appendix A: NDNH

The NDNH is a national database maintained by the federal Office of Child Support Enforcement (OCSE). The database is constructed for child support enforcement purposes and contains data on newly hired individuals, quarterly wages reported by employers to the Unemployment Insurance (UI) system, and UI applications and benefits (OCSE 2009). Some workers are not included in the NDNH—notably, the self-employed and persons working “off the books.”

Under an agreement facilitated by the ACF Office of Family Assistance (OFA), twenty-one states matched their adult TANF recipients with the NDNH in order to uncover previously unknown employment in 2008 (ACF 2009). In addition to matching against the NDNH new hires data, nine states matched against the NDNH UI quarterly wage data in that year and twelve matched against the NDNH UI benefits data. The number of TANF agencies matching against the NDNH appears to have decreased since 2008, with twelve states currently receiving matches under the agreement facilitated by OFA. 29

Much of the data in the NDNH is obtained from state sources—including the State Directory of New Hires, state UI quarterly wage data, and state UI benefits data. Information about federal employees comes directly from the federal government. Each of the grantees had prior experience linking state UI quarterly wage data to other state administrative data sources, and Indiana routinely links the State Directory of New Hires data to TANF administrative data.

The primary reason for a state to use the NDNH (instead of the State Directory of New Hires or state UI data) is that information is available about people who have obtained work (or claimed unemployment insurance) in another state or are employed by the federal government. This information is particularly beneficial in states with substantial employment in neighboring states (such as when an urban area lies on a state border) or with substantial federal employment. The NDNH is also of potential benefit to projects that wish to obtain employment information for people residing in other states. For example, the NDNH would enable a project to determine the employment status of a former TANF recipient who has moved to another state, or to obtain the employment status of a noncustodial parent associated with a TANF case in the state, even if the noncustodial parent lives elsewhere. Because multistate employers are allowed to submit all of their new hires data to only one state, the NDNH is particularly useful for identifying new employment by interstate employers who report their new hires data in another state.

Three issues discovered in the first year of the grant caused Connecticut, South Carolina, and Wisconsin to scale back or eventually drop plans to use the NDNH.

29 E-mail communication from Benjamin Bryan, Office of Family Assistance, Administration for Children and Families on January 11, 2012.
The issues involve the lack of historical NDNH data, the inability for states to obtain longitudinal NDNH data with identifiers, and the potentially high cost of obtaining NDNH data for research purposes. These issues and our recommendations regarding them are described in the conclusion and recommendations section of this report.
Appendix B: Connecticut

Connecticut’s project was to conduct an evaluation of the Jobs First Employment Services (JFES) program. JFES provides employment services to Connecticut’s recipients of TANF-funded cash assistance, Temporary Family Assistance (TFA). The project consisted of three main objectives:

1. Building a multipart administrative database that links JFES data, TFA data, state UI quarterly wage data, employer information from the Quarterly Census of Employment and Wages (QCEW), demographic information from the Connecticut Department of Motor Vehicles (DMV), and employment and earnings data from the NDNH.
2. Constructing longitudinal outcome measures that provide descriptive information on JFES program outcomes.
3. Evaluating the impact of JFES services on long-run outcomes using nonexperimental evaluation techniques.

Administrative Data Linkages

Connecticut’s Department of Labor (DOL) maintains a longitudinal linked file that combines state UI quarterly wage data with data from the QCEW and DMV. The QCEW supplies data on each worker’s employer (such as industry and size) and the DMV supplies data on age and gender.

The project linked DOL’s longitudinal linked database to JFES employment services data and TFA data from the Department of Social Services (DSS) Eligibility Management System. The JFES and TFA data were used to identify the employment services being received and the timing of receipt as well as to provide information on the individuals such as age, family structure, and time on TFA.

Data from a 1990s experimental evaluation of Connecticut’s welfare program and comparable DSS data for clients from that period who were not involved in the experiment were used to test nonexperimental evaluation techniques. Connecticut used a research match with the NDNH to obtain recent earnings and employment data for individuals who were in the 1990s experiment and for the comparable DSS clients from the same time period. The match request was made under the provision of federal law that allows access to de-identified NDNH data for TANF-related research purposes. Analysis of the NDNH data was intended to allow Connecticut to understand the extent to which work outside the state is missed in the state UI data and to analyze differences for those with and without work outside the state.

Project members had hoped that the NDNH would provide the full history of earnings and employment for the experimental JFES and comparable DSS clients and also for current clients. However, because OCSE deletes NDNH data after two years unless it is part of an already approved research match, data from the time of the
experimental evaluation no longer exist, and little information was available for individuals prior to their time on JFES. Due to time and monetary resource constraints, an NDNH match for current JFES participants was not pursued under this grant.

Work in the first year of the project focused on combining, cleaning, and documenting the necessary data. Connecticut completed the agreement to obtain the data from the 1990s Jobs First experiment and comparable DSS data and obtained and linked the data to the state UI quarterly wage record database. Project members documented the JFES/DSS database to facilitate analyses later in the project. In preparation for the match with the NDNH, team members created the database to be matched and confirmed that the size and composition of the dataset were correct.

Administrative data work in the second year focused on obtaining the NDNH match and incorporating additional TFA and JFES data (from 2006 to present) into the linked administrative dataset. An NDNH match request was submitted to OCSE in October 2009. After several follow-up communications, the agreement was finalized in the summer of 2010. Connecticut submitted an analysis file with 60,000 cases to OCSE in the summer of 2010 and received the matched NDNH data by the end of the second year of the project. The research team found that the NDNH supplied wage data for less than 2 percent of the DSS clients without Connecticut UI quarterly wage data and did not affect the overall findings of the analysis. As expected, the NDNH match revealed employment in neighboring states and seasonal migratory employment in Florida, as well as additional employment distributed across the country.

In the second year of the project, the Connecticut team received all necessary data to analyze a contemporary cohort of TFA clients for the entire state. To obtain data on clients who would have had time to exit the program, the project selected all new cases in the first six months of the 2006–2007 state fiscal year, from July 2006 through December 2006. For these cases, monthly case data from DSS were linked to earnings from UI wage records for two years prior to case opening and after exiting TFA. Activity information from the JFES data was also linked to the database.

Standard Outcome Measures and Understanding JFES Client Flow

Connecticut used the assembled data to develop longitudinal measures reflecting the outcomes of the JFES program and to describe the flow of clients through the TFA and JFES programs. The original goal was to develop a set of measures that would be more informative than previously used measures for operational and administrative staff and that would be produced on an ongoing basis. Examples of outcomes include longitudinal averages of earnings and employment of JFES participants and measures of long-term employment stability. As the project progressed, this goal was expanded to develop a broader set of tables that describe clients’ movement through JFES and TFA and a descriptive report based on this information.

