IN THE UNITED STATES DISTRICT COURT
FOR THE WESTERN DISTRICT OF TEXAS
SAN ANTONIO DIVISION

ERIC STEWARD, by his next friend and mother, Lilian Minor, *et al.*,	§	
Plaintiffs,	§	
v.	§	
CHARLES SMITH, Governor, *et al.*,	§	
Defendants.	§	
	§	CIV. NO. 5:10-CV-1025-OG
THE UNITED STATES OF AMERICA,	§	
Plaintiff-Intervenor,	§	
v.	§	
THE STATE OF TEXAS,	§	
Defendants.	§	

PLAINTIFFS' AND UNITED STATES' EXPERT DISCLOSURE FOR DARLENE M. O'CONNOR, PHD

In compliance with Federal Rule of Civil Procedure 26, I am submitting this disclosure regarding my work as an expert consultant in the above case.

1. I have been retained by the Plaintiffs and the United States as a joint expert in the *Steward v. Smith* litigation.

2. To prepare my report, I convened a Study Team of experts to prepare and analyze the data. My report, which is attached, and its accompanying exhibits and supplemental workbook contains a complete statement of all my findings to date as well as an explanation of the basis and reasons for those findings. I believe those findings to be true and correct.

3. My report and its accompanying exhibits and supplemental workbook contain the facts, data and other information I considered in setting out my findings.

4. Exhibit A of this report describes the primary data sources, methods for preparing the analytical file, and other technical notes about the methods used.

5. Exhibit B to this report is an Excel workbook that provides additional detail related to these findings.

6. Attachment A of this report includes brief resumes for myself and the key project staff, including all publications that we have authored within the past ten (10) years. These resumes reflect the qualifications of myself and the Study Team who conducted the analysis and contributed to my report.

7. I have not testified as an expert witness in this or any other case, at deposition or at trial, within the last four (4) years.

8. My compensation for this work is paid by the Department of Justice under contract to JEN Associates, Inc. In February 2018, JEN Associates, Inc., was acquired by Westat, Inc. Compensation for this work is $230 per hour for all staff time involved in preparing the data, conducting the analysis and preparing this report. This does not reflect the hourly rate should I be asked to testify or be deposed in relation to this report.

This information is accurate and complete to the best of my knowledge, information and belief.

Darlene M. O'Connor 3/29/18

Darlene M. O'Connor, Ph.D. Date

CERTIFICATE OF SERVICE

I certify that on this 30th day of March, 2018, a true and correct copy of the foregoing Plaintiffs' and the United States' Expert Disclosure of Darlene M. O'Connor, Ph.D. was delivered via electronic mail and Federal Express to the attorneys for defendants at the addresses below:

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Report of Darlene M. O'Connor, Ph.D.

In the matter of Steward, et al. v Smith

1. PURPOSE

The U.S. Department of Justice contracted with JEN Associates, Inc., on behalf of Plaintiffs and the United States, to analyze data received from the state of Texas to assist in understanding the characteristics of the population with intellectual disabilities or developmental disabilities (ID/DD) who were screened for admission to, residing in, or discharged from a nursing facility. Our analysis focused on the monthly and annual patterns of admission, discharge, and continuing stay for individuals in the target population.

2. QUALIFICATIONS FOR COMPLETING THE STUDY

JEN Associates, Inc. has over 30 years' experience analyzing health assessments, claims, encounters, and other forms of administrative health data. The majority of the company's work has focused on analysis of populations with disabilities, chronic conditions and complex medical needs. I have worked at JEN for over seven years. As Vice President for Strategic Planning, and in my current role at Westat as a Senior Study Director, I develop the scope for new analytic work, develop analytic plans, and in some cases oversee study teams. Prior to my work at JEN, I led a Long-Term Care Policy research unit at the University of Massachusetts Medical School. I also have a deep understanding of the PASRR process and the Olmstead decision, having managed programs related to both for the state of Connecticut and served on the Board of the National Association of PASRR Professionals (NAPP). To complete this study, I convened a Study Team including JEN's Research Director, Joanna Kubisiak, two Senior Programmers (Douglas Bedell and Angelina Lee) and Project Management Officer (Ilene Rosin). Resumes of the key staff involved in the study are included as Attachment A to this document.

3. MATERIALS AND DATA

The Department of Justice provided our Study Team with data and supporting documentation (i.e., data dictionaries and related descriptive material) for this project. We understand that Texas produced this information in discovery. The time period covered by most of the data upon which the analysis is based was from October 2010 through September 1, 2017 and included electronic data from the Texas Medicaid & Healthcare Partnership ("TMHP") – including PASRR Level 1 Screenings, PASRR Level 2 Evaluations, nursing facility Minimum Data Set assessments (MDS 3.0), and nursing facility Transaction Forms 3618 and 3619 – as well as CARE data collected on individuals who received home and community-based services. Data sources and methods for preparing the data are described in detail in Exhibit A.

A complete list of all data files and supporting documentation provided by the Department of Justice is at Attachment B.

4. DATA ANALYSIS & METHODOLOGY

The study team designed the study, reviewed the completeness and consistency of the data, and determined which variables to utilize in conducting the analysis. The team then constructed an analytic database that included the necessary variables and time-specific markers to organize the analysis. Examples of such markers include:

1. **NF Admission**: An individual's first nursing facility admission/entry in the study period or a subsequent admission occurring over 30 days from a previous discharge or over 99 days from a previous assessment.

2. **Discharge-Non-institutional Setting**: Discharges in this category were identified through MDS (variable A2100) or Form 3618 (Translocation variable) when the individual was indicated as having been discharged to "community" (defined in MDS as private home/apt., board/care, assisted living or group home) or to "home" on Form 3618 and their return to the nursing facility was not anticipated. This type of discharge does not imply that an individual received community-based services after discharge.

3. **Discharge-Other/Unknown Setting**: This type of discharge required the reporting of a discharge date which indicated that the individual was being discharged for one of the following:
    - For MDS—to another nursing home or swing bed, acute hospital, psychiatric hospital, inpatient rehabilitation facility, ID/DD facility, hospice, long term care hospital, or other (A2100=02, 03, 04, 05, 06, 07, 09, 99) or their return was anticipated (A0310F=11)
    - For Form 3618—to hospital, nursing facility, community ICF=IID[1], Medicare/SNF, state institution, hospice, private pay, or other/unknown (TRANSLOCATION=1,2,3,4,6,7,8,9) or their return is anticipated (DISCHARGETYPE not 1)
    - If these sources were not available, discharge data from Form 3619 and from PASRR Level 1 were also used to identify this type of discharge.

4. **Discharge-Inactivity:** A nursing facility episode was considered to have ended if a discharge date was not reported but a gap of more than 99 days was seen in an individual's MDS assessment activity. MDS assessments are required to be completed every 92 days. After reviewing the distribution of gaps in assessments, we used 99 days in our gap logic to provide a 7-day buffer before ending an episode.

5. **Discharge-Death:** An individual was considered discharged due to death if his or her discharge date coincided with the individual's death date, or if a discharge date was not reported for a person and the end of a person's activity occurred within 99 days of their death date.

[1] Note: Form 3618 included a category called "Community ICF-IID". Because these were called ICFs, we interpreted this setting to be an institutional setting; however, we understand that these could have been small group homes with less than 6 individuals. The data does not appear to be sufficient to determine which of these ICFs were non-institutional, but we were able to determine that only about 0.4% of the discharges reported in this category were to community ICFs.

Next, the Study Team removed any individuals who did not meet the following criteria for inclusion in the target population:

- Medicaid eligible as evidenced by the presence of a Medicaid ID number in any record. Although Medicaid status in one month is not a guarantee of continued Medicaid status for prior or subsequent months, in my professional experience I have found that most individuals with ID/DD who become eligible for Medicaid generally do not subsequently lose Medicaid eligibility, particularly if they are residents of a nursing facility; therefore, I considered this to be an acceptable method for determining Medicaid eligibility throughout the study period.
- Age 21 or older at the time of inclusion in the census
- Identified as having ID/DD on the most recent PASRR Level 2 evaluation. Although it is rare for an individual once identified as having an ID/DD condition to lose that condition, we restricted the analysis in order to assure that all individuals truly met the ID/DD criteria.

We then utilized the admission/discharge markers to capture the monthly numbers of admissions and discharges reported under the Findings in Section 6 below. An Excel workbook, containing additional detail, including monthly counts for each admission and discharge, was prepared to accompany this report.

