

Social and human service programs review: Utilization trends

State of Rhode Island, Office of the Health Insurance Commissioner

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Background

Milliman, Inc. (Milliman) has been retained by the State of Rhode Island Office of the Health Insurance Commissioner (OHIC) to conduct a comprehensive review of all social and human service programs having a contract with or licensed by the state, inclusive of the State of Rhode Island Executive Office of Health and Human Services (EOHHS) and the state agencies under its purview. This review is required by State of Rhode Island General Laws (RIGL) § 42-14.5-3(t). This statute requires nine assessments covering various rate and programmatic elements of the social and human service programs, with a final assessment being a culmination of the prior nine assessments. Social and human service programs include services in the following subject areas: social, mental health, developmental disability, child welfare, juvenile justice, prevention services, habilitative, rehabilitative, substance use disorder treatment, residential care, adult/adolescent day services, vocational, employment and training, and aging. As a whole, this series of reports may be used as one set of resources to provide education and insight into current Rhode Island social and human service programs' provider reimbursement and programmatic structure.

The assessments were completed in two phases with the first phase published in May 2023, and second phase published by September 1, 2023. The first phase included the nine assessments with a limited scope of services. The second phase is cumulative encompassing all information presented in the first phase reports with any applicable updates and additional programs or services reviewed. The second phase will conclude with a 10th report, published by OHIC, which will contain recommended provider reimbursement rate adjustments and other findings from the review.

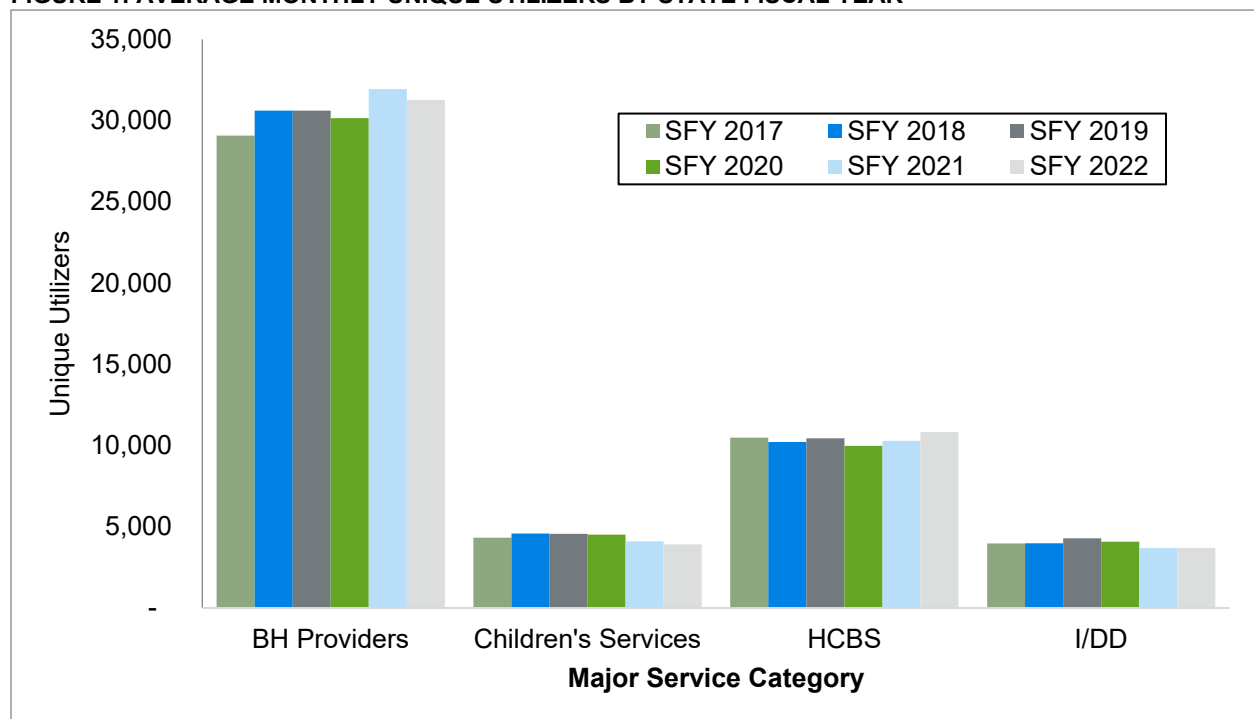
This report addresses RIGL § 42-14.5-3(t) task 3: "An assessment and detailed reporting on utilization trends from the period of January 1, 2017, through December 31, 2021." Utilization information is illustrated for state fiscal year (SFY) 2017 through SFY 2022 social and human services identified in the *Social and Human Service Programs Review: Reimbursement Rates* report (Reimbursement Rates Report), providing additional utilization information for six months prior and six months beyond the statutorily required reporting period. Data was obtained from Rhode Island's Medicaid Management Information System (MMIS) and directly from Rhode Island state agencies for the purposes of this report.

Executive summary

The information contained in this report provides the state and other interested stakeholders a baseline understanding of service utilization for social and human service programs provided by Rhode Island. The service utilization contained in this report represents \$825.9 million in social and human service program expenditures in SFY 2022, with \$698.9 million administered through the MMIS and \$127.0 million reimbursed by state agencies. The SFY 2022 MMIS expenditures, which primarily are comprised of Medicaid covered services, reflect over 45,000 unique program recipients as of June 2022. By contrast, the total Medicaid program medical expenditures were over \$3.0 billion in SFY 2022¹ and there were over 350,000 full benefit Medicaid enrollees as of June 2022.²

Figure 1 illustrates the average monthly unique utilizers of social and human service program services administered via the MMIS. Social and human service program categories illustrated in this report are consistent with the Reimbursement Rates Report and are as follows: intellectual and developmental disability (I/DD) services, home and community-based services (HCBS), behavioral health providers, and children’s services.

FIGURE 1: AVERAGE MONTHLY UNIQUE UTILIZERS BY STATE FISCAL YEAR



Year-over-Year Trends	SFY 2017 – SFY 2018	SFY 2018 – SFY 2019	SFY 2019 – SFY 2020	SFY 2020 – SFY 2021	SFY 2021 – SFY 2022
Behavioral Health Providers	5.3%	0.0%	(1.5%)	6.0%	(2.1%)
Children’s Services	5.9%	(0.5%)	(1.1%)	(9.2%)	(4.6%)
HCBS	(2.5%)	2.2%	(4.4%)	3.0%	5.3%
I/DD Services	0.2%	7.7%	(4.9%)	(9.7%)	0.2%

Notes:

1. Values include both fee-for-service (FFS) and Medicaid managed care organization (MCO) encounter claims as received from EOHHS. MCO encounters include all managed care programs, including Rhody Health Options.
2. Utilizers are not mutually exclusive between major service categories. As an example, a member using I/DD services and HCBS services will be counted in both.

¹ Rhode Island EOHHS (October 26, 2022). *November 2022 CEC Testimony*. Retrieved from: [https://www.rilegislature.gov/Special/rcc/REC202211/Nov 2022 CEC - Attachments FINAL v20221021.pdf](https://www.rilegislature.gov/Special/rcc/REC202211/Nov%202022%20CEC%20-%20Attachments%20FINAL%20v20221021.pdf) page 1

² Rhode Island EOHHS (April 24, 2023). *May 2023 CEC Testimony*. Retrieved from: [https://www.rilegislature.gov/Special/rcc/REC202305/Medical Assistance - May 2023 CEC - Attachments.pdf](https://www.rilegislature.gov/Special/rcc/REC202305/Medical%20Assistance%20-%20May%202023%20CEC%20-%20Attachments.pdf) page 8

Utilization reductions coinciding with the COVID-19 pandemic starting in March 2020 result in the observed overall reduction in average monthly unique utilizers for I/DD and children's services in recent years. While HCBS and behavioral health services also decreased due to the COVID-19 pandemic in SFY 2020, utilization returned to near pre-pandemic levels during SFY 2021, and the unique utilizers of HCBS services have continued to increase through SFY 2022.

During the COVID-19 public health emergency (PHE), states were eligible to receive enhanced federal funding if meeting maintenance of eligibility (MOE) requirements. One aspect of the MOE required states to provide continuous eligibility during the PHE, which resulted in states pausing normal Medicaid redetermination activities. As a byproduct of this pause, Rhode Island Medicaid enrollment increased by over 25% from February 2020 through June 2022. This material enrollment increase may contribute to the unique utilizer trends observed in Figure 1. However, growth in the overall Medicaid population may not proportionally contribute to the increase in utilization for these services, as the enrollment growth is observed to primarily be attributable to healthy adults who are not material utilizers of HCBS, I/DD, and children's services. In addition, provider capacity and workforce shortage dynamics during the PHE may affect the utilization of services. These variables are not explicitly measured in this report.

Figure 2 illustrates the annual social and human service program expenditures for the Department of Human Services (DHS), Department of Health (DOH), Department of Children, Youth & Families (DCYF) and Office of Healthy Aging (OHA). Appendix 4 and Appendix 5 provide additional detail on the service utilization and expenditures for each of the programs administered by these agencies.