In the first year of the project, team members met with the director of Family Services and his staff to seek input regarding the development of standard outcome
measure. Meetings continued in year two, and DSS and JFES provided data from the middle of 2006 to the present, allowing examination of spells of participation and post participation outcomes. By the end of the second year of the project, the data had been organized and cleaned and initial results had been checked to ensure consistency with expectations.

In the second year, project members began developing a descriptive report that documents the flow of TFA applicants through the system, including their participation in JFES. The analysis examined the experiences of a cohort of TFA recipients with the goal of providing insight into Connecticut’s family assistance system and what happens as people move through it. The analysis focused on demographic characteristics, spell length by recipient characteristic, program activities, spell length by activity, and earnings and employment experiences before, during, and after the program. The analysis divides clients into the following four groups: (1) those continuously exempt from work requirements throughout their spells, (2) those time-limited throughout their spells, (3) those who start out exempt and then become time-limited, and (4) those who start out time-limited but then become exempt.

This expansion in analysis beyond what was initially proposed came about because of a reduction in the scope of activities under the evaluation analyses (described below). Using carry-over funds from the first year of the project, an additional graduate student was hired who continued to work on these outcomes through most of the third year of the project. Descriptive tables were developed showing characteristics of people who apply for benefits, length of receipt spells, and participation in JFES activities by the four groups (described above). In the third year of the project, Connecticut completed the product describing the flow of participants from application through JFES and TFA. The tables on which this analysis is based can be easily rerun with future data to update this analysis.

Additional Analyses and Evaluation

Connecticut’s final objective was to evaluate the impact of the JFES program on participants’ employment and earnings outcomes using nonexperimental methods, in particular, fixed-effect, random-growth, and propensity score techniques. Without conducting experimental research (where individuals are randomly assigned to receive or not receive services), these techniques can provide estimates of JFES impacts using information on participants and nonparticipants. These methods address the problem that the experiences of non-JFES participants are an imperfect reflection of what would have happened to JFES participants if they had not participated. Members of the project team had used these methods in prior research with DOL data.

Before conducting the impact evaluation using the current JFES program data, a major part of the project was to validate these nonexperimental techniques using data from the late 1990s Connecticut Jobs First random assignment experiment. In the first year of the project, team members prepared baseline estimates using the matched DSS and state UI quarterly wage record database and compared them to results obtained at the
In the second year of the project, analysis of the 1990s experimental data was conducted using standard nonexperimental methods. Project members created alternative comparison groups from the client data from the time period of the experimental evaluation and conducted least-squares, fixed-effects, random growth, and propensity score tests. Model checks using these nonexperimental techniques show promise in reducing the range of program evaluation estimates that lie far away from estimates obtained using the experimental data. Nonetheless, the researchers concluded that misleading estimates of program impact remain from the nonexperimental methods, even after performing all the available tests and checks of model misspecification.

A draft of a paper describing the results was presented at a conference during the summer of 2010, and results from the paper were presented at the 2010 fall APPAM conference. A final paper was completed and is in the journal review process (Chen and Couch 2011).

Given that the nonexperimental methods did not perform as expected, use of these methods on the contemporary data was not carried out. Instead, analysis in the second goal area, described above, was expanded.

Factors Presenting Challenges

One challenge in the first year of the project was obtaining the data agreement with DSS allowing access to the 1990s Jobs First experimental data and related DSS data from that time period. Discussions to obtain the data began prior to submission of the grant application and continued in earnest after award of the grant. Nevertheless, it still took several months for legal staff to negotiate the agreement, and the data were not obtained until May 2009.

Project members were surprised at the difficulties in accessing the NDNH and the limitations associated with its use, especially since the grant opportunity arose from the same agency within HHS that manages the NDNH. However, data were finally obtained. Given the timing of receipt of the matched data and the time needed to analyze the usefulness of these data for Connecticut, project members concluded that it was not feasible to obtain a match for current TANF clients.

Factors Contributing to Success

Project members reported that factors contributing to Connecticut’s success to date include past collaboration and the experience of project staff (including programmers,  

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analysts, and primary collaborators), the ability to build on an already linked database of state UI quarterly wage records and other data, and the fact that a new data-sharing agreement was not necessary to link the JFES/DSS data and the state UI quarterly wage record database. In addition, the ability to attract graduate students who could work on the data throughout the course of the project helped to make the analysis efficient.

Summary of Data Linkages, Reports, and Products

Connecticut met its administrative data linkage objectives, including a research match with the NDNH, although plans for a second NDNH match were dropped due to time and cost constraints. Project members also completed the proposed analysis investigating whether nonexperimental methods could produce the same results as a 1990s JFES random assignment experiment. The researchers found that although the nonexperimental techniques showed promise in reducing the range of program evaluation estimates that lie far away from estimates obtained using the experimental data, they could not rule out the possibility of misleading results. As a result, the project dropped plans to use the methods to analyze current program impacts, and instead expanded the analysis of outcome measures to include a report analyzing the flow of clients through the TANF and employment services system. The key data linkages, reports, and products produced by the project are summarized below.

Data Linkages, Documentation, and Data-sharing Agreements

Data from time period of 1990s JFES experiment
- Agreement to obtain 1990s JFES experiment data and DSS data for other clients from the same time period.
- Linkage of the JFES/DSS data with UI quarterly wage data.
- Documentation of the linked JFES/DSS database for use later in the project.
- Agreement and match of the NDNH with the JFES/DSS database.

Contemporary data
- TFA data for cohort of new cases entering in July 2006 through December 2006.
- Linkage of JFES and UI Quarterly wage data with the TFA data.

Administrative Tables and Reports

- GIS map based on NDNH data, demonstrating out-of-state employment and cross-state movers.
- Tables following a 2006 cohort of TFA clients through TFA and JFES. The tables were programmed and documented to allow them to be easily rerun by program staff using more recent data.

Research Reports

A paper, “Model Specification Tests and the Estimation of Treatment Effects: An Application with Random and Non-Random Administrative Records” by Tao Chen and
Kenneth Couch, was completed under the grant. This paper describes the application of nonexperimental methods to see if experimental results could be replicated. Using the data from an experiment in the 1990s and additional data to develop nonrandom comparison groups, the authors applied nonexperimental methodologies to create estimates of program impacts. Then various tests, including a new nonparametric test, were used to compare results to the experimental impact results. While the results show promise, misleading estimates of impact from the nonexperimental results remain.