Due to the importance of assuring an accurate count of admissions and discharges for the target population, it was critical to assure that we identified each unique individual present in the data, and that we did not double-count due to errors in Social Security numbers (SSNs) or missing individuals or due to an inability to link across the data sources. Therefore, we carefully examined errors in data entry, missing SSNs or other identifiers, and established criteria to confirm that an individual was a member of the target population. For individuals who could not be matched based on SSN, we matched using Medicaid and Medicare IDs or matched on name, address, date of birth, and gender. These steps assured us that the count of unique individuals, and thus the monthly counts of admissions and discharges for these individuals, were accurate.

In addition to the challenges of linking and identifying individuals across multiple data sources, we followed standard procedures for determining which source(s) to use and in which order for each variable used in the analysis. For example, because the MDS is a validated federal instrument completed within 14 days of admission to a nursing facility, we utilized the data from the MDS for the primary source for admission date, discharge date, date of birth, date of death, and Medicaid ID. When this source was not available (e.g., because an individual was discharged before an assessment was completed), we used the dates on Form 3618, Form 3619, and PASRR Level 1 screen, in that order.

In determining whether the individual had a qualifying ID/DD disability, we utilized any PASRR Level 2 evaluation as the sole source of information. Due to the nature of the PASRR Level 2 evaluation, which is designed to confirm ID/DD, we then identified the target population as those individuals who have the ID/DD condition confirmed under the most recent PASRR Level 2. If the individual was identified as meeting the ID/DD qualification, all months of nursing home residency were included in the census tables for the target population.

In general, the data were sufficiently complete to support the analysis. However, it was not feasible to clearly identify long-stay residents, in the first three months of complete data because of the lack of

history to determine that their stay was longer than 90 days. Similarly, it was not possible to confirm the census and number of discharges during the last four months of the data set because of lags in completing the MDS, which is submitted quarterly. As a result of this, complete MDS data was only available through May 2017. For that reason, we show the census for the period starting April 2011 and ending May 2017 and have only generated findings for that period. See Exhibit A for additional detail on the quality of the data.

5. FINDINGS

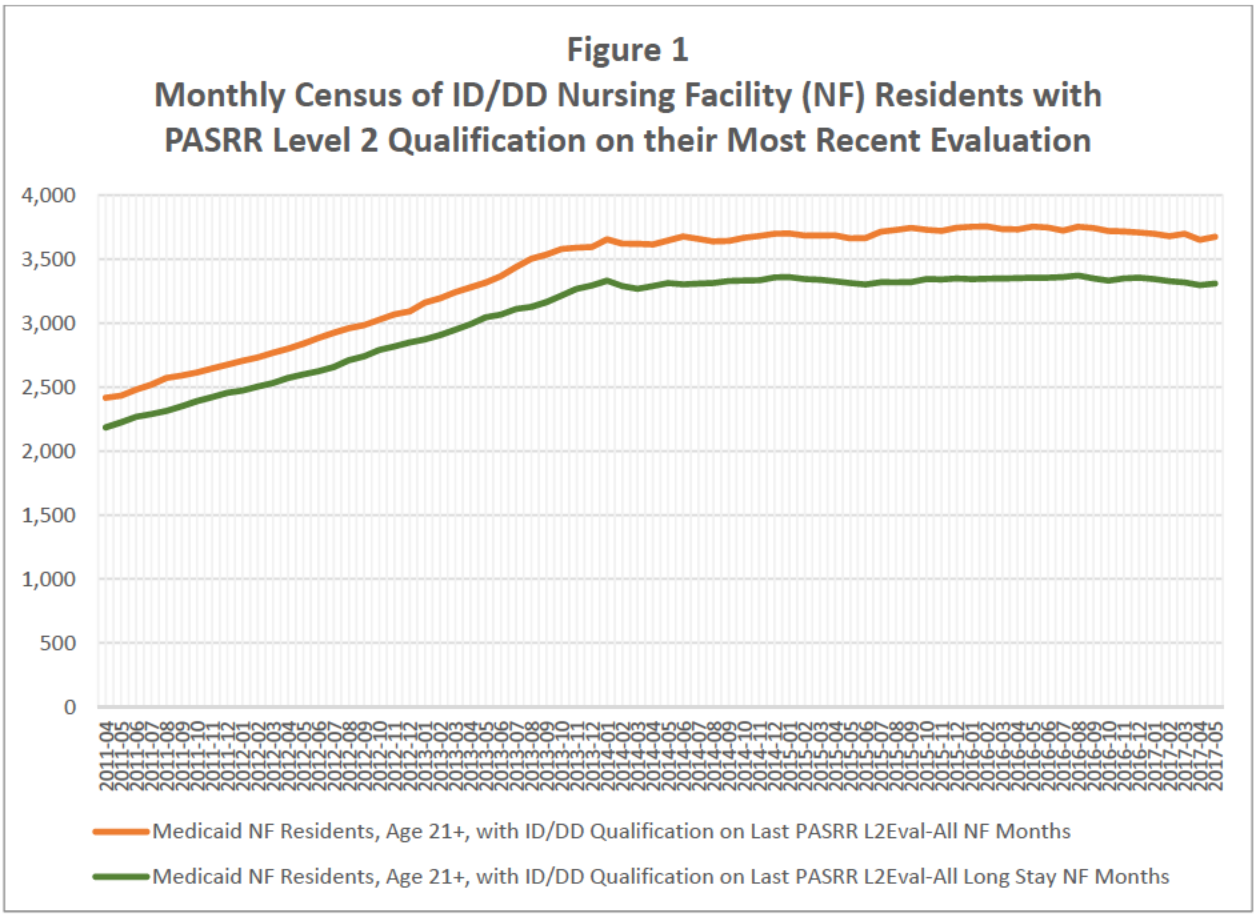
The key finding of our analysis is included in Figure 1 below. In addition, attached as Exhibit B is an Excel workbook that contains the monthly detail regarding the nursing facility census, admissions and discharges by reason for discharge.

In Figure 1, the orange line shows individuals whose ID/DD condition was confirmed on the most recent PASRR Level 2 evaluation. It is compared with the green line, which represents the subgroup of those individuals who were in the nursing facility for a long stay, which we defined as exceeding 90 days. As shown in Figure 1, the total population of individuals with a confirmed ID/DD in nursing facilities is approximately 3,673 individuals. The monthly nursing facility census has remained relatively stable since January 2014. Similarly, the long stay population as of May 2017 is approximately 3,308. Similarly, this long term census of individuals with ID/DD in Texas nursing facilities has remained relatively stable since January 2014. This suggests that some individuals in the target population were admitted for short-term stays and then discharged, but the majority of individuals remained in the facility for a long-stay.

Individuals who were identified with ID/DD on their most recent Level 2 Evaluation were included in the census for all months of their nursing facility stay. However, we excluded individuals who were identified as having ID/DD in an earlier PASRR Level 2 Evaluation but whose most recent PASRR Level 2 Evaluation indicated that they did not have ID/DD.

The result is that there were 7,351 unique individuals in the total census over the study period and 6,066 unique individuals in the long-stay group.

The census information above and the detailed Excel workbook attached provide the findings related to the number of individuals in the target population who were admitted to, resided in, or were discharged from a nursing facility each month. I believe that the methods and findings provide an accurate portrayal of the information available for our analysis.



Source: Analysis of Texas data extract prepared using data from MDS, PASRR and CARE data provided to the U.S. Department of Justice for the period from April 2011 through May 2017. Note: The census for the first three months of 2011 and June-August of 2017 could not be determined with the available data.

EXHIBIT A

Data Sources and Technical Notes on Study Methods

A. Target population:

- The study covered individuals in the state of Texas from 10/2010 through 9/2017 who were: Individuals with intellectual disabilities or developmental disabilities (ID/DD) identified through selection method negotiated by the parties. This criteria is included at Exhibit C.
    - The initial selection process identified 17,412 unique individuals with an indication of ID/DD from any source (MDS, PASRR Level 1, PASRR Level 2, or old PASRR forms) in the state who were receiving nursing facility services, had a Medicaid ID, and were age 21 or older during the study period.
    - The primary focus was on the subset (7,351 unique individuals) with ID/DD indicated on the most recent PASRR Level 2 evaluation, who were aged 21 or over, who qualified for Medicaid, and who had a nursing facility admission or residence at any point within the study period.

B. Data sources

- Nursing facility Minimum Data Set (MDS)
  A 27-page initial & quarterly nursing facility assessment conducted on all individuals admitted to and/or residing in nursing facilities

- Electronic PASRR Documents
  Level I PASRR Screen
  A 12-page screening document that identifies individuals with an indication of ID/DD (or mental illness) who are referred for nursing facility placement; if ID/DD is indicated, the individual should be in this data base. (They could be included multiple times.) The form has approximately 180 fields; approximately 1/3 were considered useful for the study.