FIGURE 2: ANNUAL SOCIAL AND HUMAN SERVICE PROGRAM EXPENDITURES BY AGENCY (\$MILLION)

Agency	SFY 2017	SFY 2018	SFY 2019	SFY 2020	SFY 2021	SFY 2022
DHS	\$ 7.5	\$ 6.1	\$ 70.5	\$ 70.3	\$ 57.8	\$ 57,782,879
Vocational rehabilitation	7.5	6.1	3.5	3.0	2.1	3.2
Child care	Not Available	Not Available	67.0	67.2	55.3	54.6
DOH	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1	\$ 0.1
Tobacco quit line	0.1	0.1	0.1	0.1	0.1	0.1
Lead services	Not Available	Not Available	0.0	0.0	0.0	0.0
DCYF	\$ 33.0	\$ 44.5	\$ 49.2	\$ 58.4	\$ 67.1	\$ 68.7
Home and community-based services	13.5	18.1	21.5	23.0	21.9	16.8
Foster care	0.0	0.0	0.0	0.0	7.6	6.5
Residential care	19.3	25.5	25.2	30.6	25.8	29.2
Residential care: out-of-state	0.2	1.0	2.6	4.8	11.8	16.3
OHA	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.3	\$ 0.4
CareBreaks	0.3	0.3	0.3	0.3	0.3	0.4
TOTAL¹	\$ 40.9	\$ 50.9	\$ 120.1	\$ 129.0	\$ 124.9	\$ 127.0

Notes:

1. Total expenditures in SFY 2017 and SFY 2018 exclude child care and lead services expenditures.
2. Per diems paid to private agency foster care for services and parent stipends in SFY 2017 through SFY 2020 are not included in the figure above. Foster care agency payments in SFY 2021 and SFY 2022 represent the acuity-based payment to the private agency.
3. A limited number of DCYF expenditures are directly billed to Medicaid. Services directly billed to Medicaid are included in Figure 1 and excluded from Figure 2.
4. Lead service expenditures were less than \$20,000 per year.
5. Additional detailed expenditure information is provided in Appendix 5.
6. Values are rounded.

Because of the additional level of detail contained in the MMIS data relative to the summary-level utilization and expenditure data received from state agencies, the body of this report focuses on services administered via the MMIS. The following sections contain detailed service-level utilization metrics, utilization information stratified between the fee-for-service (FFS) claims and Medicaid managed care organization (MCO) encounters, and expenditure information where available.

Certain expenditure information is redacted to prevent the disclosure of proprietary Medicaid MCO provider reimbursement information. Descriptions of the data summarization and redaction procedures are available in the Methodology section of this report. Additional utilization and expenditure granularity is provided in the appendices and data book included with this report.

- Appendix 1 provides average unique monthly utilizer information for MMIS services stratified by state fiscal year, detailed service category, and delivery system (FFS/MCO).
- Appendix 2 provides annual expenditure information stratified for MMIS services by state fiscal year, detailed service category, and delivery system (FFS/MCO).
- Appendix 3 provides a crosswalk of provider type to major service category.
- Appendix 4 provides annual utilization information for Non-MMIS services.
- Appendix 5 provides annual expenditure information for Non-MMIS services.
- The data book provides the same information provided in Appendix 1 and Appendix 2 at the provider type, procedure code, and modifier level of detail by state fiscal year and by month.

Utilization summaries

Rhode Island MMIS utilization metrics are illustrated at various levels of granularity in this report, including the social and human service program category, service category, and procedure code. Appendix 3 of this report illustrates the provider type to service category crosswalk, which is consistent with the Reimbursement Rates Report.

The following utilization metrics are contained in this report:

- **Average unique monthly utilizers.** The average unique monthly utilizers metric represents the average number of people accessing services in a month. Because multiple services may be accessed by a single person, the unique utilizers from various services cannot be aggregated to calculate a composite number. Throughout the report, the unique utilizers metric is specific to the set of services represented in the figure, and therefore the values representing a larger number of services will always be less than or equal to the sum of the unique utilizers for the individual services.
- **Annual expenditures.** The annual expenditures metric represents the total dollar value of MMIS paid claims for a particular service. While annual expenditures is not a direct utilization metric, it is a helpful metric to understand the resources allocated to the various social and human service programs. Expenditures may be aggregated across service categories, facilitating a consistent comparison of varying levels of service summarization.

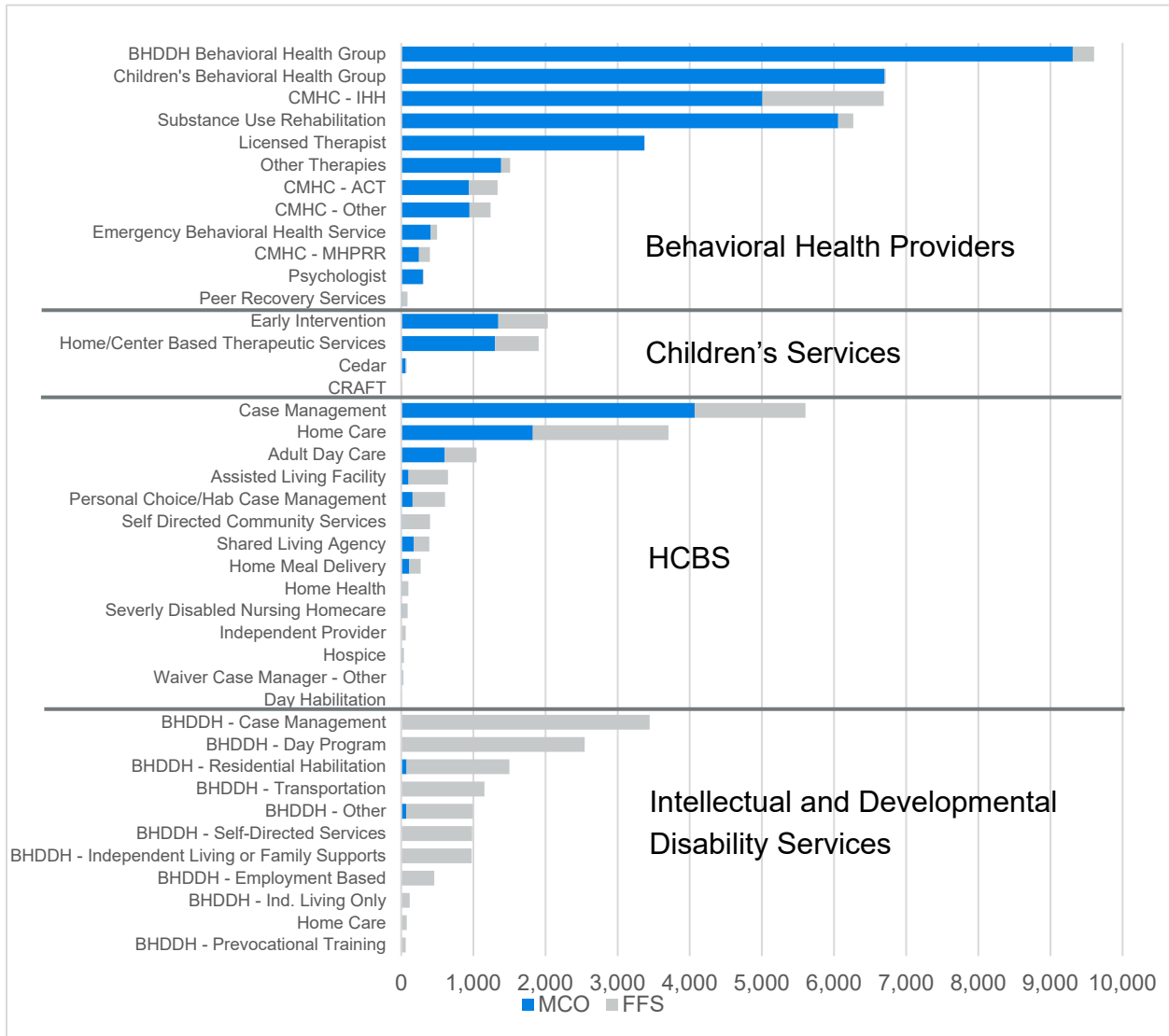
Unit count metrics are not included in this report due to observed inconsistencies in unit definitions. For example, some behavioral health services are reported on a 15-minute unit basis while other similar services are reported with units representing a count of visits. We will work with state agencies as needed to provide this information for use in developing fiscal impact estimates required by RIGL § 42-14.5-3(u).

SFY 2022 UTILIZATION BY SERVICE CATEGORY

Figure 3 illustrates the average unique monthly utilizers in SFY 2022 for each service category stratified by the FFS and MCO populations. Behavioral health services are primarily covered by the MCOs, with approximately 75% of integrated health home (IHH) utilization provided by community mental health centers (CMHCs) being covered by MCOs, and approximately 92% of the utilization for the remaining services covered by the MCOs. Conversely, most I/DD services are covered under the FFS program, with only 2.2% of services covered by MCOs.

Children's services and HCBS are more evenly covered by the FFS and MCO populations. Over 70% of the FFS utilizers of in-scope children's services are children only eligible for early intervention benefits through an early intervention limited benefit eligibility pathway or children enrolled in the FFS Katie Beckett program. Similarly, approximately 75% of the FFS utilizers of HCBS are attributable to members dually eligible for Medicaid and Medicare coverage and not enrolled with an MCO. Effective October 1, 2018, Rhode Island ended the Rhody Health Options Unity program for adults receiving long-term services and supports (LTSS) through Medicaid, which consisted primarily of members dual-eligible for Medicaid and Medicare coverage. Many members enrolled in this program transitioned to FFS coverage with the end of the Rhody Health Options Unity program.