A report was completed analyzing the flow of clients through the TANF and employment services system (TFA and JFES) in Connecticut. The report compares clients from four different groups by time-limit exemption status and examines demographic characteristics, program spell lengths, JFES activities, and employment and earnings before, during, and after program participation. Findings from the analysis highlight the connections between characteristics and case type and program spell length and exits. They also demonstrate the connection between different case types and characteristics and JFES work activities. As of January 2012, the paper was under review by state staff and release is expected shortly.
Appendix C: Indiana

Indiana used funding from the grant to match TANF cases without earnings against the new hires data in the NDNH. This was intended to help the state identify unknown employment and take appropriate measures, reducing or eliminating TANF benefits as appropriate. Indiana had proposed extending the match to all adult cases (not just those without known earnings) and developing a comprehensive cost/analysis report. However, these tasks had lower priority than the changes necessary to support the transition of Indiana’s TANF program from a privatized to hybrid administrative model. Based on a rough cost/analysis report at the conclusion of the project, the project director concluded that the NDNH match was not cost effective and decided against continuing matches beyond the grant period. Indiana returned the majority of its grant money to the federal government in the third year of the project.

Administrative Data Linkages

The NDNH match expanded upon Indiana’s existing employment identification procedures, which include matches against the State Directory of New Hires and state UI quarterly wage data and individual case queries through The Work Number. Although Indiana had accessed the NDNH in 2005 under a test agreement, a new agreement was necessary to allow for matches under the grant.

In the first year of the project, Indiana completed the appropriate agreements with OCSE to receive monthly matches with the NDNH new hires data. Indiana also investigated automating the match with The Work Number. However, this proved to be cost prohibitive—costing $6.00 to $7.00 per match with about 20,000 names submitted each month. Indiana continued to submit employment verification requests to The Work Number on a case by case basis.

In the second year of the project, Indiana began submitting its TANF caseload for adult recipients without earnings for matches against the NDNH. For the first monthly match, 1,795 recipients without known earnings who were participating in TANF in November of 2009 were found to have employment according to the NDNH. For the second monthly match, 380 matches were made for recipients participating in January of 2010. Indiana continued to conduct monthly NDNH matches of all zero-earnings TANF cases, resulting in 339 hits for February 2010 participants, 402 hits for March 2010 participants, and 474 hits for April 2010 participants. Indiana’s plan to expand the matches to TANF recipients with earnings was never realized due to a lack of the staff resources required to process additional cases.

31 Although Indiana’s grant application also proposed to measure posteligibility employment in order to evaluate the effectiveness of Indiana’s TANF Employment and Training Program—Indiana Manpower Placement and Comprehensive Training (IMPACT), this was a lower priority to the State than the employment verification work.
**Employment Identification**

The federal government requires that employment identified through the NDNH be independently verified before action can be taken on the case. In Indiana, when a match was found, the TANF caseworker first checked to see if the employment could be verified through The Work Number. If the employment was not identified by The Work Number query, then a written verification request was sent to the employer. If the employer failed to respond within two weeks of the request, a written request for verification was sent to the recipient.

Indiana originally planned to continuously track the outcomes of the employment verification process. By February 26, 2010, processing was complete for 1,385 of the 1,795 matched cases from the first monthly match.\(^32\) Of the 1,385 completed cases, 88 percent of the information obtained from the NDNH had no bearing on the case. In many of these cases, Indiana had already become aware of the employment through other means, such as from the State Directory of New Hires match or through delayed reports by clients. In other instances, caseworkers had been notified of the employment by the time the match file was submitted, but the employment had not yet been entered into the computer system.\(^33\) In some cases, employment was discovered through the NDNH match but did not affect eligibility or benefits.

Most of the processed matches from the January 2010 NDNH match had no impact on the case, either because the employment had already become known or because the employment had no effect on eligibility or benefits. Additionally, few of the February, March, and April TANF participant case closures were traced to NDNH matches.

In the second year of the project, Indiana’s project director reported some data problems with the NDNH findings. The results relied upon caseworkers accurately entering the outcome of each processed alert into the computer. Project staff reviewed 21 cases from the January 2010 participant match flagged by caseworkers as having a benefit reduction and found a number of inconsistencies.\(^34\) Indiana conducted cross-checks to resolve some of these data issues, and the data problems were further addressed in discussions with the contractor responsible for processing the alerts.

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\(^32\) As of the end of June 2010, there were still 278 incomplete matches from November 2009. This may have resulted from these case records simply not being updated. However, due to resource constraints, Indiana was never able to further research these cases.

\(^33\) Overall, timeliness for processing employment information has improved in Indiana. As of January 2012, the time it takes for case workers to enter or update case information has significantly decreased, but there is still roughly a week delay.

\(^34\) Of the 21 cases identified by caseworkers as having a benefit reduction, the later review showed that 6 had an impact that resulted in case closure, not a decrease in benefits. Of the remaining 14 cases, 7 were closed for reasons other than the NDNH match, and the NDNH match had no effect upon the other 7 cases, either because the information was already known or because the earnings found were too old.
Cost Report

Indiana originally planned to complete a formal report estimating the overall cost of conducting the NDNH matches—both payments for use of the NDNH data and verification/labor costs—versus the cost savings from reductions in benefits and case closures. Although a detailed evaluation was never completed, Indiana conducted several rough cost estimates throughout the grant period.

The project director performed a final estimate when deciding whether to continue matching beyond the grant period. An analysis of NDNH matches returned in August 2011 resulted in identification of previously unknown employment for 191 individuals, resulting in $6,061 in avoided costs. Assuming that each case costs the state $40 to process and that the monthly number of cases would remain constant, the total annual savings would have been $72,732 ($6,061*12) and the total processing costs would have been $91,680 ($40*191*12), not counting the additional $40,319 the state would have been charged for the NDNH match or the cost of processing the 331 matches whose employment had already become known to the state. Based on these estimates, the project director determined that the match was not cost effective and so did not pursue an NDNH match agreement for federal fiscal year 2012.

Factors Presenting Challenges

The critical challenge facing Indiana’s project was that it was implemented at a time of major change in the administration of Indiana’s TANF program. At the beginning of the project, Indiana was in the midst of a transition to a privatized system in which a coalition of contractors headed by IBM handled welfare eligibility determination and employment and training services within the state. Indiana was not satisfied with IBM’s performance and cancelled the contract with IBM in October 2009. Beginning in January 2010, the state piloted a “hybrid model” in one region to determine the best method for administering the programs going forward. Under the hybrid model, the state retained some of the infrastructure that worked under privatization and abandoned or modified what did not work. The transition to the hybrid model continued throughout the grant period, with completion anticipated for February 2012.

The first year of the grant period was the last year for the IBM-led coalition. During that year, the project faced challenges associated with the coordination of responsibility between two of IBM’s subcontractors—Arbor, which was the primary motivator for work on the project, and ACS, which handles eligibility determination for the state. Initially, the state and Arbor thought that Arbor would conduct most of the work; however, after the project began, it became clear that ACS would need to be more involved than initially thought. ACS was concerned about the additional work that would be required, and about the possibility that it might be held accountable for eligibility-related work performed by Arbor staff. It took time to address these concerns, leading to a six-month delay in the start of the work planned under the grant.