  Level II PASRR Evaluation
  A 32-page evaluation designed to confirm whether an individual has ID/DD (or serious mental illness), preliminarily identify any specialized services needed for ID/DD if admitted, and identify community-based services that could divert the individual from admission. (This information may be updated annually or if there is a change in the individual's status.) Approximately 100 fields were considered potentially useful for the study.

- CARE data
  This source includes data collected on individuals who received home and community-based services (HCBS). Relevant information includes demographics, eligibility for HCBS waiver, detail related to specific community services authorized, and estimated care plan payments. Details on specific services provided before and/or after nursing facility entry were considered most relevant for the study.

- Nursing Facility Transactions: Forms 3618 and 3619

  Form 3618: Resident Transaction Notice
  The nursing facility administrator prepares Form 3618 for recipients who are:

  - eligible Medicaid recipients,
  - applicants for Medicaid (medical assistance), or
  - Medicaid recipients who are being discharged from the Medicaid program.

  The nursing facility administrator prepares a separate Form 3618 for each transaction. Each admission into or discharge from the facility requires a Form 3618 except approved therapeutic passes. An admission or discharge between payor sources also requires Form 3618 or Form 3619, Medicare/Skilled Nursing Facility Patient Transaction Notice.

  Form 3618 must be completed and all copies submitted within 72 hours of the date of the transaction. Form 3618 is not used to report transactions involving private-pay residents, except when a resident who has been private pay is applying for Medicaid or when a recipient has been receiving Medicaid and is denied.

  Form 3619: Patient Transaction Notice
  The nursing facility administrator prepares Form 3619 for recipients who are Medicaid recipients/applicants approved by Medicare for a Medicare skilled nursing facility (SNF). The nursing facility administrator prepares a separate Form 3619 for each transaction. Each admission into or discharge from the facility requires a Form 3619 except approved therapeutic passes. An admission or discharge between payor sources also requires Form 3618, Resident Transaction Notice, and Form 3619, Patient Transaction Notice.

  Form 3619 must be completed and all copies submitted within 72 hours of the date of the transaction. Form 3619 is not used to report transactions involving private-pay residents.

C. Project Initiation & Data Transfer

The following steps were implemented to prepare for the analysis:

- We set up a server and a secure file transfer method to receive the data.
- The Department of Justice sent the above files through secure file transfer along with the descriptions and data dictionaries that the Department of Justice had reportedly received from the state on the above data sets, and we hosted all files within our secure data center.
- The files were in several cases divided into sub-files or separate Excel tables; some additional files that could add context (e.g., Interdisciplinary Team Notes and Quality Review Team notes) were also received.

D. Data Quality Review and Data Linkage

The extent to which an effective analysis could be conducted was highly dependent on the quality and completeness of the data and the adequacy of the descriptive information available on the data sources and specific variables. For the TMHP-provided data (MDS, PASRR, Forms 3618 and 3619), each file type was provided as a set of three sub-files. Each sub-file was imported, checked for completeness and usability, and had duplicates removed; then the three sub-files were combined into a single source for each file type. Additionally, although interdisciplinary team notes (e.g., documentation from the interdisciplinary team meetings and service coordinator notes) were included in the imported data, we did not analyze that part of the data due to time constraints. For the CARE data, we used the most recent pull of that data provided to us.

Next, we conducted a comprehensive review of all data fields within four remaining groups of files:

- Nursing facility Minimum Data Set (MDS-3.0)
- Electronic PASRR documents
- CARE files
- Nursing facility transactions, Forms 3618 and 3619

In detailed reports, we documented the percent of missing values, variable length and values for numeric fields, and a variety of other descriptors of each field. We compared the Social Security Numbers (SSNs) and other identifiers (e.g., Medicaid ID, name, address, age) across the three file groups. Initially we determined that there were 227 individuals in the CARE files who were identified as transferred to a nursing facility but for whom there was no MDS form completed. Since the MDS form is required within the first 14 days after admission, we suspected that these individuals were not matched due to errors in the SSNs or early discharge prior to completion of the MDS assessment.

Overall, the quality of the data was good. Import of the raw files presented a handful of challenges which we were able to work through. In one of the Excel files, the column headings were replicated half way through the data which caused the initial import to fail. Removing the extraneous line resolved the problem with no further issues. In several of the data files that contain lengthy notes, we discovered there were line feeds embedded in the values which resulted in corrupted imports. Replacing the line feeds with spaces resolved the issue and fully captured the data contained in the raw file. In several of the files for the later pulls, there was 100% duplication of records as evidenced by exact record matches across all variables. The duplicates were removed to insure beneficiaries and/or services were not double-counted. Upon successful import, we noticed that some data contained SSNs that were less than 9 digits in length. Further analysis demonstrated that the affected SSNs had been stored with leading zeros omitted. Correcting this anomaly demonstrated that the affected records then linked to appropriate beneficiaries contained in other related data sets. Finally, we found several instances where SSNs were miscoded among the various data sources (i.e. digits transposed, off by one digit, etc.). Analysts used a custom matching algorithm to ensure proper cross-file linkages were performed.

Finally, as noted in the report, it was not feasible to clearly identify long-stay residents in the first few months of the data because of the lack of history to determine that their stay was longer than 90 days. Similarly, it was not possible to confirm the census and number of discharges during the last four

months of the data set because of potential lags in completing the MDS. For that reason, in the figure provided in the report we show the census for the period starting April 2011 and ending May 2017.

Methods for Linking Data Sources and Creating Nursing Facility Census and Discharge Profiles

The creation of monthly and annual nursing facility (NF) census and transition profiles was dependent on compiling date spans and admission/discharge indictors from multiple sources. Ideally, there was a single unique identifier for an individual. Initially, the Social Security Number (SSN) looked like a good possible unique identifier for all individuals. However, upon testing, we found that SSNs uniquely identified individuals only in the CARE data. In the other data sources, multiple SSNs could be observed for an individual; a given SSN could represent multiple people; and in some data, the SSN was missing. Having multiple SSNs for an individual, for example, would lead to fragmentation of their nursing facility stay, undercounting of the length of stay for the individual, and the fragmented stays would be attributed to multiple people. Having a single SSN representing multiple people, on the other hand, would lead to undercounting of people. Having a missing SSN would lead to data not being attributable to an individual.

Medicaid ID and Medicare IDs were not viable as alternative stand-alone identifiers because in addition to having the same problem of non-uniqueness, they were not as well populated as SSNs. Examples of problems found with identifiers are:

- Same SSN but different combinations of names, date of births, and/or genders
- Same Medicaid ID but different combinations of names, date of births, and/or genders
- Same Medicare ID but different combinations of names, date of births, and/or genders
- Same SSN but different Medicaid IDs
- Same SSN but different Medicare IDs
- Same Medicaid ID but different SSNs
- Same Medicare ID but different SSNs
- Same Medicaid ID, last name, first name, date of birth, gender with different SSNs

The following table shows counts of the sample problems found in the various sources:

Example Problems Found with Identifiers	MDS	Form 3618	Form 3619	PASRR	CARE
Same SSN but different combinations of names, date of births, and/or genders	2,250	-	-	2,565	-
Same Medicaid Id but different combinations of names, date of births, and/or genders	2,042	-	-	2,064	-
Same Medicare Id but different combinations of names, date of births, and/or genders	1,573	-	-	1,322	-
Same SSN but different Medicaid Ids	682	1,533	197	2,013	-
Same SSN but different Medicare Ids	1,303	1,671	499	609	-
Same Medicaid Id but different SSNs	358	279	103	97	-
Same Medicare Id but different SSNs	310	165	103	121	-
Same Medicaid Id, last name, first name, date of birth, and gender, but different SSNs	328	-	-	88	-

We used the following data fields, where available, to identify records that likely represented an individual: SSN, Medicare ID, Medicaid ID, Last Name, First Name, Date of Birth, and Gender. The primary fields were SSN, Medicare ID, and Medicaid ID. Secondary fields for identification included name, date of birth, and gender to confirm or reject candidate linkages. While this process did not completely resolve discrepancies, it improved our ability to identify unique individuals. The following table shows the unique counts of identifiers before and after the linkage. If we had used SSNs without the linkage process, we would have over-identified the number of people in the MDS and PASRR and under-identified the number of people in Form 3618 and Form 3619.

	MDS	Form 3618	Form 3619	PASRR	CARE
Before linkage: Number of unique combinations of identifier fields (Medicare Id, Medicaid Id, SSN, Last Name, First Name, Date of Birth, and Gender)	29,844	32,989	16,347	27,452	2,941
Number of unique non-blank Medicaid Ids	18,794	20,394	11,984	19,423	2,941
Number of unique non-blank SSNs	19,700	17,791	10,736	20,422	2,941
Number of unique non-blank Medicare Ids	16,596	14,672	10,467	14,837	937
After linkage: Number of unique individuals identified after linkage	19,434	20,215	12,057	20,404	2,941

With the improved linkage in place, we then eliminated individuals who were not in the target population, i.e., eliminating those who did not have a qualifying ID/DD according to a PASRR Level 2 Evaluation, were not age 21 or older during the study period, or did not have Medicaid during the study period.