FIGURE 3: SFY 2022 AVERAGE UNIQUE MONTHLY UTILIZERS BY SERVICE CATEGORY



Notes:

1. Figure represents unique utilizers for each service category. To the extent a member utilized a service paid for by both the FFS program and an MCO in the same month, the member is counted once and included in the FFS allocation.
2. Self-directed services provided by the MCOs are not submitted as encounters and therefore MCO utilizers are not represented in Figure 3.
3. See the Methodology section for additional data caveats and limitations.

SFY 2017 THROUGH SFY 2022 UTILIZATION

Figure 4 and Figure 5 provide the average monthly unique utilizers and annual expenditures separately for the FFS and MCO delivery systems for each service category. This longitudinal view illustrates year-over-year trends for both service users and expenditures.

The SFY 2021 and SFY 2022 FFS expenditures include the following temporary enhanced rate funding for American Rescue Plan Act (ARPA) workforce development initiatives:³

- **Home and community-based services.** SFY 2022 FFS expenditures include an estimated \$30.8 million of enhanced reimbursement for home care agencies, home health, adult day care, habilitation group homes, and case management services.
- **Children’s services.** SFY 2021 FFS expenditures for children’s services include an estimated \$5.7 million of enhanced reimbursement for home-based therapeutic services (HBTS) and personal assistance service and supports (PASS).
- **Behavioral health providers.** SFY 2022 FFS expenditures include an estimated \$10.6 million of enhanced reimbursement for CMHCs and peer recovery programs.

In addition to the temporary FFS enhanced provider reimbursement rates, certain providers received funding through the managed care system or direct grants. This funding was distributed outside of FFS and MCO claims payment systems and is not included in the values presented in this report.

To the extent expenditure trends exceed utilizer trends, this indicates an increase in the cost per recipient for the services. ARPA workforce development initiatives represent a key contributor to the situations where this occurs in the figures below, along with I/DD rate increases effective July 2021.⁴

FIGURE 4: AVERAGE MONTHLY UTILIZATION METRICS BY FISCAL YEAR

Service Category	SFY 2017 Utilizers	SFY 2018 Utilizers	SFY 2019 Utilizers	SFY 2020 Utilizers	SFY 2021 Utilizers	SFY 2022 Utilizers	SFY 2017-2018% Change	SFY 2018-2019% Change	SFY 2019-2020% Change	SFY 2020-2021% Change	SFY 2021-2022% Change
Behavioral Health Providers											
FFS	1,733	1,849	2,470	2,853	2,990	2,801	6.7%	33.6%	15.5%	4.8%	(6.3%)
MCO	27,383	28,831	28,235	27,417	29,147	28,595	5.3%	(2.1%)	(2.9%)	6.3%	(1.9%)
Composite	29,074	30,613	30,615	30,150	31,946	31,276	5.3%	0.0%	(1.5%)	6.0%	(2.1%)
Children’s Services											
FFS	1,660	1,614	1,502	1,423	1,334	1,313	(2.8%)	(6.9%)	(5.3%)	(6.3%)	(1.5%)
MCO	2,727	3,029	3,100	3,117	2,788	2,620	11.1%	2.3%	0.5%	(10.6%)	(6.0%)
Composite	4,331	4,586	4,563	4,514	4,101	3,910	5.9%	(0.5%)	(1.1%)	(9.2%)	(4.6%)
HCBS											
FFS	3,206	3,094	3,481	3,846	3,970	4,313	(3.5%)	12.5%	10.5%	3.2%	8.7%
MCO	7,333	7,175	7,028	6,199	6,362	6,579	(2.1%)	(2.1%)	(11.8%)	2.6%	3.4%
Composite	10,485	10,220	10,449	9,985	10,285	10,826	(2.5%)	2.2%	(4.4%)	3.0%	5.3%
Intellectual and Developmental Disability Services											
FFS	3,831	3,810	4,152	3,965	3,564	3,555	(0.5%)	9.0%	(4.5%)	(10.1%)	(0.3%)
MCO	150	183	145	122	127	144	21.5%	(20.7%)	(15.7%)	4.2%	13.4%
Composite	3,975	3,984	4,291	4,082	3,688	3,696	0.2%	7.7%	(4.9%)	(9.7%)	0.2%

Notes:

1. Members receiving FFS and MCO services are not mutually exclusive. Total unique utilizers are less than the sum of FFS and MCO unique utilizers.
2. See the Methodology section for additional data caveats and limitations.

³ Rhode Island Executive Office of Health and Human Services. (2023, January 17). *RI State Spending Narrative for ARPA HCBS FMAP: Quarterly Update – Submitted July 18, 2022*. Retrieved May 24, 2023, from <https://eohhs.ri.gov/initiatives/hcbs-enhancement>

⁴ Rhode Island BHDDH (July 1, 2021). *Comparison of BHDDH Rates Effective October 1, 2019 and July 1, 2021*. Retrieved from: <https://bhddh.ri.gov/sites/g/files/xkgbur411/files/2021-07/BHDDH%20JULY%201%202021%20RATE%20INCREASE%20.pdf>

FIGURE 5: ANNUAL EXPENDITURE METRICS BY FISCAL YEAR

Service Category	SFY 2017 (\$Millions)	SFY 2018 (\$Millions)	SFY 2019 (\$Millions)	SFY 2020 (\$Millions)	SFY 2021 (\$Millions)	SFY 2022 (\$Millions)	SFY 2017-2018% Change	SFY 2018-2019% Change	SFY 2019-2020% Change	SFY 2020-2021% Change	SFY 2021-2022% Change
Behavioral Health Providers											
FFS	\$ 22.3	\$ 24.0	\$ 29.6	\$ 33.7	\$ 34.8	\$ 45.5	7.4%	23.4%	13.7%	3.4%	30.8%
MCO	130.2	143.7	138.1	130.8	140.0	145.4	10.3%	(3.9%)	(5.3%)	7.1%	3.8%
Total	\$ 152.5	\$ 167.6	\$ 167.7	\$ 164.4	\$ 174.8	\$ 190.9	9.9%	0.0%	(1.9%)	6.3%	9.2%
Children's Services											
FFS	\$ 21.3	\$ 20.5	\$ 19.0	\$ 16.0	\$ 19.4	\$ 15.9	(3.8%)	(7.0%)	(16.0%)	21.4%	(18.2%)
MCO	21.9	25.6	29.7	27.9	27.1	28.3	16.9%	15.9%	(5.8%)	(3.2%)	4.6%
Total	\$ 43.2	\$ 46.1	\$ 48.7	\$ 43.9	\$ 46.5	\$ 44.2	6.7%	5.7%	(9.8%)	5.8%	(4.9%)
HCBS											
FFS	\$ 50.0	\$ 47.5	\$ 60.8	\$ 75.7	\$ 83.3	\$ 124.8	(4.9%)	27.9%	24.5%	10.0%	49.9%
MCO	48.8	42.7	46.9	51.1	53.7	56.6	(12.6%)	10.0%	8.8%	5.1%	5.4%
Total	\$ 98.8	\$ 90.2	\$ 107.7	\$ 126.8	\$ 137.0	\$ 181.4	(8.7%)	19.5%	17.7%	8.1%	32.5%
Intellectual and Developmental Disability Services											
FFS	\$ 211.6	\$ 225.0	\$ 238.6	\$ 240.1	\$ 233.0	\$ 281.6	6.4%	6.0%	0.6%	(2.9%)	20.8%
MCO	0.8	1.1	0.9	0.7	0.8	0.8	28.4%	(19.5%)	(14.3%)	3.2%	10.6%
Total	\$ 212.4	\$ 226.1	\$ 239.5	\$ 240.8	\$ 233.8	\$ 282.4	6.5%	5.9%	0.6%	(2.9%)	20.8%

Notes:

1. See the Methodology section for additional data caveats and limitations.

Unique utilizers of children's services decreased in both the FFS and Medicaid managed care programs from SFY 2020 to SFY 2022, whereas unique utilizers of HCBS increased in both programs during this same period. This observation is indicative of the systemic influence COVID-19 had on service utilization over the past several years. FFS and MCO HCBS utilization and expenditures are also influenced by the termination of the Rhody Health Options Unity program on October 1, 2018, as members from this program transitioned to FFS or the Rhode Health Options Integrity/Medicare-Medicaid Plan (MMP) managed care program.

As illustrated in Appendix 1, increases in FFS utilization for behavioral health providers are primarily attributable to CMHC services such as integrated health homes (IHH), assertive community treatment (ACT) programs, and other CMHC services, while trends in the managed care program are influenced by various mental health and substance use services. Decreases in utilization of I/DD services are consistently observed across the service categories between SFY 2019 and SFY 2022, with an observed increase in self-directed services.

As previously mentioned, FFS expenditures in SFY 2021 and SFY 2022 were impacted by ARPA workforce development initiatives and I/DD rate changes, which influence year-over-year comparisons. Annualized SFY 2017 to SFY 2022 MCO expenditures changes varied from approximately 2% to 6%, with the exception of MCO I/DD services which have limited volume, indicating moderate utilization and cost per utilizer changes from SFY 2017 to SFY 2022.