According to Indiana’s project director, Indiana’s TANF caseload dropped substantially over the course of 2011, so both costs and savings may be overstated.
IBM’s contract was cancelled at the beginning of the second year of the grant, and the transition to the hybrid model continued through the end of the grant. The organizational changes did not present a problem for the NDNH match process itself, but they did present challenges for assessing the costs and benefits of the match with the NDNH. First, the changes that IBM made to the system for the project were not billed to the grant account, so it was not possible to determine how much that work cost. Second, Indiana’s administrative systems made it difficult to track the cost savings attributable to the match with the NDNH and the labor cost of verification. In particular, it was difficult to determine whether benefit reduction or case closure resulted from the match with the NDNH or if the reductions and closures would have happened anyway.

Due to the high priority of implementing the hybrid model, other projects, including the expansion of the use of NDNH data matching to include cases with reported employment and the development of a comprehensive cost/benefit analysis were not pursued. Indiana returned the majority of its grant money to the federal government in the third year of the project.

**Factors Contributing to Success**

In the second year of the project, Indiana was able to address issues with the contractor responsible for employment verification, which helped solve some data accuracy issues at the caseworker level. By the end of the project, the state was near completion of statewide implementation of the hybrid model, and there was no longer a backlog of case information needing to be processed. The remaining nonhybrid region, Marion County, is scheduled to roll out hybrid administration at the end of February 2012.

**Summary of Data Linkages, Reports, and Products**

Indiana’s project successfully matched zero earnings adult TANF cases against the NDNH from November 2009 through September 2011. However, tasks outlined under the grant had a lower priority than the changes necessary to support the transition of Indiana’s TANF program from a privatized system to a hybrid administrative model. The expansion of NDNH data matching to include more TANF cases as well as putting together a comprehensive cost-benefit analysis were ultimately unrealized goals, and Indiana returned the majority of its grant funds to the federal government in the third year of the grant. As a lesson learned, Indiana’s project director stressed the importance of having monetary and staff resources allocated solely for the purposes of research and evaluation for projects of this nature.
Appendix D: South Carolina

South Carolina’s project involved linking its existing TANF client history data with other state-based data systems. Much of the project was focused on developing caseload reports and outcome measures that could be produced on a regular basis. In the first year of the grant, South Carolina proposed and ACF approved an additional study to be completed using funding from the grant. The study is a cohort analysis that compares the characteristics of the TANF caseload in 2007, 2008, and 2009. South Carolina initially planned to use data from the NDNH for employment verification and to understand the extent to which the TANF caseload has out-of-state or federal employment (which are captured in the NDNH but not in the state UI quarterly wage data). However, after further investigation into the potential costs and benefits of accessing NDNH data, the project team decided against pursuing an NDNH match. South Carolina faced unexpected delays in obtaining the state UI quarterly wage data required for the project and received a no-cost extension through September 2012. Work discussed here describes the project’s status as of December 2011.

Administrative Data Linkages

South Carolina entered the project with an existing data warehouse—the Client History and Information Profile System (CHIPS)—that includes eligibility, benefit, and demographic information for applicants to and recipients of TANF and food stamp benefits dating back to 1989. Data on TANF related employment services and work activities are contained in the Participation and Tracking System (PATS). While CHIPS and PATS information had been linked to state UI quarterly wage data in the past on a project by project basis, the state planned to use grant funds to generate regular data linkages that would contribute to an ongoing, longitudinal dataset. Although not included in the original grant application, South Carolina incorporated child welfare and Medicaid/CHIP data into its linked data system in support of the cohort analysis that was proposed and approved in the first year of the grant.

The administrative data work in the first year of the project focused primarily on the CHIPS file with attention focused on definitional issues such as what constitutes a TANF “case” and how to handle cases with zero benefits. Additional work in the second year focused on analyzing the quality of the historical data in CHIPS and determining how to define “case” consistently over time. Project members also developed a program that appends spell and case history to monthly caseload data. The resulting file enables the user to know where the case is in the spell, how long the longest spell has been, and whether the spell is left-censored or right-censored.

Analysis of UI quarterly wage data began at the end of the first year of the project. The project team analyzed existing data, consisting of historical matches of UI quarterly wage data against TANF clients (clients continue to be included in the match after leaving TANF). The team learned that the match rate appeared to be too low beginning with the 2005 data, raising questions about the quality of the data. Subsequent
investigation suggested that data from 2007 through 2009 might be usable, and a special extract covering data from 2005 to 2007 might help to fill in some of the gaps in the data. Project members also worked on obtaining an agreement for a new draw of the full universe of South Carolina’s UI wage records, to correct problems with the existing data and to provide information on the work history of new clients.

Efforts to reach a new agreement were delayed and complicated by the replacement of South Carolina’s Employment Security Commission (which had been responsible for the UI wage data) with a new Department of Employment and Workforce (DEW) in the spring of 2010. By September 2010, the project team had received a test version of the data and was examining that, while additional negotiations continued. Negotiations continued through 2010 and the first part of 2011. By May 2011, a three-way agreement had been achieved between DSS, DEW, and ORS and the data were available for analysis. The agreement required that ORS house the data and that analysis of the linked data be performed on-site at ORS. As of the end of 2011, regular linkages between CHIPS and the UI quarterly wage database were in place and were anticipated to continue regularly into the future.

Work on the PATS data began at the end of the first year of the project. Project members investigated the structure of the PATS file and worked on documentation describing the record layouts (names of fields in different files). As of the end of 2011, certain PATS data items (e.g., number of job placements and work eligibles) had been successfully integrated into the administrative reports developed under the grant and the project had successfully linked case-level data for one month of positive closures to case managers in PATS. Project members hoped to improve the methods for linking positive closures to case managers in PATS so that these linkages could be performed more efficiently going forward.

South Carolina’s project also included linkages with child protective services and foster care data. By the end of the second year of the project, project members had received matched child protective services and foster care data for the TANF cases included in the cohort analysis. The project had also reached an agreement with the South Carolina Department of Health and Human Services to receive a match of the Medicaid/CHIP data, and had incorporated the data into the cohort analysis.