Proposed method for establishing ID/DD status for inclusion in the census tables

To confirm ID/DD qualification, we used the data identifying ID/DD as described above to "turn on" an ID/DD qualification for inclusion in the tables. The ID/DD qualification was determined from the most recent PASRR Level 2 Evaluations. Once the individual met the ID/DD qualification, we included all of their nursing facility months as meeting this criterion. This excluded 346 individuals who were identified with ID/DD on an earlier PASRR Level 2 evaluation but did not have ID/DD confirmed on their most recent evaluation.

PASRR Level 2 Evaluation Data:

- Identification based on the Assessment Type(A0600)

  AssessmentType
  1. ID/DD only
  2. MI only
  3. ID/DD and MI

  and the answers in Section B (ID/DD Section):

  B0100: To your knowledge, does the individual have an Intellectual Disability which manifested before the age of 18? (e.g. Mental Retardation)

  B0200: To your knowledge, does the individual have a Developmental Disability other than an Intellectual Disability that manifested before the age of 22 (e.g. autism, cerebral palsy, spina bifida)

  ID/DD = A0600/AssessmentType in ('1','3) **AND** positively identified with an Intellectual Disability (B0100 = 1. Yes) or a Developmental Disability (B0200 = 1. Yes)

- Limitations: The PASRR Level 2 Evaluation data only spans May 2013 to Sep 2017

We then sought to profile individuals who were admitted to or resided in a NF from 2011-2017. We used the MDS 3.0 file as our primary source and supplemented it with key elements in other data files. The other data sources contributed admissions, discharges, and death dates not always present in the MDS data. We used the combined patient information to create person histories for all NF activity, characterize transitions in and out of NFs, and summarize patient activity into NF episodes. The data sources and data elements used to create the person histories are described below:

- **MDS 3.0**

  Person Identifiers

  Dates:

  A1600 Entry Date
  A1900 Admission Date
  A2000 Discharge Date
  A2300 Assessment Reference Date

  Transition Indicators:

  A0310F Entry/discharge reporting
  A2100 Discharge Status

- **FORM 3618**

  Person Identifiers
  Dates:
  Transdate

  Transition Indicators:
  Transtype
  Translocation
  Dischargetype

- **FORM 3619**

  Person Identifiers
  Dates:
  Transdate

  Transition Indicators:
  Transtype
  Translocation
  Dischargetype

- **PASRR LEVEL 1**

  Person Identifiers
  Date:
  NFDateOfEntry
  DeceasedOrDisChargedDate

  Transition Indicators:
  NFAdmittedIndividual
  DeceasedOrDisCharged

- **CARE_Assignments_Finder_Both**

  Person Identifiers
  Date:
  EFFECTIVE_DT

  Transition Indicators:
  DISCHARGE_REASON
  DISCHARGE_TYPE

NF Admissions and Episodes of Care

After building individual histories for NF activity, we created rules for defining episodes and characterizing transitions. These rules represented decision points to identify admissions and different types of discharges, as well as to define the time periods for short- and long-term NF episodes, including gaps in or cessation of NF stays.

Admissions marked the beginning of a new NF episode of care. Admissions were identified as dates specifically labeled as an 'admission' or 'entry'. Admissions or entry dates occurring within 30 days of previous NF stay were not used to trigger a new episode based on the CMS guidance regulation Section 40.3.2 which states that "A patient is deemed not to have been discharged if the time between SNF discharge and readmission to the same or another SNF is within 30 days."[2] If this occurred, the admission or entry records extended the pre-existing episode. MDS assessments not specifically labeled as an admission or entry date also served as NF admission if the assessment date met the following criteria: it was the first observed NF activity for the individual, it occurred more than 30 days after a discharge date where it was noted that the individual's return was not anticipated, or the assessment date occurred after a gap in activity of more than 99 days. MDS assessments should be completed every 92 days. After reviewing the distribution of gaps in assessments, we used 99 days in our gap logic to provide a 7-day buffer to account for potential untimely entry of MDS data before ending an episode.

If there was conflicting admission or entry date information across the date sources, we prioritized the date used to trigger the admission from the sources in the following order:

1. MDS 3.0
2. Form 3618/3619
3. PASRR Level 1

NF Discharges

A discharge potentially ends a NF episode. We identified four different types of discharges. The different types characterized discharges from NFs. The details of each are summarized below.

1. **Discharge-Non-institutional Setting**: Discharges in this category were identified through MDS (variable A2100) or Form 3618 (Translocation variable) when the individual was indicated as having been discharged to "community" on MDS (defined in MDS as private home/apt., board/care, assisted living or group home) or to "home" on Form 3618 and their return to the nursing facility was not anticipated. This type of discharge does not imply that an individual received community-based services after discharge.
2. **Discharge-Other/Unknown Setting**: This type of discharge required the reporting of a discharge date that indicated that the individual was being discharged for one of the following:
    - For MDS—to another nursing home or swing bed, acute hospital, psychiatric hospital, inpatient rehabilitation facility, ID/DD facility, hospice, long term care

[2] https://www.cms.gov/Regulations-and-Guidance/Guidance/Manuals/downloads/clm104c06.pdf

hospital, or other (A2100=02, 03, 04, 05, 06, 07,09, 99) or their return was anticipated (A0310F=11)

- For Form 3618—to hospital, nursing facility, community ICF=IID[3], Medicare/SNF, state institution, hospice, private pay, or other/unknown (TRANSLOCATION=1,2,3,4,6,7,8,9) or their return is anticipated (DISCHARGETYPE not 1)
- If these sources were not available, discharge data from Form 3619 and from PASRR Level 1 were also used to identify this type of discharge.

3. **Discharge-Inactivity:** A nursing facility episode was considered to have ended if a discharge date was not reported but a gap of more than 99 days was seen in an individual's MDS assessment activity. MDS assessments are required to be completed every 92 days. After reviewing the distribution of gaps in assessments, we used 99 days in our gap logic to provide a 7-day buffer before ending an episode.

4. **Discharge-Death:** An individual was considered discharged due to death if their discharge date coincided with the individual's death date, or if a discharge date was not reported for a person and the end of a person's activity occurred within 99 days of their death date.

If there was conflicting discharge date information across the date sources, we prioritized the date used to end the episode from the sources in the following order:

1. MDS data
2. Forms 3618 and 3619
3. PASRR Level 1

Death dates were present in the PASRR Level 1, CARE data, MDS, and Forms 3618 and 3619. If an individual had conflicting death dates reported from these sources, we used the death reported in the PASRR Level 1 data.

[3] Note: Form 3618 included a category called "Community ICF-IID". Because these were called ICFs, we interpreted this setting to be an institutional setting; however, we understand that these could have been small group homes with less than 6 individuals. The data does not appear to be sufficient to determine which of these ICFs were non-institutional, but we were able to determine that only about 0.4% of the discharges reported in this category were to community ICFs.

E. Data enhancement and construction of analytic files

We had consulted with DOJ about which fields they considered most likely to be useful for the analysis. We compared these suggestions with the data collection forms and the proposed analyses and, applying our experience in working with MDS and other quantitative data, made final decisions about which variables to use, and which source to use as primary, secondary, and tertiary based on the results of the data quality review and the relative completeness/accuracy of the data in each respective field.

We created an analytic file with one record for each person month that they were in a NF with specific variables that might be utilized for the analysis. We enriched the data by creating additional analytic variables (e.g. admitted, discharged, and type of discharge).

The detailed Excel workbook provides findings related to the number of individuals in the target population admitted to, residing in, and discharged from a nursing facility each month.

Exhibit B

Confidential - Subject to Protective Order

Exhibit B has been provided electronically via email and also produced electronically

Exhibit C

Produce all data from the TMHP PASRR and Specialized Services databases associated with individuals who fall into either of the following two categories:

1) Any individual who received a PASRR Level I screen since January 2011 identifying the person as having an indication of an intellectual disability or related condition; or
2) Any individual who is currently residing or has since January 2011 resided in a nursing facility who had indications of an intellectual disability or related condition as identified in one of the following ways:
    a. In any Minimum Data Set assessment since January 2011, the individual met at least one of the following criteria:
        - Identified as having an intellectual disability in a Level II Preadmission Screening and Resident Review (A1510B)
        - Identified as having a related condition in a Level II Preadmission Screening and Resident Review (A1510C)
        - Identified as having Down Syndrome (A1550A)
        - Identified as having Autism (AI1550B)
        - Identified as having Epilepsy (A1550C)
        - Identified as having an organic condition related to ID/DD (A1550D)
        - Identified as having ID/DD with no organic condition (A1550E)
        - Identified as entering from a ID/DD facility (A1800, response '06')
        - Identified as having an active diagnosis of Cerebral Palsy (I4400)
        - Identified as having a diagnosis in one of the 10 ICD diagnosis fields[1] (I8000A-I8000J) that matches any of following different diagnostic criteria.

