REPORT PREPARED: March 2017

NON-MORTALITY SPECIAL INCIDENTS

Semi-Annual Report Submitted to the California Department of Developmental Services

JULY-DECEMBER 2016



Mission Analytics Group, Inc.

601 Montgomery St., Suite 400

San Francisco, CA 94111

This report summarizes rates of special incidents between July and December 2016 for DDS individuals living in community residential care settings. It compares rates across recent years and identifies months in which rates were unusually high.

DDS can use this report to track special incident rates over time and monitor the effectiveness of risk management activities.

As one element of risk management and quality assurance, the California Department of Developmental Services (DDS) and California's network of regional centers monitor the occurrence of adverse events. captured through Special Incident Reports (SIR), to identify trends and develop strategies to prevent and mitigate risks. As required by Title 17, Section 54327 of the California Code of Regulations, vendors and long-term health care facilities report occurrences of suspected abuse, suspected neglect, injury requiring medical attention, unplanned hospitalization, and missing persons, if they occur when an individual is receiving services funded by a regional center (under vendored care). In addition, any occurrence of individual mortality or an individual being the victim of crime must be reported whether or not it occurred while they were under vendored care.

This report, one of a series of semi-annual reports on non-mortality special incidents, summarizes incident rates for DDS individuals between July and December 2016. The report has two main goals:

- 1. To update time trends in special incident rates from our earlier reports to include data through December 2016.
- 2. To identify specific incident categories that were higher than their historical trend and identify specific months in which incident rates were unusually high. DDS can use this report to track special incident rates over time.

The statistics and graphs presented in this report were constructed using data from the SIR System. These data are augmented with three additional data sources maintained by DDS:

- 1. The Client Master File (CMF)
- 2. The Client Development Evaluation Report (CDER)
- 3. The Purchase of Service (POS)

This report presents findings based on statistical analyses that measure an individual's risk of experiencing a special incident. Further details are found at the bottom of each subsequent page.

Changes in the Rate of Non-Mortality Incidents between Time Periods

Table 1: All Non-Mortality Special Incidents, Compared to Previous Periods DDS Out-of-Home Individuals, July-December 2016

	Change From	
	Jul–Dec 2015 (last year)	Jan–Jun 2016 (last period)
Raw Rate	-1.3%	-4.9%
Case-Mix Adjusted Rate	-0.2%	-4.7%

If applicable, arrows will indicate statistically significant differences.

Key Findings:

- The case-mix adjusted non-mortality incident rate this period is 2.03%, 4.7% lower than in the last period (2.13%).
- The 2.03% case-mix adjusted non-mortality incident rate this period is 0.2% lower than in the second half of 2015.

More About These Data

This report summarizes incident rates for individuals residing in community settings such as licensed residential facilities, Family Home Agency (FHA), Supported Living Services (SLS), or Independent Living Services (ILS). The report excludes individuals residing in a developmental center or state-operated facility. Special incidents refer to categories of adverse events defined by Title 17, Section 54327 of the California Code of Regulations. They include missing person, suspected abuse, suspected neglect, medication errors or serious injury, unplanned medical or psychiatric hospitalization, victim of crime, and death.

The *Raw Rate* is defined as the percentage of statewide individuals who experience one or more special incidents in an average month. This rate is calculated by dividing the *total number of individuals with one or more incidents* by the *total individual population*. Note that this rate does not tell how many SIRs there were per person within a given month.

The *Case-Mix Adjusted Rate* accounts for differences in the characteristics of the individual population over time. In comparing statewide SIR rates to those of previous periods, case-mix adjustment permits us to distinguish trends affected by changes in population from trends associated with risk management practices. For example, an influx of medically fragile individuals could increase rates of unplanned hospitalization incidents, even if the effectiveness of risk management practices did not change.

Arrows indicate that the change is statistically significant at the 95% confidence level. These differences are expected to occur by chance less than 5% of the time.

Trend of Non-Mortality Special Incidents





Key Findings:

- The statewide case-mix adjusted non-mortality rate has steadily decreased since April 2015, from a rate of 2.20% to 2.07%.
- The 12-month moving average in December 2016 is the lowest it has been over the last two years.

More About These Data

The monthly incident rate is defined as the share of individuals experiencing one or more non-mortality incidents in a given month. The trend line in Figure 1 represents a 12-month moving average of the monthly incident rate. It is calculated by taking an average of statewide non-mortality special incident rates from the most recent 12-month period. This trend also accounts for the differences in the characteristics of the individual population over time. This approach, called "case-mix adjustment," controls for changes in individual characteristics and removes these effects from the calculated trend.

Rate of Non-Mortality Special Incidents over Time





Key Findings:

- The adjusted incident rate has not exceeded the high threshold since March 2015. The rate steadily decreased from June 2016 to November 2016, staying below the long-term trend from August to December 2016.
- The adjusted incident rate began to increase in November 2016, but remains just below the long-term trend in December 2016.

The black line in the graph above is the same line shown in Figure 1, representing the 12-month trend. The blue line represents the percentage of individuals statewide who experience one or more special incidents in a month. Both rates are case-mix adjusted, meaning that the trends account for changes in individual characteristics over time. See page 2 for more details.