South Carolina’s grant application had proposed incorporating NDNH data into its longitudinal linked database. However, as a result of information obtained during the first year of the project, project members decided against this approach. A key limitation of the NDNH with respect to longitudinal analysis is that the federal government deletes the NDNH data after two years, so historical data beyond two years are no longer available. While it might be possible (under the research provisions of the NDNH) to construct longitudinal samples beginning with currently available data and extending that into the future, South Carolina’s project team felt that there were too many uncertainties regarding the cost, time to set up an agreement, and limitations on use of the data for South Carolina to pursue this approach.
The South Carolina team asked the Urban Institute to investigate whether The Work Number could serve as an alternative source of historical earnings data for research purposes. Based on the Urban Institute’s findings (that the data cover an estimated 34 to 54 percent of South Carolina’s workers and the cost appeared likely to be prohibitive), South Carolina decided against pursuing a research match with The Work Number.

**Employment Identification**

In addition to proposing to use the NDNH to develop longitudinal earnings histories, South Carolina had initially proposed to enter into an NDNH match agreement for the purpose of employment verification. After dropping plans for a research match, the project team continued considerations of whether to pursue an employment verification match. Plans for an employment verification match were eventually dropped due to concerns of the additional workload that this would impose on caseworkers (who were experiencing high workloads as a result of the economic downturn and state budget cutbacks). The project team then investigated whether an investigatory match would be possible that would enable the state to gain a sense of the extent to which TANF recipients have employment that is not captured in the state UI quarterly wage records. However, the project team decided against pursuing such a match, citing Indiana’s experience in finding little employment through the NDNH match that was not already known to the state.

**Standard Outcome Measures**

South Carolina’s grant application proposed development of three categories of longitudinal outcome measures to be produced on a regular schedule once development work was complete. The categories include “participation event histories,” such as length of time on TANF in the current spell and overall; “earnings histories,” such as average earnings in the year prior to TANF participation and maximum earnings in any quarter in the year prior to TANF participation; and “earnings outcomes,” such as earnings in the quarter or year following TANF exit. South Carolina had originally proposed that the participation event history measures include hazard and survivor functions, but after further communication with DSS in the first year of the grant it was decided that reporting results in a transition framework (focusing on the characteristics of entering and exiting cases) would be more helpful.36

During the first year of the grant, South Carolina produced retrospective and prospective tables of spell duration. Development of the reports continued during the second year of the grant. The time period covered by the spell duration reports was extended and separate tables were generated by type of assistance (all cases, federally funded cases, state-funded two-parent cases, state-funded disabled cases, and a residual set of other cases where funding isn’t clear). When it became clear that the new data-

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36 A hazard function shows the probability that a spell of participation ends at a given point, given that it lasted that long, and a survivor function shows the probability that a spell lasts beyond a certain point. Hazard and survivor functions can be easily generated using the assembled data should the need arise.
sharing agreement would require the UI wage data to be housed at ORS, project members rewrote the software so that reports could be generated in the ORS computer environment. In the third year of the project, the reports were expanded to produce numbers by particular types of case characteristic, including education level, race, ethnicity, and prior program participation, and to break out child-only cases.

South Carolina grant application proposed development of report-generating tools to enable administrators and county managers to generate custom “dashboard” reports describing the characteristics and outcomes of the TANF caseload. At the beginning of the project, very little information was available concerning the characteristics of the TANF caseload, and work began early in the project to develop caseload reports. A new governor and administration came into office in January 2011, and reports generated under the grant were used to inform the new administration about the program. New reports were generated under grant funding to help inform and track program goals of central interest to the new administration, referred to as Wildly Important Goals (WIG). For example, reports were developed to show the extent to which closures are “positive” (e.g., closed due to increased earnings, child support income, or unearned income) and how this compares to targets at the state level and by region and county office. Reports were also developed to track success in meeting goals regarding provision of economic services, job placements, job developer orders, job applications, and job interviews. Although the reports do not yet support custom online queries from administrators and county managers (as originally envisioned in the grant application), they provide essential program information at varying levels of aggregation, and project members have brainstormed about possible future web-based deployment.

Additional Analyses and Evaluation

In the first year of the grant, South Carolina proposed performing an additional study using grant funds. The study is a cohort analysis based on related work performed by Wisconsin under funding from the grant. The study uses administrative data to compare demographics, employment histories, and other information for recent cohorts of TANF applicants (from before and during the economic downturn)—focusing on families applying for TANF in the first quarters of 2007, 2008, and 2009.

In the second year of the grant, project members developed initial tables showing TANF applications and denials from 2007 through 2009, median quarterly wages during the quarters before and after application, and Medicaid costs and foster care involvement. This work was presented at the National Association for Welfare Research and Statistics (NAWRS) conference in Los Angeles on September 27, 2010.

In the third year of the grant, project members worked to refine the cohort analysis, drafted a paper describing employment outcomes of the three cohorts, and began plans for econometric analysis to analyze differences in employment outcomes for families participating in South Carolina’s TANF program compared to the control group (food stamp participant families who applied for TANF but whose applications were not approved). South Carolina’s grant has been extended through September 2012, during
which time the project team plans to perform the econometric analysis and finalize a paper describing the results.

Factors Presenting Challenges

In the first year of the project, the primary challenges involved understanding the issues related to the NDNH that made it infeasible for South Carolina’s planned longitudinal analyses and discovering that the definition of key concepts such as what constitutes a TANF “case” varied in past reports and required standardization.

In the second year, the creation of DEW resulted in unexpected problems regarding access to UI wage data. DSS had a long history of matching TANF and UI wage data and had not anticipated any difficulty in obtaining the necessary UI wage data for the analysis. However, DEW required a new agreement and imposed new limitations on access—delaying and complicating planned work with the data. These issues were resolved in the third year of the contract.

Budget cuts at DSS, along with staff departures and increased demand for services resulting from the recession, presented additional challenges in the second and third years of the grant. Out of necessity, documentation and research became secondary priorities. Given the demands facing DSS, it was not feasible within the period covered by the grant to perform a match with the NDNH for the purpose of taking action on individual cases (as noted previously, project members also came to the conclusion based on Indiana’s experience that little additional employment would be identified through an NDNH match). Although grant funds enabled development of reports that are key to monitoring progress toward goals set by the new administration, competing demands made it infeasible to create a system allowing administrators and caseworkers to request and obtain customizable reports through an online query system.

Factors Contributing to Success

The project team reported that factors contributing to the success of the project include the long-standing work relationships and past collaborative efforts among key members of the project team. A previous longitudinal analysis of food stamp program participation completed by project members was very well received by the food stamp program administrators within the Division of Family Assistance and could serve as a model for work on this project. The project also benefited in that it can build upon past programs to measure caseload characteristics. The project was also fortunate to obtain the services of a former DSS employee (now a consultant) who has extensive expertise with the administrative data used in the project and was not originally slated to work on the project. In the third year of the grant, the project acquired the services of a new geographic information systems (GIS) specialist whose analyses have helped illustrate spatial mismatches between job developers (who recruit companies to hire TANF families), work-eligible TANF families, and areas with greater employment opportunities. The work of the GIS specialist has also helped state and regional managers easily identify low-performing counties. Finally, the project team noted that
determination and the ability to adapt to changing circumstances were key to the successes experienced under the grant.