ICD9	Description
317(**F-70**)	Mild intellectual disabilities
318(**F-71, F-72 and F-73**)	Other specified intellectual disabilities
G80.1	Unspecified intellectual disabilities
343(**G80.1)**	Infantile cerebral palsy
714.3 (**M08.00, M08.3 and M08.40**)	Juvenile Chronic Polyarthritis
Q90.9, Q91.3, Q91.7, and Q87; E78.71, E78.72 and Q87.2	Congenital Anomalies
759.81 (**Q87.1)**	Prader-Willi syndrome
759.82 (**Q87.40)**	Marfan Syndrome
759.83 (**Q99.2**)	Fragile X Syndrome

    b. Or, at any time since January 2011, the individual received services for one of the following Texas programs:
        - Intermediate Care Facilities for Individuals with an Intellectual Disability, including the State-Supported Living Centers and Community-Based ICF/IID
        - The Home and Community-based Services Waiver

[1] ICD 10 conversions of ICD 9 codes listed here are shown in bold in parentheses following the ICD 9 Codes.

- The Texas Home Living Waiver
- The Community Living Assistance and Support Services Waiver

Attachment A

DARLENE (Dee) O'CONNOR, PhD, Vice President for

Strategic Planning, JEN Associates, Inc., 5 Bigelow St, Cambridge, MA

Professional Summary

Dr. O'Connor has been a leader and innovator in long-term care policy for over 30 years. Her combination of experience in managing services at the community level, developing and administering policy at the state level, influencing policy at the federal level, and analyzing policy at the university level provide her with a unique ability to understand a variety of perspectives and translate research into policy and practice. She is a collaborative problem-solver with a passion for bringing people with disabilities and elders into the discussions with policy makers and providers in order to help shape the policies that affect their lives. She uses creative approaches including, most recently, writing and producing a play to stimulate discussions about elder suicide. She has joined the JEN team out of a commitment to help states use the JEN tools to turn data into information that will help inform policy decisions. JEN Associates was acquired by Westat Inc. in 2018.

Educational Background

PhD	Social Policy/Aging—Heller School, Brandeis University	1987
MA	English—Southern Illinois University, Carbondale, IL	1981
BA	English/Philosophy—Westfield State College, Westfield, MA	1976

Selected Professional Experience

Vice President for Strategic Planning **September 2010 - Present**

JEN Associates, Inc., Cambridge, MA

- Responsible for identifying and building partnerships for research and analytical work with state and federal agency leads, university researchers, and other potential partners
- Develops training materials for the iMMRS™ system, JEN's state-of-the-art tool for analyzing complex multi-payer data bases
- Develops and oversees a team of consultants who provide individualized training on iMMRS™ and leads independent research including systems transformation evaluation for Rhode Island and elder mental health studies in Massachusetts
- Member of the Board of Directors for National Association of PASRR Professionals, Massachusetts Aging and Mental Health Planning Collaborative and Aging and Mental Health Coalition..

Director, Office of Long-Term Support Studies **June 2002 – September 2010**

Commonwealth Medicine, University of Massachusetts Medical School

Associate Professor, Department of Family Medicine & Community Health

- Directed long term care research and policy analysis in collaboration with state agency and other university partners including research related to elders with mental illness and PASRR.
- Principal Investigator for Mass. Systems Transformation ($2.9 million), Mass. State Profile Tool ($482,342) Mass Real Choices ($1.3 million), and Mass. Independence Plus ($500,000) grants from the Centers for Medicare and Medicaid (CMS); Vermont Choices for Care Evaluation ($350,000) and Maine Systems Transformation Evaluation ($133,017)
- Led the Long-Term Care Domain linking Commonwealth Medicine with the research and clinical departments of the Medical School
- Maintained a faculty appointment as Associate Professor of Family Medicine and Community Health

Associate Research Professor and National Project Director **November 2000 – May 2002**

Home and Community-Based Services (HCBS) Resource Network, Boston College

Oversaw the development and enhancement of the website providing state-of-the-art research and information on HCBS issues including the research abstracts, HCBS data, reports, personal views, links to other sites, and a discussion forum.

Directed and provided technical assistance to states in developing and enhancing home and community-based services

Directed HCBS projects funded by two federal agencies within the Department of Health and Human Services (CMS and ASPE) and successfully negotiated contract amendments and supplemental funding in partnership with The MEDSTAT Group

Director, Health & Long Term Care Policy (formerly Integrated Care) **Oct. 1997 – Oct. 2000**
Connecticut Department of Social Services

Developed research proposals & secured Robert Wood Johnson Foundation funding for data matching, analysis and focus groups, and oversaw funded research activities

Oversaw development of state-of-the-art data base merging Medicare, Medicaid and state-funded claims and assessment data and directed research projects analyzing this data to inform public policy decisions

Led the state's planning efforts for community options in response to the Supreme Court's Olmstead decision including drafting comprehensive plan in collaboration with key state agencies, persons with disabilities of all ages, and other stakeholders.

Developed Medicare/Medicaid integration proposals including CT LINC and CT Lifelong Care (modeled after national PACE demo.)

Manager, Alternate Care Unit **March 2002 – September 1997**
Connecticut Department of Social Services

Oversaw consolidation of two major elder home care programs into a $90 million program, the Connecticut Home Care Program for Elders, serving over 6,500 frail elders statewide.

Assumed a key leadership role in planning a managed care initiative for persons on Medicare & Medicaid

Managed two other federal waiver programs, planned two new waivers for persons with disabilities, managed nursing facility preadmission screening/resident review (PASRR) and two AIDS programs.

Awards & Recognition

Joan Quinn Award for Leadership in Aging & Long Term Care	2001
Fellowship, University of Minnesota, Balancing LTC Systems	1998
Managerial Awards for Excellence, State of CT	1990, 1993, 1997,1999

Publications

O'Connor, Darlene and Laney Bruner-Canhoto. "Elder Mental Health—The Next Frontier." *Journal of Aging and Social Policy,* Special Issue on Aging and mental health, eds. O'Connor and Bruner-Canhoto. 23(1), 2011.

O'Connor, Darlene, Jennifer S. Ingle, and Kimberly N. Wamback. "Leveraging the PASRR Process to Divert and Transition Elders with Mental Illness from Nursing Facilities." *Journal of Aging and Social Policy,* 23(1), 2011.

Quach, Emma D., Darlene O'Connor, and Erin McGaffigan. "Supporting People with Disabilities in Managing Individual Budgets: The Role of Support Brokers. *Professional Case Management,* 15(1), 2010.

O'Connor, Darlene, Faith Little, and Richard McManus. "Elders with Mental Illness:Lost Opportunities and New Policy Options. *Journal of Aging and Social Policy*, 21(2), 2009l

O'Connor, Darlene M., Judith A. Savageau, David B. Centerbar, Kimberly N. Wamback, Jennifer S. Ingle, Nicole J. Lomerson. "Lesson in a Pill Box: Teaching about the Challenges of Medication Adherence." *Family Medicine*, 41(2) 2009,

O'Connor, Darlene M. and Kevin J. Mahoney. "Establishing the Insured Event for Connecticut's Public/Private Partnership to Finance Long Term Care." *Policy Studies Journal/Policy Studies Review*, 1992.

Lowy, Louis and Darlene O'Connor. Why Education in the Later Years? Lexington: D.C.Heath and Co., 1986. (translated into Japanese, 1995)

JOANNA KUBISIAK, MPH, Senior Analyst/Epidemiologist

JEN Associates, Inc., 5 Bigelow St., Cambridge, MA

Professional Summary

Ms. Kubisiak is an epidemiologist and a skilled analyst. She has extensive experience in analyzing national and state level Medicaid and Medicare claims and enrollment data and tailoring the data for a variety of research aims. Through collaboration with the Robert Wood Johnson Foundation, she worked on problems in the identification of disability, impairment and injuries in Medicare and Medicaid populations as part of the JEN analysis of patterns of frailty in elderly dually eligible populations. This project required Ms. Kubisiak to analyze Massachusetts Medicaid and Medicare claims and enrollment data to identify and describe impairments, disabilities, and injury rates in populations requiring long term care services. Through work with the state of Massachusetts, Ms. Kubisiak performed a multi-year evaluation of their Senior Care Options (SCO) program. She has also been the lead analyst on contracted projects with several pharmaceutical companies and is experienced in completing pharmaco-epidemiological and cost of burden analyses. Other topic areas in which she has significant experience include, epidemiological profiling, longitudinal analyses, economic modeling, case-control matching methodologies, and the development algorithms for episodes of care and disease typology. JEN Associates was acquired by Westat Inc. in February 2018.