Appendix 1 and Appendix 2 provide similar information as that presented in Figure 4 and Figure 5, respectively, at a detailed service category level. The data book provides this information at the provider type, procedure code, and modifier level of detail by state fiscal year and by month.

Methodology

This report provides an analysis of utilization and expenditure information from SFY 2017 through SFY 2022. This section outlines the data, service category logic, and data redaction methodologies underlying this report.

DATA

We used FFS claims and MCO encounters contained in the MMIS data provided by EOHHS on July 15, 2023, as the primary data sources for the analysis of SFY 2020 through SFY 2022. ARPA workforce development funding distributed through FFS claims payments are included in the paid amounts illustrated in this report. We used a Medicaid dataset provided by EOHHS on May 2, 2023, for SFY 2017 through SFY 2019 data.

The MCO encounter data consists of encounters from the Medicaid managed care program covering RItE Care children and adults, Children with Special Healthcare Needs, and Rhody Health Partners populations, as well as Rhody Health Options Unity encounters and MMP encounters. Known limitations with the MCO encounter data include missing data and the assignment of provider type. Recent data quality reporting indicates the encounter data is generally between 96% and 100% complete, but this completion percentage can vary by time period, MCO, and type of service. The remainder of MCO encounters are considered missing data and represent services provided by the MCOs that are not accepted into the state's encounter data warehouse. We did not include an adjustment for missing encounter data in this report. The MCO encounter provider type assignment is discussed in more detail in the Service Category Logic section below.

The non-MMIS data summarized in Appendix 4 and Appendix 5 was gathered using data requests to Rhode Island state agencies. The state agencies used their data management systems to provide summary-level utilization and expenditure information. Depending on the data provided by the state agency, utilization information may represent services or other metrics other than unique utilizers. Key assumptions and data limitations are outlined in Appendix 4 and Appendix 5.

SERVICE CATEGORY LOGIC

The services reviewed in this report are consistent with the scope of services outlined in the Reimbursement Rates Report. Certain procedure codes are in the data book included with this report that were not in the Reimbursement Rates report due to there being no reimbursement rate listed on the Rhode Island Medicaid fee schedule. These codes were added to fully reflect the FFS and MCO utilization of services, and include codes solely used by the MCOs and FFS codes with manually priced reimbursement.

The methodology to assign claims and encounter data to a service category is consistent with the methodology used in the Reimbursement Rates report. Appendix 3 illustrates the provider type to service category crosswalk underlying this analysis. We observed situations where the provider type on the MCO encounter data is not consistently populated. Given this data limitation, we used the following hierarchical steps to assign provider type:

1. Limit MCO encounters to procedure codes that exist in Appendix 1 of the Reimbursement Rates Report
2. If a procedure code/modifier combination appears only under a single provider type in the FFS program, any encounter data with that procedure code/modifier is assigned that same provider type
3. Assign the provider type that corresponds to the FFS provider type with a matching National Provider Identifier (NPI) and procedure code with the most FFS expenditures in SFY 2022
4. Assign the provider type that corresponds to the FFS provider type with a matching Federal Employer Identification Number (FEIN) and procedure code with the most FFS expenditures in SFY 2022
5. Assign the provider type that corresponds to the FFS provider type with a matching NPI with the most FFS expenditures in SFY 2022
6. Assign the provider type that corresponds to the FFS provider type with a matching FEIN with the most FFS expenditures in SFY 2022
7. Assign the provider type currently on the encounter claim

In addition, to the extent that a provider type/procedure code/modifier combination does not exist in the FFS program after this assignment process, we assign the expenditures and utilization to the most similar provider type/procedure code/modifier combination. For example, MCO encounter data may contain additional modifiers that are unused in the FFS program. These encounters are included with the procedure-code-level data without modifiers in these instances.

This methodology was performed to improve the accuracy and robustness of the MCO encounter data provider type to better reflect the scope of services provided in the Medicaid managed care program. This process is inherently unable to address all potential issues with the MCO encounter data. We relied upon the FFS and encounter data received and accepted it without audit. To the extent that there remain other data inconsistencies, errors, or omissions, the values provided in this report may likewise be inaccurate or incomplete. We expect further refinement to the process may occur as results of this and other social and human service programs reports are reviewed with stakeholders.

DATA REDACTION

The MCO expenditure data provided with the Excel data book is redacted unless the data is supported by at least 10 unique utilizers. This data redaction is to prevent cost per unit information from being inferred from the provided data. Annual figures where monthly values are also available for all but one month are also redacted so that the data for the redacted month cannot be calculated.

Conclusion

The delivery of social and human service programs in Rhode Island varies by service and population, with behavioral services primarily covered by Medicaid MCOs, I/DD services being covered in the FFS program, and children's services and HCBS being covered by a combination of the two. While behavioral health services are the highest utilized social and human service reviewed in this report, with approximately 30,000 average monthly Medicaid recipients, the highest expenditure volume is associated with I/DD services. This report helps identify the number of Medicaid members and volume of Medicaid expenditures that may be influenced by any changes proposed to social and human service programs. In addition, this report and the underlying data may be utilized to support Rhode Island state agencies in developing the fiscal impact estimates required by RIGL § 42-14.5-3(u) based on OHIC rate recommendations.

Limitations and data reliance

The information contained in this correspondence, including any enclosures, has been prepared for the State of Rhode Island, Office of the Health Insurance Commissioner (OHIC) and their advisors. Milliman's work is prepared solely for the use and benefit of the OHIC in accordance with its statutory and regulatory requirements. Milliman recognizes this report will be public record subject to disclosure to third parties, however, Milliman does not intend to benefit and assumes no duty or liability to any third parties who receive Milliman's work. To the extent that the information contained in this correspondence is provided to any third parties, the correspondence should be distributed in its entirety.

Milliman has developed certain models to estimate the values included in this correspondence. The intent of the models was to summarize Medicaid fee-for-service and managed care expenditures and utilization for SFY 2017 through SFY 2022 to understand the trends and patterns for services subject to the social and human service programs review. We have reviewed the models, including their inputs, calculations, and outputs for consistency, reasonableness, and appropriateness to the intended purpose and in compliance with generally accepted actuarial practice and relevant actuarial standards of practice (ASOP). The models rely on data and information as input to the models. We have relied upon certain data and information provided by OHIC for this purpose and accepted it without audit. To the extent that the data and information provided is not accurate, or is not complete, the values provided in this correspondence may likewise be inaccurate or incomplete. Milliman's data and information reliance includes the sources discussed in this correspondence. The models, including all input, calculations, and output, may not be appropriate for any other purpose.

Guidelines issued by the American Academy of Actuaries require actuaries to include their professional qualifications in all actuarial communications. Jason Clarkson, Ian McCulla, and Zach Hunt are members of the American Academy of Actuaries and meet the qualification standards for performing the analyses in this report.

APPENDIX 1: Monthly Average Unique Utilizers by Detailed Service Category and State Fiscal Year