Summary of Data Linkages, Reports, and Products

South Carolina’s grant funding made possible a variety of data linkages, reports, and products, substantially improving the information available to DSS on the characteristics and employment outcomes of TANF recipients. Reports generated under the grant are viewed as indispensable for management of the program and are expected to continue after the grant period. The data linkages, improved documentation, and data-sharing agreements negotiated under the grant are expected to support continued efforts moving forward. The key data linkages, reports, and products produced by the project are summarized below.

Data Linkages, Documentation, and Data-sharing Agreements

- Improved documentation of the Participation and Tracking System (PATS).
- Standardized definition of TANF “case”
- Data-sharing agreement with new Department of Employment and Workforce allowing linkage with state UI wage data.
- Data-sharing agreement with Department of Health and Human Services allowing linkage with state Medicaid data.
- Ongoing longitudinal linked dataset combining CHIPS and UI wage data, with additional data linkages involving PATS, Medicaid, and child protective services.

Administrative Reports

- Retrospective and prospective reports of TANF spell duration.
- Reports of demographic characteristics of food stamps cases (performed on as-needed basis), showing age of case head, years of education, marital status, ethnicity, household size, months on food stamps in past five years, months on food stamps in current spell. Results are shown for the following subgroups:
  - Disabled, elderly, excessive expenses
  - TANF cases
  - Non-TANF with children
  - Adults only
  - All cases
- Reports of demographic characteristics of TANF cases (performed on as-needed basis), showing age of case head, years of education, marital status, ethnicity, number of children, age of youngest child, months on TANF in past three years, and months on TANF in current spell. Results are shown for the following subgroups:
  - Parent headed
  - Child only
  - Two parent
  - Disabled
Reports on demographic characteristics of TANF closures, by exit reason, showing age of case head, years of education, marital status, ethnicity, number of children, age of youngest child, months on TANF in past three years, and months on TANF in exit spell. Results are shown for the following subgroups:

- Positive closures
- Negative closures
- Neutral reasons
- All closures

- Number of TANF applications approved and denied, by month
- Positive closures in total and compared to target, by week, and by region and county office, including gains from prior week.
- Provision of services in total and compared to target, by week and by region and county office for the following services:
  - Economic services
  - Job placements
  - Job applications
  - Job interviews
  - Job developer orders

Research Report: Cohort Analysis

Preliminary results of the cohort analysis were presented by Linda Martin and Marilyn Edelhoch at the 2010 meeting of the National Association for Welfare Research and Statistics. The project team has also produced an internal draft of a paper describing the results. South Carolina’s project has received an extension on their grant funding through September 2012, so final results of the analysis are not yet available.

The cohort analysis analyzes three cohorts of families starting a new spell of TANF participation in February of 2007, 2008, and 2009. For each cohort, a comparison group is drawn from food stamp cases that applied for but were denied TANF assistance. Preliminary results show that the control group is more likely than the TANF group to have employment prior to TANF application and in the quarter of TANF application, and that their employment remains relatively stable following the quarter of application. In contrast, TANF cases experience decreasing rates of employment in the quarters preceding application, and their employment rates increase substantially in the quarters following application. Employment rates for both the TANF and control groups were lowest for the 2009 cohort, when unemployment rates were at their highest. As of December 2011, team members were exploring various econometric methods for

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38 The draft, “Assessing the Impact of the South Carolina Family Independence Program on Three Cohorts of TANF Entrants,” was provided to the Urban Institute on December 13, 2011.
39 As of December 2011, project members were considering whether to extend the analysis to a February 2010 cohort.
analyzing the differences in trends in employment in relation to TANF participation, controlling for unemployment rates and demographic characteristics.
Appendix E: Wisconsin

Wisconsin’s project *Building an Integrated Data System to Support the Management and Evaluation of Integrated Services for TANF-Eligible Families* used funding from the grant to add new data sources and cases to its already extensively linked system of administrative data, creating a multi-sample person file (MSPF). The MSPF includes all persons with involvement in any of a number of government programs, enabling analyses of multiple program participation. Creation of the MSPF was a major data development effort and its creation was supplemented by funds from other sources. Under the grant, Wisconsin used the MSPF for two analyses: one that assesses the TANF application process and analyzes the outcomes of applicants, and another that focuses on multiple program participation, both overall and for families entering, continuing, and ending a spell of TANF receipt. Project members recommended and made further improvements to the MSPF based on their experiences in performing the analyses. The MSPF has already been used in several projects funded by other sources, and work is expected to continue beyond the end of the grant period.

Administrative Data Linkages

Prior to this project, much of Wisconsin’s program data were already linked in a single system called Client Assistance for Re-employment and Economic Support (CARES). TANF, child care, food stamps, and Medicaid/CHIP data are all integrated in this single system, which dates back to the mid-1990s. Wisconsin had previously linked CARES data to state UI quarterly wage data and the state’s KIDS data system (containing child support orders, payments, receipts, paternity establishment, and divorce data). The major new data source obtained and merged under this project was child welfare data (Wisconsin Statewide Automated Child Welfare Information System—WiSACWIS). Under other funding, state corrections and Milwaukee jail data and court record data (involving child support cases with minor children) were added during the first two years of the project. Project members had originally intended to incorporate data from the NDNH, but dropped this plan after learning that it would be impossible to obtain longitudinal NDNH data with personal identifiers. Resources originally intended for use with the NDNH were redirected toward incorporating UI benefits into the linked data system.

Wisconsin’s grant application proposed investigating the feasibility of creating a linked dataset containing the full universe of cases involved in any of a number of government programs. The project well surpassed this goal with the creation of the MSPF—a longitudinal data system that contains information about all cases in the CARES, KIDS, WiSACWIS, state corrections, Milwaukee jail, court record, and UI

40 In addition, Supplemental Security Income (SSI) data for persons in the CARES system are incorporated through a data exchange with the Social Security Administration.

41 Wisconsin did not propose including the corrections data or court data in the grant application, but was able to do so in the first year of the project. Funding from other sources was used to develop an understanding of these data and to determine how to incorporate it into the MSPF.
benefit data. UI wage data are also included (for persons in at least one of the other programs). Data included in the MSPF date back to the 1990s for most programs.42

The MSPF differs from Wisconsin’s prior data linkage efforts in that it contains information about all recipients in each of the represented programs, rather than just those in the sample of interest for a particular study (such as TANF recipients). Developing a linked data system containing the full caseload for each program has enabled Wisconsin to more easily analyze the extent to which families participate in multiple programs—simultaneously or over time.