Educational Background

MPH, Epidemiology, University of Michigan, Ann Arbor 1999

- Completed thesis research through the analysis of HIV/AIDS surveillance data collected for the state of Michigan.
- Collaborated on the design, implementation, and data analysis of a case-control study investigating otitis media in children.
- Conducted a research study investigating the occurrence of heart disease among American Indians

BA, Anthropology, Wayne State University, Detroit, MI 1997
Psychology and Addiction Studies, Mercy College of Detroit, 1989-1991

Professional Experience

8/99-Present Senior Analyst/Epidemiologist
JEN Associates, Inc.
Supervisor: Daniel Gilden, Cambridge, MA

- Designs and performs statistical analyses on national and state level longitudinal Medicare and Medicaid databases
- Completes pharmaco-epidemiological, cost of burden analyses and economic modeling
- Prepares research material for presentations and publications
- Involved in the ongoing evaluation of Massachusetts's SCO program
- Developed a disease categorization scheme for a collaborative research project with the Robert Wood Johnson Foundation investigating the impact of frailty on the long-term care needs of elderly populations

5/99-8/99 **Research Assistant**
University of Michigan Hospital
Supervisor: Kathleen Cooney, M.D. , Ann Arbor, MI

- Enrolled participants in a nation-wide prostate cancer genetics study
- Conducted telephone interviews and perform participant follow-up
- Collaborated with Study Team members in the development of new projects and study initiatives

5/98-9/98 **Intern**
Michigan Department of Community Health (MDCH)
Supervisor: Eve Mokotoff, MPH, Detroit, MI
Chief, HIV/AIDS Epidemiology

- Designed and implemented a validation study investigating the reporting of risk behaviors for HIV exposure
- Performed medical record reviews and collaborated with health professionals at multiple sites in tri-county area Submitted findings to MDCH and the Centers for Disease Control and Prevention

Publications

Gilden DM, Kubisiak J, Zbrozek AS. The economic burden of Medicare-eligible patients by multiple sclerosis type. *Value Health*. 2011 Jan; 14(1):61-9.

Bishop CE, Ryan AM, Gilden DM, Kubisiak J, Thomas CP. Effect of an expenditure cap on low-income seniors' drug use and spending in a state pharmacy assistance program. *Health Serv Res*. 2009 Jun;44(3):1010-28.

Gilden DE, Kubisiak JM, Gilden DM. Managing Medicare's HIV caseload in the era of suppressive therapy. *Am J Public Health*. 2007 Jun; 97(6):1053-9.

Slayter EM, Garnick DW, Kubisiak JM, Bishop CE, Gilden DM, Hakim RB. Injury prevalence among children and adolescents with mental retardation. *Ment Retard*. 2006 Jun;44(3):212-23.

Rao S, Kubisiak J, Gilden D. Cost of illness associated with metastatic breast cancer. *Breast Cancer Res Treat*. 2004 Jan;83(1):25-32.

Bishop CE, Gilden D, Blom J, Kubisiak J, Hakim R, Lee A, Garnick DW. Medicare spending for injured elders: Are there opportunities for savings? *Health Aff* (Millwood). 2002 Nov-Dec;21(6):215-23.

Chrischilles E, Gilden D, Kubisiak J, Rubenstein L, Shah H. Delivery of ipratropium and albuterol combination therapy for chronic obstructive pulmonary disease: effectiveness of a two-in-one inhaler versus separate inhalers. *Am J Manag Care*. 2002 Oct;8(10):902-11.

ANGELINA LEE, PhD, Senior Programmer Analyst,

JEN Associates, Inc., 5 Bigelow St., Cambridge, MA

Professional Summary

Dr. Lee is a senior programmer/analyst and will serve as the chief data architect/manager for the project. Dr. Lee is an expert programmer with extensive experience in the development and analysis of Medicare and Medicaid claims and enrollment databases. She has supervised the creation of the linked Medicaid-Medicare databases used for the HCFA Evaluation of Medicaid Drug Utilization Review (DUR) for the states of Washington, Iowa, Maryland, and Georgia. She has prepared the JEN outcome analyses for the DUR project as well as many of the econometric analytic records used in the cost analyses.

Dr. Lee has adapted Medicaid and Medicare data for policy planning and economic forecasting applications for JEN projects for the states of Maryland, Massachusetts, Washington and California. She has written complex programs for the interpretation and analysis of claims data from disparate sources, designed and implemented algorithms for the categorization of service types, identified disability and impairment from diagnostic data, and produced analysis of adverse medical outcomes.
JEN Associates was acquired by Westat Inc. in February 2018.

Educational Background

PhD, Civil and Environmental Engineering, University of California, Los Angeles 1996
Minor Fields: Operations Research and Applied Mathematics
MS, Civil Engineering, , University of California, Los Angeles 1993
BS, Industrial Engineering and Operations Research, University of California, Berkeley 1991

Professional Experience

Senior Programmer Analyst/Database Administrator
Nov 1996 - present
JEN Associates, Incorporated, Cambridge, MA

Developed and analyzed multiple state-wide linked Medicare and Medicaid claims and enrollment data warehouse for the evaluation of health and financial effects of trial health care policies. Used TOOL, a proprietary RDBMS, in a client/server architecture to create and manage database tables each up to 70GB on VAX/Alpha AXP computer network. Manage disk space and routine backup of database. Responsible for assurance of data quality for accurately measuring the health services used by a population, exploring the reasons for missing data, mis-reported data, and administrative credits and debits.

Additional Contributions:

- Served on a software advisory committee and produced plug-ins to add functionality to the company's RDBMS.
- Suggested improvement to the company's RDBMS which was implemented and increased productivity by at least 30%.
- Implemented data warehouse, reducing time of study evaluations by 80%.

Senior Project Analyst
Jul 1998 - Jul 1999

Saint John's Health Center, Santa Monica, CA

Participated in project teams to implement conversion of software systems in the finance, medical records, and radiology departments through design, testing, implementation, and support of:
customized interfaces using Visual Basic between a SQL Server 6.5 software system and Meditech (a legacy health information system)
customized interfaces between a B-trieve software system and Meditech
scripts for scheduled system tasks to replace manual data entry

Advanced report programming in Meditech; programmed scripts for producing scheduled reports; trained analysts in Access and Visual Basic.

Industrial Engineer

Feb - Sep 1992

Department of Defense, Naval Air Station, Alameda, CA

Designed a local area network and developed a relational database structure to centralize scheduling, budgeting, and approving information for managing facilities at the depot. Coordinated needs of facility managers, supervisors, engineers, budget analysts, and liaisons; wrote justifications and requisitions to purchase the server, network equipment, and software packages. Programmed the interface, forms, and reports in dBase.

Computer Skills

Systems:	VMS, UNIX, WINDOWS NT, WINDOWS 98, PC DOS, Macintosh, NeXT
Languages:	FORTRAN, Pascal, APL, BASIC
Databases:	SQL Server, Oracle, dBase, R-Base, SAS
Software:	Visual Basic, Microsoft Access, Microsoft Office, Surfer, MATLAB, PhotoShop

Publications

Adams, A. S., Madden, J. M., Zhang, F., Lu, C. Y., Ross-Degnan, D., Lee, A., et al. (2017). Effects of Transitioning to Medicare Part D on Access to Drugs for Medical Conditions among Dual Enrollees with Cancer. Value in Health, 20(10), 1345-1354. doi:10.1016/j.jval.2017.05.023

DOUGLAS BEDELL, MS, Systems Architect

JEN Associates, Inc., Cambridge, MA

Professional Summary

Doug Bedell is a Senior Systems Architect responsible for supporting the development and maintenance of JEN's iMMRS® and ADIT tools and performing data quality and analysis projects across JEN's client base. JEN Associates was acquired by Westat Inc. in February 2018.

Educational Background

FLORIDA INSTITUTE OF TECHNOLOGY, MELBOURNE, FL **1992**
MS, Operations Research

UNITED STATES MILITARY ACADEMY, WEST POINT, NY **1986**
BS, Electrical Engineering

Professional Experience

SENIOR SYSTEMS DEVELOPER
2006-Present
JEN Associates, Inc., Cambridge, MA

Senior Systems Developer primarily tasked with the maintenance and upgrade of the SAS interface embedded in JEN's iMMRS product. Perform systematic reviews of SAS code and rewrite modules with the end goal of improving system efficiency. Rewrite legacy SAS code to remove all hard-coded variable calculations and replace with generalized macros so that the system can be utilized in areas other than medical reporting. Implement new algorithms in the SAS code to support new/enhanced capabilities added to the iMMRS GUI and reporting features. Enhance JEN's data quality analysis and reporting algorithms (SAS-to-Excel Workbook interface) for use with very large data warehouses. Generate custom data analysis and reporting interfaces based on specific client data use requirements.