State of Rhode Island Office of the Health Insurance Commissioner Appendix 1 Monthly Average Unique Utilizers												
	SFY 2017				SFY 2018				SFY 2019			
	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS
Behavioral Health Providers												
BHDDH Behavioral Health Group	10,238	297	10,533	2.8%	9,383	304	9,684	3.1%	9,164	382	9,542	4.0%
Children's Behavioral Health Group	6,272	25	6,296	0.4%	6,120	25	6,144	0.4%	6,189	31	6,220	0.5%
CMHC - ACT	667	173	840	20.6%	733	177	910	19.4%	725	263	988	26.6%
CMHC - IHH	4,319	953	5,271	18.1%	4,951	976	5,925	16.5%	4,686	1,302	5,985	21.7%
CMHC - MHPRR	218	93	311	29.8%	259	100	359	27.8%	233	130	362	35.8%
CMHC - Other	1,387	238	1,623	14.7%	1,334	233	1,565	14.9%	1,110	272	1,380	19.7%
Emergency Behavioral Health Service	203	-	203	0.0%	255	-	255	0.0%	394	16	401	4.1%
Licensed Therapist	2,455	6	2,462	0.3%	3,478	7	3,485	0.2%	3,564	5	3,569	0.1%
Other Therapies	2,131	136	2,257	6.0%	2,146	136	2,274	6.0%	1,795	180	1,970	9.2%
Peer Recovery Services	324	-	324	0.0%	346	-	346	0.0%	298	-	298	0.0%
Psychologist	61	1	61	1.4%	78	1	79	1.5%	352	2	354	0.7%
Substance Use Rehabilitation	5,369	222	5,581	4.0%	6,812	303	7,093	4.3%	6,778	432	7,184	6.0%
Behavioral Health Providers - Composite	27,383	1,733	29,074	6.0%	28,831	1,849	30,613	6.0%	28,235	2,470	30,615	8.1%
Children's Services												
Cedar	-	87	87	100.0%	-	80	80	100.0%	20	27	47	57.0%
CRAFT	7	17	24	69.6%	-	17	17	99.5%	-	16	16	97.5%
Early Intervention	1,823	666	2,471	26.9%	1,919	703	2,601	27.0%	1,791	659	2,436	27.1%
Home/Center-Based Therapeutic Services	1,282	897	2,155	41.6%	1,331	820	2,135	38.4%	1,445	806	2,232	36.1%
Children's Services - Composite	2,727	1,660	4,331	38.3%	3,029	1,614	4,586	35.2%	3,100	1,502	4,563	32.9%
HCBS												
Adult Day Care	696	492	1,186	41.5%	779	470	1,248	37.7%	787	522	1,308	39.9%
Assisted Living Facility	228	242	470	51.5%	202	243	443	54.8%	239	333	572	58.3%
Case Management	4,840	1,074	5,895	18.2%	4,881	1,156	6,011	19.2%	4,526	1,378	5,877	23.5%
Day Habilitation	1	9	10	90.2%	5	4	9	42.7%	4	5	9	52.8%
Home Care	1,740	1,643	3,382	48.6%	1,378	1,476	2,853	51.7%	1,614	1,433	3,046	47.0%
Home Health	19	102	121	84.5%	19	78	97	80.4%	22	67	89	75.0%
Home Meal Delivery	152	124	276	44.9%	136	94	229	40.9%	95	111	206	54.0%
Hospice	14	20	34	58.6%	11	16	26	59.6%	15	26	41	63.2%
Independent Provider	-	-	-	-	-	-	-	-	-	-	-	-
Personal Choice/Hab Case Management	144	178	322	55.2%	134	163	297	55.0%	93	251	343	73.0%
Self-Directed Community Services	14	195	210	93.1%	15	177	193	92.2%	19	261	280	93.3%
Shared Living Agency	97	39	136	28.8%	125	36	161	22.5%	154	87	241	36.2%
Severely Disabled Nursing Homecare	21	97	118	82.4%	23	86	110	78.8%	22	76	98	77.5%
Waiver Case Manager - Other	14	16	30	52.2%	21	20	41	48.3%	24	29	53	54.9%
HCBS - Composite	7,333	3,206	10,485	30.6%	7,175	3,094	10,220	30.3%	7,028	3,481	10,449	33.3%
Intellectual and Developmental Disability Services												
BHDDH - Case Management	-	3,387	3,387	100.0%	-	3,397	3,397	100.0%	-	3,486	3,486	100.0%
BHDDH - Day Program	-	3,038	3,038	100.0%	-	3,035	3,035	100.0%	-	3,054	3,054	100.0%
BHDDH - Employment-Based	-	585	585	100.0%	-	741	741	100.0%	-	800	800	100.0%
BHDDH - Ind. Living Only	-	120	120	100.0%	-	125	125	100.0%	-	131	131	100.0%
BHDDH - Independent Living or Family Supports	-	1,196	1,196	100.0%	-	1,195	1,195	100.0%	-	1,258	1,258	100.0%
BHDDH - Other	84	771	855	90.2%	90	798	888	89.9%	70	831	901	92.2%
BHDDH - Prevocational Training	-	184	184	100.0%	-	238	238	100.0%	-	340	340	100.0%
BHDDH - Residential Habilitation	67	1,451	1,518	95.6%	93	1,440	1,533	94.0%	75	1,436	1,511	95.0%
BHDDH - Self-Directed Services	-	825	825	100.0%	-	735	735	100.0%	-	760	760	100.0%
BHDDH - Transportation	-	1,862	1,862	100.0%	-	1,656	1,656	100.0%	-	1,673	1,673	100.0%
Home Care	-	385	385	100.0%	-	344	344	100.0%	-	599	599	100.0%
I/DDDS - Composite	150	3,831	3,975	96.4%	183	3,810	3,984	95.6%	145	4,152	4,291	96.8%

Notes:

1. Utilizers between detailed service categories are not mutually exclusive.
2. See the Methodology section of attached report for additional data caveats and limitations.
3. Values have been rounded to the nearest integer.

State of Rhode Island Office of the Health Insurance Commissioner Appendix 1 Monthly Average Unique Utilizers												
	SFY 2020				SFY 2021				SFY 2022			
	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS
Behavioral Health Providers												
BHDDH Behavioral Health Group	9,249	454	9,700	4.7%	10,408	351	10,757	3.3%	9,310	297	9,605	3.1%
Children's Behavioral Health Group	6,141	23	6,163	0.4%	6,348	15	6,363	0.2%	6,702	15	6,716	0.2%
CMHC - ACT	768	339	1,106	30.7%	879	401	1,280	31.3%	940	397	1,337	29.7%
CMHC - IHH	4,675	1,546	6,219	24.9%	5,003	1,706	6,707	25.4%	5,010	1,680	6,688	25.1%
CMHC - MHPRR	221	153	373	40.9%	228	164	391	41.9%	246	151	397	38.1%
CMHC - Other	1,047	301	1,348	22.4%	992	317	1,307	24.3%	949	291	1,238	23.5%
Emergency Behavioral Health Service	438	59	478	12.4%	399	86	472	18.3%	424	88	498	17.7%
Licensed Therapist	3,607	4	3,611	0.1%	2,826	4	2,830	0.1%	3,371	3	3,375	0.1%
Other Therapies	1,418	153	1,566	9.8%	1,306	100	1,403	7.1%	1,390	123	1,509	8.1%
Peer Recovery Services	184	26	208	12.6%	104	181	279	64.8%	16	71	87	81.8%
Psychologist	319	2	321	0.7%	279	5	284	1.6%	300	11	311	3.5%
Substance Use Rehabilitation	6,137	450	6,566	6.9%	7,316	272	7,580	3.6%	6,061	210	6,267	3.3%
Behavioral Health Providers - Composite	27,417	2,853	30,150	9.5%	29,147	2,990	31,946	9.4%	28,595	2,801	31,276	9.0%
Children's Services												
Cedar	50	13	63	21.3%	61	22	83	26.9%	63	12	76	16.4%
CRAFT	-	16	16	97.4%	-	17	17	97.5%	-	16	16	99.0%
Early Intervention	1,623	693	2,302	30.1%	1,365	671	2,024	33.1%	1,359	686	2,032	33.8%
Home/Center-Based Therapeutic Services	1,583	705	2,279	31.0%	1,464	631	2,088	30.2%	1,310	604	1,906	31.7%
Children's Services - Composite	3,117	1,423	4,514	31.5%	2,788	1,334	4,101	32.5%	2,620	1,313	3,910	33.6%
HCBS												
Adult Day Care	663	502	1,164	43.1%	319	260	579	44.9%	605	440	1,045	42.2%
Assisted Living Facility	235	407	642	63.3%	184	455	640	71.2%	102	546	648	84.2%
Case Management	3,626	1,500	5,112	29.4%	3,951	1,509	5,447	27.7%	4,087	1,536	5,605	27.4%
Day Habilitation	4	5	9	55.9%	4	4	8	50.5%	5	5	10	48.2%
Home Care	1,815	1,725	3,537	48.8%	1,902	1,947	3,844	50.6%	1,829	1,880	3,705	50.7%
Home Health	28	72	100	72.4%	28	82	110	74.7%	12	89	100	88.2%
Home Meal Delivery	80	119	199	59.8%	88	145	233	62.3%	111	157	269	58.6%
Hospice	15	26	40	63.8%	11	22	34	66.4%	12	26	37	68.6%
Independent Provider	-	-	-	-	-	13	13	100.0%	-	63	63	100.0%
Personal Choice/Hab Case Management	92	314	406	77.3%	113	342	455	75.1%	158	448	607	73.9%
Self-Directed Community Services	27	318	345	92.2%	14	330	344	95.9%	12	388	400	97.0%
Shared Living Agency	178	138	317	43.7%	162	172	334	51.6%	172	217	390	55.8%
Severely Disabled Nursing Homecare	23	72	95	76.1%	18	68	86	79.0%	16	73	88	82.5%
Waiver Case Manager - Other	15	28	43	64.7%	12	26	37	69.1%	11	20	31	65.3%
HCBS - Composite	6,199	3,846	9,985	38.5%	6,362	3,970	10,285	38.6%	6,579	4,313	10,826	39.8%
Intellectual and Developmental Disability Services												
BHDDH - Case Management	-	3,507	3,507	100.0%	-	3,404	3,404	100.0%	-	3,444	3,444	100.0%
BHDDH - Day Program	-	2,841	2,841	100.0%	-	2,382	2,382	100.0%	-	2,543	2,543	100.0%
BHDDH - Employment-Based	-	624	624	100.0%	-	454	454	100.0%	-	457	457	100.0%
BHDDH - Ind. Living Only	-	123	123	100.0%	-	119	119	100.0%	-	118	118	100.0%
BHDDH - Independent Living or Family Supports	-	1,168	1,168	100.0%	-	1,001	1,001	100.0%	-	978	978	100.0%
BHDDH - Other	58	837	896	93.5%	60	785	845	92.9%	70	922	991	100.0%
BHDDH - Prevocational Training	-	191	191	100.0%	-	76	76	100.0%	-	63	63	100.0%
BHDDH - Residential Habilitation	64	1,434	1,498	95.7%	68	1,428	1,495	95.5%	75	1,425	1,499	95.0%
BHDDH - Self-Directed Services	-	796	796	100.0%	-	860	860	100.0%	-	984	984	100.0%
BHDDH - Transportation	-	1,378	1,378	100.0%	-	935	935	100.0%	-	1,154	1,154	100.0%
Home Care	-	396	396	100.0%	-	114	114	100.0%	-	76	76	100.0%
I/DDDS - Composite	122	3,965	4,082	97.1%	127	3,564	3,688	96.7%	144	3,555	3,696	96.2%

Notes:

1. Utilizers between detailed service categories are not mutually exclusive.
2. See the Methodology section of attached report for additional data caveats and limitations.
3. Values have been rounded to the nearest integer.