In the first year of the project, Wisconsin obtained and processed the child welfare data and determined how to link them into the administrative data system, downloaded and manually coded case notes needed for the TANF applicants study, and developed a linked dataset containing TANF applicants from the 2006 and 2008 samples—with data from CARES, KIDS, WiSACWIS, and state UI quarterly wage records. Department of Corrections data were linked into the dataset under separate funding. Wisconsin also made substantial progress in developing the MSPF—establishing an initial linkage among the full universe of records for each person in the CARES, KIDS, and WiSACWIS data, and including the state UI quarterly wage data for individuals in the database.

In the second year of the project, Wisconsin completed work to incorporate the child welfare data and completed construction of the MSPF, with the exception of the UI benefits data. These data were received and added in the second half of 2010. Most of the effort in the first two years of the project focused on the child welfare data, in particular, determining how best to define the unit of analysis. The project also developed a mother/child file (containing one observation per child, per mother, per data source) and a set of participation files for each program containing data from 1997 to 2009 (which were merged with the MSPF).

In the third year of the project, the MSPF was updated through 2010. Incarceration records were added for the Milwaukee county jail system, and UI benefit data and unemployment spells were incorporated for all persons from 2006 forward. Child support court case data from 1996 through 2007 were linked from the Court Record Database (CRD).43 Project members completed a technical report discussing best practices for and lessons learned from the creation of the MSPF (Brown 2011).

Wisconsin successfully completed the administrative linkages proposed for the project and plans to continue to use and expand the MSPF going forward. Project members participate in an IRP data core coordinating committee that is facilitating researchers’ use of the MSPF data through technical assistance and help with compliance

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42 Child welfare data are included beginning in 2004 and UI benefits are included beginning in 2006.
43 The CRD is not a data system maintained by the State of Wisconsin, but is a sample of child support-related court record information gathered from paper records and recorded electronically and maintained by IRP for most years since 1980.
requirements. The committee is also discussing ways to cover costs associated with gathering additional data and maintaining the MSPF database.

Wisconsin is currently developing or plans to develop the following data sources for future inclusion in the MSPF:

- County incarceration data from counties other than Milwaukee County
- CRD cases dating back to 1980
- UI benefits data and unemployment spells information for years prior to 2006
- Consolidated Court Automation Programs (CCAP) from the Wisconsin Circuit Court Access program\(^44\)
- Court system protected data
- AFDC and food stamp information dating back to 1988
- Department of Motor Vehicles (DMV) data
- K–12 school data and early learning programs data
- Young Star child care center ratings data
- Vital records of birth, death, and marriage

**Additional Analyses and Evaluation**

Wisconsin proposed using grant funds to complete two studies using the linked administrative data developed for the project. The first study would focus on TANF applicants and the second would focus on recipients. Both studies were completed and additional analyses using the MSPF were completed under separate funding.

**Applicants Study**

Wisconsin’s first study expands upon a 2006 pilot study of TANF applicants in four TANF agencies. The 2006 study followed TANF applicants and determined at what point they left the application process, their reason for leaving, and their earnings outcomes one year after application. Under the grant, the analysis was extended by obtaining more follow-up information on the 2006 sample, incorporating information on the involvement of the applicants with child welfare services and analyzing a second sample drawn from the same four agencies in 2008. The two samples were compared in order to help Wisconsin understand the effects of a policy change that reduced the extent to which applicants can receive case management without cash benefits.

During the first year of the project, researchers conducted site visits to observe TANF application procedures. Members of the project team downloaded and manually coded case notes for over 2,000 TANF applicants. A report was prepared providing a

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\(^{44}\) CCAP is public-access court data with some minimal information on participants and types of cases. Project members are currently exploring and learning about several aspects of CCAP data to improve upon categorization of legal parenthood, to identify foreclosure cases, and to see if linking parents in foreclosure cases to the MSPF data system is possible.
detailed comparison of the application process in 2008 compared to 2006 (Ybarra and Noyes 2009).

A second report compared applicants who went on to participate in TANF to those who were denied eligibility or dropped out of the application process. Most of the work was completed in the second year of the grant, including the incorporation of child welfare data into the analysis. Results were produced for the 2006 and 2008 cohorts, showing applicants’ demographic characteristics, prior employment and TANF receipt, prior involvement with child welfare, and income and program participation in various programs in the year following application (Cancian, Noyes, and Chung 2010). A paper focusing on the child welfare aspect of the applicant comparison was drafted and subsequently presented in November 2010 at the Association for Public Policy Analysis and Management (APPAM) meeting, as part of a panel on child welfare research. The analysis was extended to a cohort of 2010 TANF applicants under a separate study funded by ACF. A final paper prepared under the grant describes potential modifications to the TANF administrative data system based on findings from the original applicant analysis, the analysis completed under the grant, and the subsequent study funded by ACF (Noyes 2011).

Recipient Analysis

Wisconsin’s second analysis was initially proposed as an analysis of TANF recipients but was broadened over the course of the project to include examination of multiple program participation among recipients in the various programs included in the MSPF. The analysis began in the second year of the project using the completed MSPF, and a report describing the results was completed early in the third year of the grant (Cancian and Han 2010). The analysis focuses on families with resident parents aged 18 to 65 in 2008 that had at least one minor child on December 31, 2008, and shows the extent to which participants in a given program (TANF, child care subsidies, SNAP, Medicaid, child support, child welfare) also participate in each of the other programs. The paper explores how the overlap varies depending on time frame—month, year, or three-year period (2006–2008); examines the number of additional types of assistance received; and examines multiple program participation among 2007 TANF recipients in 2006, 2007, and 2008 by whether the recipient entered the program in 2007, was already participating at the beginning of 2007, or left the program in 2007. UI benefits data were accessed and incorporated into the analysis in the third year of the project. A report incorporating the UI benefits data and extending the analysis of multiple program

45 The study examined receipt of food stamps, child support, earnings, SSI, Medicaid, and child care subsidies in the year following application. The study also showed the estimated eligibility of applicants for the earned income tax credit (EITC) and the extent of involvement with Child Protective Services (screened-in reports and substantiated cases).
47 “Enhancing the Child Support Knowledge of TANF-Eligible Families and TANF Caseworkers: A Collaborative Strategy to Improving Outcomes for Low-Income Children and Their Families” (Grant Number 09FD0159).
participation to 2010 was completed under separate funding from ACF (Cancian, Han, and Noyes 2011).48

**Additional Analyses**

The MSPF has already been used in other projects in Wisconsin, and project members anticipate continuing to use the MSPF in the future. For example, the MSPF has been used to explore topics of particular interest to the Wisconsin Department of Children and Families for current program administration, such as the recent analysis examining the interaction of TANF and the child welfare system described above. Several additional research studies have used or will use the MSPF, including