Recent Projects

Dates	Project	Tasks
05/12-09/12	MA APCD Quality Assurance	Install/configure ADIT in MA environment. Write SAS code to load/analyze eligibility and claims data. Write code to generate custom Excel reports for quality analysis
12/12-01/13	ME MCBS Data Dictionary Update	Update and install new data dictionary into iMMRS server for Medicare Current Beneficiary Survey for Maine
06/13-12/13	MA Risk Score Sensitivity Analysis	Port 3rd-party risk adjustment SAS code to operational environment. Write code to import study data. Resolve data quality issues to insure completion of data analysis. Write analytic code for demographic and risk score latency. Format raw results into custom Excel reports.
01/14-03/14	CT Dual Primary Care Clustering	Perform primary care physician cluster analysis on dual eligible CT enrollees. Optimize SAS code. Design code to

		convert raw tabular SAS data into geocoords and integrate into iMMRS mapping feature to generate graphical maps of PCP clusters.
02/14-06/14	MA Risk Score Sensitivity Analysis	Refresh of Risk Score project for current year data. Add custom score sheet for risk score analysis.
04/14-07/14	MA APCD Quality Assurance	Refresh of QA project for current year data
09/13-present	HCIA High Risk/Disease Specific Evaluation of Innovation Projects	Port CMS risk adjustment SAS code to run in CCW data enclave. Perform availability, completeness and usability analysis on Medicaid MAX data, identifying FFS vs. Managed Care, hospitalizations, ED utilization for years 2010 through 2013 across multiple states.

STAFF ENGINEER/ARCHITECT
SEPT 1995 - JUL 2005
Cimage NovaSoft, Inc., Houston, TX

Senior programmer primarily responsible for server-based implementation of software solutions and migration of product user interface from Unix workstations to Windows GUI. A member of the core group of programmers responsible for upgrading standard client/server product written in C to "internet-ready" architecture written in Java. Lead programmer assigned to review code from all software engineers for stability issues and fix any problem areas to insure no program faults. Lead architect/programmer for server product used to convert Microsoft Office and Autocad documents to view-only PDF files. Responsible for upgrading Oracle interface with each new release of the RDBMS. Upon new product release in 2005, traveled to multiple client work sites to assist with upgrade and implementation of new software.

SYSTEMS ADMINISTRATOR/DEVELOPER
OCT 1990 - SEPT 1995

Objective Solutions, Inc., Melbourne, FL

Administered and maintained all computer systems located at corporate headquarters, including VAX/VMS, Unix and Windows/DOS platforms. Maintained the company source code control system. Acted as database manager for corporate Oracle, Informix and DEC/Rdb databases. Managed the company technical support department. Assisted lead programmer in implementing new product features written in the C programming language. Acted as build engineer to create all media for beta and release software.

MILITARY INTELLIGENCE OFFICER—United States Army
MAY 1986 - MAY 1990

Fort Lewis, WA

Ilene Rosin, MPH, Project Management Officer

JEN Associates, Inc., 5 Bigelow St., Cambridge, MA 02139

Professional Summary

Ms. Rosin is a seasoned Project Manager with broad healthcare industry experience across provider, payor, and employer markets in the public, private, and non-profit sectors. Having successfully partnered with executive leadership, mid-level management, and operational staff, Ms. Rosin has expertise in healthcare informatics, qualitative interviewing, project management, program evaluation, and teaching writing. She has demonstrated success in operational process improvements, provider education initiatives, program evaluation methodologies, data analysis, and data system evaluations. JEN Associates was acquired by Westat Inc. in February 2018.

Educational Background

MPH, Health Education/Health Behavior
University of Michigan School of Public Health; Ann Arbor, Michigan
BA, Human Health
University of Michigan College of Literature, Science, and the Arts; Ann Arbor, Michigan

Professional Experience

JEN Associates, Inc, 2014-pres
Project Management Officer

- Managed several CMS and state projects for JEN and developed the Client Management Team to provide support on all the company's work.
- Supervised several staff analysts and has been a member of the Strategic Coordination (aka Senior Leadership) Team

JBS International, Rockville, MD 2013

Consultant; Proposal Editor

- Provided extensive review and editing of proposals submitted to the Health Research and Services Administration (HRSA). Editing focused on explaining recommended methodologies for evaluating the effectiveness of HRSA-funded programs.

Steward Health Care, Dedham, MA 2012

Project Manager; Population Health and Clinical Integration

- Pioneer ACO Palliative Care Clinical Integration Initiative
  - Identified internal clinical and operational sponsors for an initiative to improve end-of-life care and reduce costs. Developed project plan and timetable, identified clinical education priorities, established evaluation metrics and processes.
- Integration of Primary Care Physicians into Care Management
  - Developed a strategy for integrating primary care physicians into Steward's care management program. Identified work flow processes to improve physician engagement with patients. Established criteria for program evaluation.

- Steward Care at Home

- ✧ Developed evaluation and data collection methodology for Steward Care at Home, an experimental program to test the effectiveness of nurse-practitioner home visits on reducing the rate of inpatient re-admissions and lowering costs for high-risk patients. Instructed nurse practitioner on study design to ensure valid and reliable data collection.

Ilene Rosin, Inc., Arlington, MA 2003-2012

Consulting services included organizational needs assessment; business process re-design; healthcare informatics product development; data reporting and analysis; business development; project management; community outreach; program planning and evaluation. Sample clients included:

- *HealthCare Insight (VeriskHealth), Salt Lake City, UT:* Conducted qualitative assessment of sales proposal cycle, resulting in an improved sales product for healthcare fraud & abuse detection company. Designed data quality reports to assess data completeness and accuracy. Redesigned reports for prospective clients demonstrating potential savings from fraud and abuse products. Standardized data acquisition tools and processes for prospective clients.
- *Wellman Center for Photomedicine, Massachusetts General Hospital, Boston, MA:* Transformed out-facing image of the Wellman Center to attract research clinicians and philanthropic support for innovative applications of laser technology. Designed & conducted in-depth interviews with interdisciplinary teams of MD & PhD clinicians to identify research priorities and inform philanthropic initiatives.
- *Accord Alliance, Boston, MA:* Developed and implemented fundraising strategy for non-profit organization with a mission to improve healthcare for patients and families affected by Disorders of Sex Development.
- *Towers Watson, Stamford, CT:* Provided analytical expertise for annual studies of healthcare cost and use with benefit management recommendations for Fortune 500 client.
- *Activate HealthCare, Chicago, IL:* Developed and implemented analytical strategy to assess need for improved primary care in employed populations.
- *Boston Psychoanalytic Society & Institute, Boston, MA:* Improved BPSI's image and increased provider and patient awareness of service availability. Conducted qualitative interviews with wide range of clinicians to assess individual and organizational areas of expertise; recommended strategies for publicizing organizational strengths.

Thomson Reuters (Medstat), Cambridge, MA 1988-2003

Consulting Manager; Employer and Government Operations Business Units

- Established and managed client relationships; led account teams; directed ad hoc reporting and analysis for Fortune 500 and government clients. Provided subject matter expertise throughout marketing and sales of healthcare decision support tools for prospective clients. Responsible for account budgeting, P&L, and securing contract renewals and value-add consulting revenue.
- Trained and supervised data analysis and management teams. Provided internal and external consultation on study design and methodology. Advised clients on clinical and disease management interventions to improve health outcomes, quality, and costs.
- Trained, coached, and mentored staff in oral and written presentation skills.
- Initiated and taught corporate-wide Human Resources business writing courses. Developed curriculum and provided individualized follow-up for professional development.