APPENDIX 2: Monthly Average Expenditures by Detailed Service Category and State Fiscal Year

State of Rhode Island
Office of the Health Insurance Commissioner
Appendix 2
Annual Expenditures

	SFY 2017				SFY 2018				SFY 2019			
	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS
Behavioral Health Providers												
BHDDH Behavioral Health Group	\$ 16,719,687	\$ 396,839	\$ 17,116,525	2.3%	\$ 15,796,912	\$ 383,557	\$ 16,180,470	2.4%	\$ 15,385,060	\$ 509,175	\$ 15,894,235	3.2%
Children's Behavioral Health Group	17,900,837	37,255	17,938,092	0.2%	19,236,138	41,485	19,277,623	0.2%	21,111,033	56,788	21,167,821	0.3%
CMHC - ACT	9,700,687	2,534,007	12,234,694	20.7%	10,714,796	2,601,751	13,316,547	19.5%	10,674,245	3,850,043	14,524,287	26.5%
CMHC - IHH	22,567,695	4,734,619	27,302,314	17.3%	25,572,371	4,866,384	30,438,755	16.0%	23,511,748	6,470,206	29,981,953	21.6%
CMHC - MHPRR	9,532,203	3,994,989	13,527,192	29.5%	11,256,391	4,255,735	15,512,126	27.4%	9,877,314	5,546,345	15,423,659	36.0%
CMHC - Other	13,648,382	8,327,372	21,975,754	37.9%	14,401,045	8,720,876	23,121,921	37.7%	11,831,689	9,569,445	21,401,134	44.7%
Emergency Behavioral Health Service	2,004,250	-	2,004,250	0.0%	2,895,911	-	2,895,911	0.0%	2,464,200	96,330	2,560,530	3.8%
Licensed Therapist	4,690,926	39,151	4,730,077	0.8%	6,592,769	45,047	6,637,816	0.7%	6,928,780	25,382	6,954,162	0.4%
Other Therapies	4,117,479	296,094	4,413,572	6.7%	4,498,838	316,695	4,815,534	6.6%	4,030,998	494,172	4,525,171	10.9%
Peer Recovery Services	338,899	-	338,899	0.0%	581,919	-	581,919	0.0%	492,598	-	492,598	0.0%
Psychologist	124,359	999	125,359	0.8%	246,554	1,300	247,854	0.5%	2,343,717	5,596	2,349,312	0.2%
Substance Use Rehabilitation	28,867,043	1,963,307	30,830,350	6.4%	31,869,586	2,753,006	34,622,591	8.0%	29,444,281	2,976,258	32,420,539	9.2%
Behavioral Health Providers - Composite	\$ 130,212,448	\$ 22,324,632	\$ 152,537,079	14.6%	\$ 143,663,230	\$ 23,985,836	\$ 167,649,066	14.3%	\$ 138,095,662	\$ 29,599,739	\$ 167,695,401	17.7%
Children's Services												
Cedar	\$ 0	\$ 964,871	\$ 964,871	100.0%	\$ 0	\$ 643,350	\$ 643,350	100.0%	\$ 123,287	\$ 164,575	\$ 287,862	57.2%
CRAFT	233,108	3,034,199	3,267,307	92.9%	11,660	3,062,009	3,073,669	99.6%	30,343	3,039,165	3,069,508	99.0%
Early Intervention	10,713,728	3,368,201	14,081,929	23.9%	9,814,039	3,507,210	13,321,249	26.3%	9,470,860	3,154,120	12,624,981	25.0%
Home/Center-Based Therapeutic Services	10,946,452	13,739,313	24,685,765	55.7%	15,774,146	13,162,967	28,937,113	45.5%	20,040,433	12,681,167	32,721,600	38.8%
Children's Services - Composite	\$ 21,893,288	\$ 21,106,584	\$ 42,999,872	49.1%	\$ 25,599,845	\$ 20,375,536	\$ 45,975,381	44.3%	\$ 29,664,922	\$ 19,039,028	\$ 48,703,950	39.1%
HCBS												
Adult Day Care	\$ 7,496,649	\$ 4,568,140	\$ 12,064,789	37.9%	\$ 8,568,302	\$ 4,349,275	\$ 12,917,577	33.7%	\$ 8,654,915	\$ 5,245,125	\$ 13,900,040	37.7%
Assisted Living Facility	4,218,688	2,877,281	7,095,969	40.5%	3,980,637	2,955,166	6,935,803	42.6%	5,082,927	6,564,124	11,647,051	56.4%
Case Management	2,006,341	1,472,475	3,478,816	42.3%	2,215,343	1,682,433	3,897,776	43.2%	2,116,191	2,046,885	4,163,076	49.2%
Day Habilitation	40,511	728,202	768,713	94.7%	408,464	363,174	771,638	47.1%	304,945	377,366	682,311	55.3%
Home Care	30,288,265	26,126,752	56,415,016	46.3%	22,259,043	24,986,243	47,245,286	52.9%	25,902,610	27,814,592	53,717,201	51.8%
Home Health	28,038	518,199	546,237	94.9%	44,995	395,773	440,768	89.8%	47,935	550,831	598,766	92.0%
Home Meal Delivery	184,027	140,554	324,581	43.3%	145,746	97,235	242,981	40.0%	116,102	178,214	294,316	60.6%
Hospice	551,497	977,132	1,528,630	63.9%	450,158	736,853	1,187,012	62.1%	636,317	1,506,718	2,143,035	70.3%
Independent Provider	-	-	-	-	-	-	-	-	-	-	-	-
Personal Choice/Hab Case Management	217,001	259,666	476,667	54.5%	202,255	254,415	456,670	55.7%	140,625	398,815	539,440	73.9%
Self-Directed Community Services	158,868	6,267,996	6,426,864	97.5%	179,953	6,031,961	6,211,914	97.1%	195,444	8,279,864	8,475,308	97.7%
Shared Living Agency	1,395,040	1,063,807	2,458,846	43.3%	1,810,887	971,279	2,782,166	34.9%	1,646,681	2,276,898	3,923,579	58.0%
Severely Disabled Nursing Homecare	2,166,649	4,493,732	6,660,382	67.5%	2,350,225	4,199,816	6,550,041	64.1%	2,064,751	5,073,740	7,138,491	71.1%
Waiver Case Manager - Other	35,940	482,777	518,717	93.1%	40,877	497,934	538,811	92.4%	32,606	479,309	511,915	93.6%
HCBS - Composite	\$ 48,787,516	\$ 49,976,711	\$ 98,764,227	50.6%	\$ 42,656,887	\$ 47,521,557	\$ 90,178,444	52.7%	\$ 46,942,048	\$ 60,792,481	\$ 107,734,529	56.4%
Intellectual and Developmental Disability Services												
BHDDH - Case Management	-	6,453,234	6,453,234	100.0%	-	6,913,479	6,913,479	100.0%	-	7,159,850	7,159,850	100.0%
BHDDH - Day Program	-	45,060,035	45,060,035	100.0%	-	52,483,091	52,483,091	100.0%	-	54,632,651	54,632,651	100.0%
BHDDH - Employment-Based	-	2,668,921	2,668,921	100.0%	-	3,574,631	3,574,631	100.0%	-	4,050,338	4,050,338	100.0%
BHDDH - Ind. Living Only	-	797,375	797,375	100.0%	-	857,224	857,224	100.0%	-	905,555	905,555	100.0%
BHDDH - Independent Living or Family Supports	71	14,198,386	14,198,457	100.0%	-	14,621,900	14,621,900	100.0%	-	15,523,920	15,523,920	100.0%
BHDDH - Other	196,490	15,310,603	15,507,093	98.7%	188,141	11,347,170	11,535,310	98.4%	156,556	10,868,421	11,024,977	98.6%
BHDDH - Prevocational Training	-	593,618	593,618	100.0%	-	709,836	709,836	100.0%	-	877,372	877,372	100.0%
BHDDH - Residential Habilitation	628,299	94,091,674	94,719,973	99.3%	870,689	103,567,917	104,438,606	99.2%	696,025	104,797,990	105,494,015	99.3%
BHDDH - Self-Directed Services	-	20,318,396	20,318,396	100.0%	-	19,724,583	19,724,583	100.0%	-	21,152,520	21,152,520	100.0%
BHDDH - Transportation	-	6,899,349	6,899,349	100.0%	-	6,032,115	6,032,115	100.0%	-	6,076,086	6,076,086	100.0%
Home Care	-	5,164,697	5,164,697	100.0%	-	5,217,997	5,217,997	100.0%	-	12,555,675	12,555,675	100.0%
I/DD - Composite	\$ 824,859	\$ 211,556,287	\$ 212,381,146	99.6%	\$ 1,058,829	\$ 225,049,943	\$ 226,108,772	99.5%	\$ 852,582	\$ 238,600,377	\$ 239,452,958	99.6%

- Notes:**
- The claims data fields used to define service categories is not consistently populated on the MCO encounter data. A hierarchical approach based on available data was used to assign service category to MCO encounters.
 - See the Methodology section of attached report for additional data caveats and limitations.
 - Values have been rounded.