- Patterns of and Outcomes Associated with Disconnection from Employment and Public Assistance: The Wisconsin Experience
- Impact Evaluation of the Collaborative Strategies Project
- The Role of Child Support in the Current Economic Safety Net for Low-Income Families with Children
- Aging Out of the Public Assistance System

**Factors Presenting Challenges**

Wisconsin faced two sets of challenges. The first set of challenges involved the use of the child welfare data. Because this was the first time the project team had used the data, there were a number of issues to be worked out. To incorporate the child welfare data, project members had to learn about the child welfare system and obtain an in-depth understanding of the structure and content of the child welfare administrative data. The project team had to decide whether the unit of analysis should be the child or the adult who is identified as the person of interest (who is not necessarily the person against whom allegations have been made). The project team also had to determine how to link the data with the other data systems. Examples of specific challenges cited by project members include developing an understanding of the meaning of the variables in the child welfare data, determining the relationships between adults and children involved in a case, and determining how to handle situations in which some case details are not initially provided but become available at a later date. By the end of the second year of the project, the challenges related to the child welfare data had been overcome, and the incorporation of the child welfare data was complete.

Wisconsin’s second set of challenges involved more general issues affecting administrative data linkage projects, for example, the challenges involved when eliminating duplicates that arise as a result of missing data in ID variables and from multiple personal identification numbers (PINs) within data systems, which can cause one person to look like many different people. The project team was already familiar with these types of challenges, and the grant provided the opportunity to investigate alternative

48 The funding was provided through the U.S. Department of Health and Human Services’ Administration for Children and Families as part of the “University-Based Research Partnerships on Disconnected Families.”
solutions and prepare a technical report documenting the lessons learned (Brown 2011). As stated in the report: “These challenges were: (1) whether to use samples or the universe of individuals; (2) how to structure the data (by individual, by case, by family unit, or by child/adult status); (3) how to determine useful identifying variables; (4) how to pre-process or “clean” administrative data; (5) how to address considerations of legally accurate data, “fuzzy” matching, over-matching, under-matching, and cross-matching; (6) how to determine which matching technique to use (probabilistic, deterministic, or a mix of the two); and (7) how and when to update the MSPF data system.” The report documents how the project handled each of these challenges in the construction of the MSPF.

Factors Contributing to Success

Members of the Wisconsin team emphasized the open and trusting relationship developed over many years of collaboration between IRP and DCF staff as key to facilitating work under the project. Many DCF staff members associated with the project have academic backgrounds, which aids communication regarding research and statistical issues. In addition, several IRP staff members have a background of working within DCF, either as state employees with program responsibilities or as long-term fellows. DCF has worked to facilitate access by IRP to the administrative data—including allowing on-site work stations to be set up where IRP programmers can work side by side with government staff. DCF has also helped facilitate IRP’s access to caseworkers—enabling IRP staff to observe the TANF application process and child welfare data entry procedures.  

IRP continues to maintain a good relationship with the State of Wisconsin, and the project team stressed that the project would not have been possible without this, as it not only facilitates access to data but also entails a lot of back and forth advice and input that benefits both sides. The MSPF has generated a lot of interest throughout the state. Members of the project team from IRP and DCF recently met to discuss continuing use of the MSPF in support of DCF’s ongoing research and management needs. Based on this conversation, a routinized, collaborative system for addressing topics of departmentwide interest that cross programmatic lines, is being implemented.

Summary of Data Linkages, Reports and Presentations

Wisconsin’s grant application proposed investigating the feasibility of creating a linked dataset, and the project well surpassed that goal by creating the MSPF data system. Project members have updated the MSPF system through 2010, incorporating several additional sources of data into the system, such as UI benefits data, and a technical report describing lessons learned from the creation of the MSPF was completed. Official reports

49 IRP programmers have worked on site with the Bureau of Working Families Research and Statistics Section on an occasional basis for a number of years, learning and using the CARES system, and on-site work increased under this grant. Under the project, IRP programmers were added to the distribution list for notifications and briefings regarding changes to the child support data system. IRP programmers attended weekly staff meetings with the Bureau of Public Integrity staff who handle the child welfare data system, and a workstation was set up where IRP staff members could work with child welfare programmers on location, two to four days per month.
were also generated from the TANF applicant analyses as well as the TANF/multiple program participant study. Key data linkages and reports produced by the project are summarized below.

Data Linkages and Administrative Agreements

- Linked TANF, child care, food stamps, and Medicaid/CHIP data system CARES with child support data (KIDS) and child welfare data (WiSACWIS) to develop the multi-sample person file (MSPF) and companion files
- Modified agreement allowing expanded access to WiSACWIS data
- Data-sharing agreement allowing access to the UI benefits data
- Data-sharing agreement allowing access to Wisconsin Department of Corrections data
- Incorporated corrections data and child support court case date into the MSPF system
- Incorporated UI wage data and unemployment spells data into the MSPF system
- Merged data for a sample of 2008 TANF applicants with data from an earlier analysis of a sample of 2006 TANF applicants, hand-coding from more than 2,000 case records
- Analyzed multiple program participant data using different units of analysis (e.g., by individual, case, or family unit)

Reports and Memos

- “Using Administrative Data for Program Evaluation and Administration: Progress Report from Wisconsin.” December 2011. This report summarizes Wisconsin’s work under the grant and reflects the utility of the merged data system for program management and analysis.
- “Improving Wisconsin’s Ability to Analyze Outcomes of the TANF Application Process.” December 2011. This report discusses potential changes to the Wisconsin administrative data system CARES that might facilitate ongoing analysis of the TANF application process.
- Memorandum to Fredi Bove (DCF): W-2 TRANSITION (W2-T) PLACEMENT/CPS INVOLVEMENT. November 2011. This memo discusses the extent to which families with a W-2 Transition (W2-T) placement are also involved with the child protective services (CPS) program.
- “Measuring Multiple Program Participation of TANF and Other Program Participants.” October 2010. This report discusses the initial results of the TANF participant study and is referenced in “Using Administrative Data for Program Evaluation and Administration.”
- “The Income and Program Participation of Wisconsin TANF Applicants in 2006 and 2008.” October 2010. This report reflects work done under the project in
relation to the TANF application process study (Cohort II). It is referenced in “Improving Wisconsin’s Ability to Analyze Outcomes of the TANF Application Process.”

- “The Wisconsin Works (W-2) Applicant Study: Comparing the W-2 Application Process in 2006 (Time I) and 2008 (Time II).” May 2009. This report reflects work done under the project in relation to the TANF application process study (Cohort II). It is referenced in “Improving Wisconsin’s Ability to Analyze Outcomes of the TANF Application Process.”