Attachment B

Steward v. Smith
5:10-CV-1025-OLG
In the United States District Court for the Western District of Texas
San Antonio Division

EXPERT REPORT OF DARLENE M. O'CONNOR, PHD

	Document	Bates No.
1.	CARE-HCS M204 Data Mapping.xlsx	DefE-06355450
2.	Pages from Consumer Analysis.pdf	DefE-06355452
3.	CARE Slot Types.xlsx	DefE-06360111
4.	CARE SVC Code Lookup.xlsx	DefE-06360112
5.	Pages from Consumer Analysis.pdf	DefE-06357774
6.	PASRR_CARE_RO_ASSIGNMENT.xlsx	DefE-05808021
7.	CARE Address History Finder Both.xlsx	DefE-06003157
8.	CARE Assignments Finder Both.xlsx	DefE-06003158
9.	CARE Demographics Finder Both.xlsx	DefE-06003159
10.	CARE Diagnosis Finder Both.xlsx	DefE-06003160
11.	CARE Enrollment Finder Both.xlsx	DefE-06003161
12.	CARE IPC Detail Finder Both.xlsx	DefE-06003162
13.	CARE_IPC_Finder_Both.xlsx	DefE-06003163
14.	CARE Slot History Finder Both.xlsx	DefE-06003164
15.	CARE RO ASSIGNMENTS Finder Both.xlsx	DefE-06354117
16.	CARE_Address_History_Finder.xlsx	DefE-01935083
17.	CARE Slot History Finder.xlsx	DefE-01935090
18.	CARE Assignments Finder.xlsx	DefE-01935084
19.	CARE Demographics Finder.xlsx	DefE-01935085
20.	CARE_Diagnosis_Finder.xlsx	DefE-01935086
21.	CARE Enrollment Finder.xlsx	DefE-01935087
22.	CARE IPC Detail Finder.xlsx	DefE-01935088
23.	CARE_IPC_Finder.xlsx	DefE-01935089
24.	Waiver3 Sections.xlsx	DefE-04708914
25.	Unique Medicaid ID.xlsx	DefE-04708792
26.	3618.xlsx	DefE-04708793
27.	3619.xlsx	DefE-04708794
28.	MDS3 Sections.xlsx	DefE-04708795
29.	MDS3 LTCMI.xlsx	DefE-04708796
30.	NFSS.xlsx	DefE-04708797
31.	PASRR.xlsx	DefE-04708798
32.	PASRR LTCMI.xlsx	DefE-04708799
33.	PE.xlsx	DefE-04708800
34.	PL1.xlsx	DefE-04708801
35.	PSS.xlsx	DefE-04708802
36.	Waiver2_LTCMI.xlsx	DefE-04708803
37.	Waiver2 Sections.xlsx	DefE-04708804

38.	Waiver3_LTCMI.xlsx	DefE-04708805
39.	Waiver3_Sections.xlsx	DefE-04708806
40.	3618.xlsx	DefE-04708807
41.	3619.xlsx	DefE-04708808
42.	MDS_LTCMI.xlsx	DefE-04708809
43.	MDS_Sections.xlsx	DefE-04708810
44.	NFSS.xlsx	DefE-04708811
45.	PASRR.xlsx	DefE-04708812
46.	PASARR_LTCMI.xlsx	DefE-04708813
47.	PE.xlsx	DefE-04708814
48.	PL1.xlsx	DefE-04708815
49.	Waiver2_LTCMI.xlsx	DefE-04708829
50.	Waiver2_Sections.xlsx	DefE-04708830
51.	Waiver3_LTCMI.xlsx	DefE-04708831
52.	Waiver3_Sections.xlsx	DefE-04708832
53.	3618.xlsx	DefE-04708833
54.	3619.xlsx	DefE-04708834
55.	MDS3_LTCMI.xlsx	DefE-04708835
56.	MDS3_Sections.xlsx	DefE-04708836
57.	PASRR.xlsx	DefE-04708838
58.	PE.xlsx	DefE-04708863
59.	PL1.xlsx	DefE-04708864
60.	PSS.xlsx	DefE-04708816
61.	NFSS.xlsx	DefE-04708837
62.	PASRR_LTCMI.xlsx	DefE-04708839
63.	PL1_Set2b.txt	DefE-00096518
64.	MDS3_Set1.txt	DefE-00096509
65.	PE.txt	DefE-00096510
66.	PL1_Set1.txt	DefE-00096511
67.	MDS_Set2a.txt	DefE-00096512
68.	PASARR_Set2a	DefE-00096513
69.	PE_Set2a.txt	DefE-00096514
70.	PL1_Set2a.txt	DefE-00096515
71.	MDS_Set2b.tx	DefE-00096516
72.	PE_Set2b.txt	DefE-00096517
73.	Waiver2_Section	DefE-04708804
74.	Waiver3_LTCMI.txt	DefE-04708805
75.	Waiver3_Sections.txt	DefE-04708806
76.	3618.txt	DefE-04708807
77.	3619.txt	DefE-04708808
78.	MDS_LTCMI.txt	DefE-04708809
79.	MDS_Sections.txt	DefE-04708810
80.	NFSS.txt	DefE-04708811
81.	Pasarr.txt	DefE-04708812
82.	Pasarr_LTCMI.txt	DefE-04708813

83.	PE.txt	DefE-04708814
84.	PL1.txt	DefE-04708815
85.	UniqueMedicaidId.xls	DefE-04708792
86.	3618.txt	DefE-04708793
87.	3619.txt	DefE-04708794
88.	MDS3 Sections.txt	DefE-04708795
89.	MDS3_LTCMI.txt	DefE-04708796
90.	NFSS.txt	DefE-04708797
91.	PASARR.txt	DefE-04708798
92.	PASARR_LTCMI.txt	DefE-04708799
93.	PE.txt	DefE-04708800
94.	PL1.txt	DefE-04708801
95.	PSS.txt	DefE-04708802
96.	Waiver2_LTCMI.txt	DefE-04708803
97.	3618.txt	DefE-04708833
98.	3619.txt	DefE-04708834
99.	MDS3_Sections.txt	DefE-04708836
100.	Pasarr.txt	DefE-04708838
101.	PE.txt	DefE-04708863
102.	PL1.txt	DefE-04708864
103.	Waiver3_Sections.txt	DefE-04708914
104.	Waiver2_LTCMI.txt	DefE-04708829
105.	Waiver2_Sections.txt	DefE-04708830
106.	Waiver3_LTCMI.txt	DefE-04708831
107.	Waiver3_Sections.txt	DefE-04708832
108.	NFSS.txt	DefE-04708837
109.	Pasarr_LTCMI.txt	DefE-04708839
110.	PSS.txt	DefE-04708816
111.	Data_Dictionary-MDS+LTCMI V2.0.xls	US00251135
112.	Data_Dictionary-PSS.XLS	US00261270
113.	LegacyPASARRDataDictionary.xls	US00251140
114.	LTC_CMS_OVERVIEW.PDF	DefE-06029131-6029350
115.	PE+PL1DataDictionary.xlsx	US00252509
116.	20170214_TMHP Data Pull (updated).docx	US00261268-261269
117.	PASRR_CARE_RO_ASSIGNMENT.xlsx	DefE-05808021
118.	CARE_Address_History_Finder_Both.xlsx	DefE-06003157
119.	CARE_Assignments_Finder_Both.xlsx	DefE-06003158
120.	CARE_Diagnosis_Finder_Both.xlsx	DefE-06003160
121.	CARE_Enrollment_Finder_Both.xlsx	DefE-06003161
122.	CARE_IPC_Detail_Finder_Both.xlsx	DefE-06003162
123.	CARE_IPC_Finder_Both.xlsx	DefE-06003163
124.	CARE_Slot_History_Finder_Both.xlsx	DefE-06003164
125.	CARE_RO_ASSIGNMENTS_Finder_Both.xlsx	DefE-06354117
126.	Unique Medicaid ID.xlsx	DefE-04708792
127.	3618.xlsx	DefE-04708793

128.	3619.xlsx	DefE-04708794
129.	MDS3 Sections.xlsx	DefE-04708795
130.	MDS3 LTCMI.xlsx	DefE-04708796
131.	NFSS.xlsx	DefE-04708797
132.	PASRR.xlsx	DefE-04708798
133.	PASRR LTCMI.xls	DefE-04708799
134.	PE.xlsx	DefE-04708800
135.	PL1.xlsx	DefE-04708801
136.	PSS.xlsx	DefE-04708802
137.	Waiver2 LTCMI.xlsx	DefE-04708803
138.	Waiver2 Sections.xlsx	DefE-04708804
139.	Waiver3 LTCMI.xlsx	DefE-04708805
140.	Waiver3 Sections.xlsx	DefE-04708806
141.	Medicare Claims Processing Manual, Chapter 6	Available at: https://www.cms.gov/Regulations-and-Guidance/Guidance/Manuals/downloads/clm104c06.pdf
142.	Form 3618, Resident Transaction Notice, Instructions	Available at: https://hhs.texas.gov/laws-regulations/forms/3000-3999/form-3618-resident-transaction-notice
143.	Form 3619, Medicare/Skilled Nursing Facility Patient Transaction Notice, Instructions	Available at: https://hhs.texas.gov/laws-regulations/forms/3000-3999/form-3619-medicareskilled-nursing-facility-patient-transaction-notice