State of Rhode Island
Office of the Health Insurance Commissioner
Appendix 2
Annual Expenditures

	SFY 2020				SFY 2021				SFY 2022			
	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS	MCO	FFS	Composite	% FFS
Behavioral Health Providers												
BHDDH Behavioral Health Group	\$ 16,978,466	\$ 592,334	\$ 17,570,801	3.4%	\$ 19,814,417	\$ 445,088	\$ 20,259,505	2.2%	\$ 16,632,367	\$ 344,220	\$ 16,976,587	2.0%
Children's Behavioral Health Group	21,347,335	31,968	21,379,302	0.1%	24,566,281	22,980	24,589,262	0.1%	26,007,663	24,414	26,032,077	0.1%
CMHC - ACT	11,402,080	5,028,944	16,431,025	30.6%	12,959,389	5,922,572	18,881,961	31.4%	13,867,976	10,756,540	24,624,516	43.7%
CMHC - IHH	23,367,222	7,729,084	31,096,306	24.9%	24,914,318	8,505,505	33,419,823	25.5%	25,024,232	8,397,751	33,421,983	25.1%
CMHC - MHPRR	9,580,275	6,625,110	16,205,385	40.9%	10,082,171	7,016,380	17,098,551	41.0%	10,803,405	11,677,172	22,480,577	51.9%
CMHC - Other	8,381,484	10,214,086	18,595,570	54.9%	7,080,590	10,217,541	17,298,131	59.1%	9,392,189	12,063,823	21,456,012	56.2%
Emergency Behavioral Health Service	1,657,573	456,592	2,114,165	21.6%	1,607,711	685,283	2,292,994	29.9%	1,809,495	693,063	2,502,558	27.7%
Licensed Therapist	7,459,497	9,076	7,468,573	0.1%	6,295,827	8,180	6,304,007	0.1%	7,672,315	2,428	7,674,743	0.0%
Other Therapies	3,187,318	403,711	3,591,029	11.2%	2,996,931	398,746	3,395,677	11.7%	3,564,275	414,061	3,978,337	10.4%
Peer Recovery Services	255,933	27,755	283,688	9.8%	204,690	190,671	395,360	48.2%	150,680	146,942	297,622	49.4%
Psychologist	1,983,486	7,223	1,990,709	0.4%	1,493,373	12,926	1,506,299	0.9%	1,686,201	18,665	1,704,866	1.1%
Substance Use Rehabilitation	25,173,157	2,542,165	27,715,322	9.2%	27,986,852	1,373,092	29,359,944	4.7%	28,759,780	979,594	29,739,374	3.3%
Behavioral Health Providers - Composite	\$ 130,773,827	\$ 33,668,046	\$ 164,441,873	20.5%	\$ 140,002,550	\$ 34,798,963	\$ 174,801,513	19.9%	\$ 145,370,578	\$ 45,518,674	\$ 190,889,252	23.8%
Children's Services												
Cedar	\$ 303,165	\$ 61,632	\$ 364,798	16.9%	\$ 301,069	\$ 67,750	\$ 368,819	18.4%	\$ 361,271	\$ 52,350	\$ 413,621	12.7%
CRAFT	22,863	2,760,575	2,783,438	99.2%	43,898	2,967,656	3,011,554	98.5%	49,954	2,997,451	3,047,406	98.4%
Early Intervention	7,937,400	3,279,928	11,217,328	29.2%	7,093,543	3,401,131	10,494,675	32.4%	7,302,359	3,249,357	10,551,716	30.8%
Home/Center-Based Therapeutic Services	19,676,867	9,891,688	29,568,555	33.5%	19,615,933	12,987,546	32,603,479	39.8%	20,584,972	9,594,038	30,179,010	31.8%
Children's Services - Composite	\$ 27,940,296	\$ 15,993,824	\$ 43,934,120	36.4%	\$ 27,054,444	\$ 19,424,082	\$ 46,478,526	41.8%	\$ 28,298,557	\$ 15,893,196	\$ 44,191,753	36.0%
HCBS												
Adult Day Care	\$ 6,418,564	\$ 4,625,393	\$ 11,043,957	41.9%	\$ 3,374,901	\$ 2,324,761	\$ 5,699,662	40.8%	\$ 6,997,325	\$ 6,656,140	\$ 13,653,465	48.8%
Assisted Living Facility	5,137,209	8,534,634	13,671,843	62.4%	4,081,259	9,868,087	13,949,346	70.7%	2,286,124	15,289,475	17,575,600	87.0%
Case Management	1,756,268	1,989,276	3,745,544	53.1%	1,740,498	1,947,618	3,688,116	52.8%	1,916,754	2,510,896	4,427,650	56.7%
Day Habilitation	293,898	381,485	675,383	56.5%	374,990	329,915	704,905	46.8%	386,334	480,647	866,981	55.4%
Home Care	32,299,238	37,739,022	70,038,260	53.9%	39,502,304	45,368,487	84,870,792	53.5%	40,495,179	70,229,347	110,724,526	63.4%
Home Health	12,038	716,889	728,926	98.3%	6,116	762,223	768,339	99.2%	2,402	986,030	988,432	99.8%
Home Meal Delivery	135,792	195,571	331,363	59.0%	140,615	220,096	360,711	61.0%	188,134	237,006	425,140	55.7%
Hospice	662,298	1,489,846	2,152,144	69.2%	450,726	1,366,760	1,817,486	75.2%	458,686	1,465,579	1,924,265	76.2%
Independent Provider	-	-	-	-	-	230,878	230,878	100.0%	-	1,280,496	1,280,496	100.0%
Personal Choice/Hab Case Management	140,000	490,245	630,245	77.8%	170,500	537,570	708,070	75.9%	241,375	706,260	947,635	74.5%
Self-Directed Community Services	258,780	9,601,052	9,859,832	97.4%	179,913	9,679,408	9,859,321	98.2%	156,280	11,305,682	11,461,962	98.6%
Shared Living Agency	1,652,311	3,753,599	5,405,910	69.4%	1,722,642	4,645,225	6,367,867	72.9%	1,903,429	6,062,870	7,966,299	76.1%
Severely Disabled Nursing Homecare	2,271,666	5,676,195	7,947,861	71.4%	1,896,842	5,491,497	7,388,339	74.3%	1,536,440	7,093,171	8,629,611	82.2%
Waiver Case Manager - Other	46,412	486,768	533,181	91.3%	69,213	499,237	568,449	87.8%	48,174	516,418	564,591	91.5%
HCBS - Composite	\$ 51,084,472	\$ 75,679,976	\$ 126,764,448	59.7%	\$ 53,710,518	\$ 83,271,762	\$ 136,982,280	60.8%	\$ 56,616,637	\$ 124,820,017	\$ 181,436,654	68.8%
Intellectual and Developmental Disability Services												
BHDDH - Case Management	-	7,205,035	7,205,035	100.0%	-	7,106,332	7,106,332	100.0%	-	7,262,037	7,262,037	100.0%
BHDDH - Day Program	-	54,501,270	54,501,270	100.0%	-	52,716,975	52,716,975	100.0%	-	65,789,125	65,789,125	100.0%
BHDDH - Employment-Based	-	3,076,811	3,076,811	100.0%	-	2,226,645	2,226,645	100.0%	-	2,568,062	2,568,062	100.0%
BHDDH - Ind. Living Only	-	887,796	887,796	100.0%	-	893,044	893,044	100.0%	-	1,050,533	1,050,533	100.0%
BHDDH - Independent Living or Family Supports	763	14,977,388	14,978,151	100.0%	-	13,259,145	13,259,145	100.0%	-	15,104,436	15,104,436	100.0%
BHDDH - Other	133,720	12,461,564	12,595,284	98.9%	123,544	14,686,991	14,810,535	99.2%	136,345	18,592,917	18,729,262	99.3%
BHDDH - Prevocational Training	-	447,652	447,652	100.0%	-	158,091	158,091	100.0%	-	202,796	202,796	100.0%
BHDDH - Residential Habilitation	595,893	111,079,963	111,675,856	99.5%	629,999	109,779,571	110,409,569	99.4%	697,293	128,186,388	128,883,681	99.5%
BHDDH - Self-Directed Services	-	22,240,461	22,240,461	100.0%	-	25,572,500	25,572,500	100.0%	-	34,143,475	34,143,475	100.0%
BHDDH - Transportation	-	4,837,076	4,837,076	100.0%	-	2,866,470	2,866,470	100.0%	-	4,044,390	4,044,390	100.0%
Home Care	-	8,359,266	8,359,266	100.0%	-	3,753,361	3,753,361	100.0%	-	4,628,070	4,628,070	100.0%
I/DD - Composite	\$ 730,376	\$ 240,074,282	\$ 240,804,658	99.7%	\$ 753,543	\$ 233,019,125	\$ 233,772,667	99.7%	\$ 833,638	\$ 281,572,229	\$ 282,405,867	99.7%

Notes:

1. The claims data fields used to define service categories is not consistently populated on the MCO encounter data. A hierarchical approach based on available data was used to assign service category to MCO encounters.
2. See the Methodology section of attached report for additional data caveats and limitations.
3. Values have been rounded.