This graph identifies non-mortality incident rates that are unusually high and, therefore, classified as a "spike." A rate that rises above the yellow line in a given month will occur randomly in only one month out of twenty (less than 5% of the time) and is considered "High". A rate that rises above the red line in a given month will occur randomly less than 1% of the time. Rates above the red line, therefore, are very unlikely to be chance events and are classified as "Very High."

Breakdown of Non-Mortality Special Incidents



Figure 3: Breakdown of Non-Mortality Special Incidents by Type Out-of-Home Individuals, July – December 2016

Key Findings:

- The distribution of incident types is similar to that of previous periods.
- Unplanned medical hospitalizations comprised about one third of all incidents in this semi-annual period.
- Medication errors made up 20% of non-mortality incidents this period, compared to 17% last period.

More About These Data

The percentages shown above are based on raw counts of reported special incidents and are not case-mix adjusted. Percentages may not sum to 100% due to rounding error.

Non-Mortality Special Incident Rates by Regional Center

Figure 5: Non-Mortality Special Incident Rates by Regional Center Compared to State January 2016 – December 2016



Percentage Higher or Lower than Statewide Average

Key Findings:

- For 19 of 21 regional centers, the average non-mortality incident rate over the last year was within 30% above or below the statewide average.
- Golden Gate Regional Center (GGRC) continues to have an unusually low non-mortality incident rate, at 41% below the statewide average.
- Redwood Coast Regional Center's (RCRC) rate is more than 80% higher than the state average for the year. This gap is substantially higher than in the previous year, when RCRC's rate was 61% higher than the state average.

Follow-Up Activities:

- Mission Analytics Group (Mission) continues to provide RCRC with technical assistance regarding high rates of abuse, neglect, and medication errors.
- Based on additional analysis and technical assistance, it appears that GGRC may be under-reporting non-mortality incidents including unplanned hospitalizations. This affects the case-mix adjustment for mortality rates (see Mortality Special Incidents report for this semi-annual period). In response to findings Mission presented, GGRC will take steps to make certain that it reports CDER and SIR data as completely and as accurately as feasible.

The percentages above are case-mix adjusted, meaning that they account for differences in the characteristics of the individual population over time. See page 2 for more details.

Key Findings and Activities

Mission is coordinating closely with the regional centers to track and monitor the followup activities associated with quarterly SIR spikes. For longer-term increases in incident rates, Mission uses SIR case reviews, site visits, and statistical analyses as part of its monitoring, discovery, and improvement activities. A number of additional activities continue to support DDS and regional centers in preventing future incidents. We describe these activities below.

Monitoring and Discovery Activities

- Reporting Back: Regional centers with quarterly spikes in individual incident types report back to Mission on any discovery and remediation activities related to these spikes, including a description of why any spikes occurred, what follow-up actions were taken, and whether the centers faced obstacles in implementing these follow-up activities. These responses are reviewed by the DDS Quality Management Executive Committee and may be used to develop strategies for how to mitigate risk to individuals statewide.
- Long-Term Increases in Incident Rates: Mission has a multi-stage process to investigate long-term increases in incident rates. We provide additional analyses and technical assistance to regional centers identified based on results such as those shown on page 6. For identified regional centers, we conduct additional analyses to determine the detailed incident types and/or individual characteristics associated with the increase. Based on these results, we determine whether a more detailed review of the SIRs is necessary to better understand the issue. As appropriate, we also work with the regional centers to identify mitigation strategies.
 - Mission established that the increase in medication errors accounted for the difference between RCRC's non-mortality incident rate and the statewide average. Mission has continued to conduct follow-up analyses every six months of medication errors at RCRC. RCRC implemented the Medication Error Diagnostic Tool to limit medication errors in its SLS population. Mission analyzes the completed tools on a quarterly basis and will continue to provide support to RCRC in implementation of this and other mitigation strategies.
 - Mission continues to work with RCRC regarding their suspected abuse incidents. After analyzing the suspected abuse data for RCRC and the rest of the state, Mission concluded that the overall rate of suspected abuse at RCRC would decrease substantially if RCRC were to limit repeated suspected abuse incidents. Mission and DDS will attend another in-person meeting with RCRC to review data and discuss mitigation strategies and Mission will continue to provide support to RCRC to identify strategies to reduce suspected abuse incidents.

System Improvement Activities:

- DDS SafetyNet Website: Mission maintains the DDS SafetyNet, a website promoting health and safety for individuals with developmental disabilities. In addition to addressing safety issues identified in partnership with the Association of Regional Center Agencies' Chief Counselor Risk Management Committee, SafetyNet materials respond directly to trends in special incident rates to help manage risk among the individual population. In this semiannual period, DDS published content focused on household cleanliness to address suspected neglect incidents and winter content focused on mental health to address unplanned psychiatric hospitalizations.
- DDS Mental Health Services Act (MHSA): Cycle III (Fiscal Year 2014/15 2016/17) MHSA Projects are in their second year. A Mental Health/Forensic Collaborative will assist individuals and regional centers in navigating the criminal justice system and shortening incarceration time by establishing competency to stand trial training and identifying resources within the community. An infant mental health project will promote cultural competence in clinical care settings, while another project will develop a mental health clinic to provide psychiatric assessment, medication management, and individual and group therapy. Two projects will assist transition age youth with referrals and connections to appropriate community resources, continuity of care before, during and after hospital admission, identify new community resources, early detection and assessment of mental health conditions and establish a Wellness/Drop-In Center. The final project will provide training on evidence-based practices and how each can be used for prevention and early intervention.