APPENDIX 3: Mapping of Provider Code to Service Category

State of Rhode Island
Office of the Health Insurance Commissioner
Appendix 3
Mapping of Provider Code to Service Category

Major Service Category	Detailed Service Category	Billing Provider Code	Billing Provider Code Description
Behavioral Health Providers	BHDDH Behavioral Health Group	066	BHDDH Behavioral Health Group
Behavioral Health Providers	Children's Behavioral Health Group	047	Children's Behavioral Health Group
Behavioral Health Providers	CMHC - ACT	061	CMHC/Rehab Option
Behavioral Health Providers	CMHC - IHH	061	CMHC/Rehab Option
Behavioral Health Providers	CMHC - MHPRR	061	CMHC/Rehab Option
Behavioral Health Providers	CMHC - Other	061	CMHC/Rehab Option
Behavioral Health Providers	Emergency Behavioral Health Service	111	Emergency Behavioral Health Service
Behavioral Health Providers	Licensed Therapist	017	Licensed Therapist
Behavioral Health Providers	Other Therapies	073	Other Therapies/Hippotherapy
Behavioral Health Providers	Peer Recovery Services	109	Peer Recovery Services
Behavioral Health Providers	Psychologist	030	Psychologist
Behavioral Health Providers	Substance Use Rehabilitation	060	Substance Use Rehab
Children's Services	Cedar	082	Cedar Center
Children's Services	DCYF	067	Department of Children Youth and Families
Children's Services	Early Intervention	059	Early Intervention
Children's Services	Home/Center-Based Therapeutic Services	080	Home/Center Based Therapeutic Services
HCBS	Adult Day Care	050	Adult Day Care
HCBS	Assisted Living Facility	033	Assisted Living Facility
HCBS	Case Management	044	Case Management
HCBS	Day Habilitation	055	Day Habilitation
HCBS	Home Care	072	Personal Care Aide/Assistant
HCBS	Home Health	010	Skilled Nursing
HCBS	Home Meal Delivery	077	Home Meal Delivery
HCBS	Hospice	027	Hospice
HCBS	Independent Provider	116	Independent Provider
HCBS	Personal Choice/Hab Case Management	069	Personal Choice/Hab Case Management
HCBS	Self-Directed Community Services	071	Self Directed Community Services
HCBS	Severely Disabled Nursing Homecare	065	Severely Disabled Nursing Homecare
HCBS	Shared Living Agency	051	Shared Living Agency
HCBS	Waiver Case Manager - Other	057	Waiver Case Manager - Other
Intellectual and Developmental Disability Services	BHDDH - Case Management	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Day Program	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Employment Based	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Ind. Living Only	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Independent Living or Family Supports	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Other	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Prevocational Training	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Residential Habilitation	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Self-Directed Services	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	BHDDH - Transportation	088	BHDDH DD Agencies
Intellectual and Developmental Disability Services	Home Care	072	Personal Care Aide/Assistant
Intellectual and Developmental Disability Services	RICLAS	026	RICLAS
Intellectual and Developmental Disability Services	Tavares	029	ICF - MR. Private Facility

Notes

1. BHDDH claims assigned by provider code 088 and CMHC claims assigned by provider code 061 are further subdivided by the HCPCS associated with the claim.

APPENDIX 4: Non-MMIS Service Utilization

State of Rhode Island
Office of the Health Insurance Commissioner
Appendix 4
Historic Utilization of Non-MMIS Services

	Average Annual Utilizers					
	SFY 2017	SFY 2018	SFY 2019	SFY 2020	SFY 2021	SFY 2022
DHS						
Vocational Rehabilitation	7,223	5,329	3,484	2,811	2,066	3,257
<i>Services with codes</i>	5,749	3,125	1,651	1,024	688	1,273
<i>Services without codes</i>	1,474	2,204	1,833	1,787	1,378	1,984
Child Care	Data Not Available	Data Not Available	36,609	23,564	12,939	13,124
<i>Family Home Provider</i>	Data Not Available	Data Not Available	8,344	4,633	2,841	2,744
<i>Group Center</i>	Data Not Available	Data Not Available	44	58	21	11
<i>Licensed Center</i>	Data Not Available	Data Not Available	26,168	17,509	9,800	10,349
<i>Licensed Exempt</i>	Data Not Available	Data Not Available	360	148	69	20
<i>Summer Camp</i>	Data Not Available	Data Not Available	1,693	1,216	208	-
DHS - Composite	7,223	5,329	40,093	26,375	15,005	16,381
DOH						
Tobacco Quit Line	2,768	2,407	2,683	2,273	2,756	2,842
Lead Services	Data Not Available	Data Not Available	20	22	24	13
DOH - Composite	2,768	2,407	2,703	2,295	2,780	2,855
DCYF						
Home and Community-Based Services	1,942	928	1,093	1,045	1,059	1,151
Foster Care	-	-	-	-	514	525
Residential Care	1,042	470	427	379	391	406
Residential Care: Out-of-State	1	9	14	25	58	82
DCYF - Composite	2,985	1,407	1,534	1,449	2,022	2,164
OHA						
CareBreaks	286	280	316	269	287	295
<i>Home Care</i>	197	191	232	225	219	228
<i>Adult Day Care</i>	31	22	28	23	36	26
<i>Nursing Facility & Assisted Living Facility</i>	29	31	22	11	18	18
<i>Emergency (APS/OHA)</i>	29	36	34	10	14	23
OHA - Composite	286	280	316	269	287	295

Notes:

1. Utilization values shown for vocational rehabilitation are for services provided rather than unique users.
2. Utilization values shown for DCYF are for contracted slots rather than unique users.
3. Service utilization was provided by state agencies.
4. Values have been rounded.

APPENDIX 5: Non-MMIS Service Expenditures

State of Rhode Island Office of the Health Insurance Commissioner Appendix 5 Historic Expenditures of Non-MMIS Services						
	Average Annual Expenditures					
	SFY 2017	SFY 2018	SFY 2019	SFY 2020	SFY 2021	SFY 2022
DHS						
Vocational Rehabilitation	\$ 7,548,102	\$ 6,050,053	\$ 3,492,918	\$ 3,042,774	\$ 2,151,586	\$ 3,228,546
<i>Services with codes</i>	5,611,916	2,818,676	1,003,124	683,906	462,855	653,119
<i>Services without codes</i>	1,936,186	3,231,377	2,489,794	2,358,868	1,688,731	2,575,428
Child Care	Data Not Available	Data Not Available	\$ 66,970,641	\$ 67,218,420	\$ 55,258,656	\$ 54,554,333
<i>Family Home Provider</i>	Data Not Available	Data Not Available	15,951,962	15,675,710	11,642,143	10,660,563
<i>Group Center</i>	Data Not Available	Data Not Available	100,764	77,507	52,597	47,778
<i>Licensed Center</i>	Data Not Available	Data Not Available	49,537,229	49,711,986	43,321,644	43,816,544
<i>Licensed Exempt</i>	Data Not Available	Data Not Available	232,042	141,301	75,545	29,448
<i>Summer Camp</i>	Data Not Available	Data Not Available	1,148,644	1,611,916	166,726	-
DHS - Composite	\$ 7,548,102	\$ 6,050,053	\$ 70,463,559	\$ 70,261,194	\$ 57,410,243	\$ 57,782,879
DOH						
Tobacco Quit Line	\$ 101,313	\$ 95,168	\$ 101,861	\$ 77,859	\$ 82,004	\$ 84,048
Lead Services	Data Not Available	Data Not Available	13,500	14,850	16,200	8,775
DOH - Composite	\$ 101,313	\$ 95,168	\$ 115,361	\$ 92,709	\$ 98,204	\$ 92,823
DCYF						
Home and Community-Based Services	\$ 13,546,757	\$ 18,069,086	\$ 21,524,249	\$ 23,040,125	\$ 21,895,181	\$ 16,768,454
Foster Care	-	-	-	-	7,580,455	6,469,035
Residential Care	19,269,754	25,484,719	25,169,990	30,557,278	25,798,572	29,180,144
Residential Care: Out-of-State	188,577	972,020	2,551,377	4,800,045	11,821,089	16,324,236
DCYF - Composite	\$ 33,005,089	\$ 44,525,825	\$ 49,245,616	\$ 58,397,448	\$ 67,095,297	\$ 68,741,870
OHA						
CareBreaks	\$ 285,081	\$ 269,560	\$ 289,246	\$ 276,400	\$ 307,946	\$ 365,005
<i>Home Care</i>	190,094	168,679	205,089	232,711	235,451	234,876
<i>Adult Day Care</i>	28,213	21,423	22,945	18,309	30,900	32,784
<i>Nursing Facility & Assisted Living Facility</i>	47,243	56,456	38,644	19,738	22,716	37,045
<i>Emergency (APS/OHA)</i>	19,530	23,002	22,568	5,642	18,879	60,300
OHA - Composite	\$ 285,081	\$ 269,560	\$ 289,246	\$ 276,400	\$ 307,946	\$ 365,005

Notes:

- Expenditures for Non-MMIS services was provided by the state agencies.
- Per diems paid to private agency foster care for services and parent stipends in SFY 2017 through SFY 2020 are not included in the figure above. Foster care agency payments in SFY 2021 and SFY 2022 represent the acuity-based payment to the private agency.
- A limited number of DCYF expenditures are directly billed to Medicaid. Services directly billed to Medicaid excluded from the figure above.
- Values have been rounded.

Data Book
(Microsoft Excel Attachment)



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