Medicaid & CHIP and the COVID-19 Public Health Emergency
Preliminary Medicaid and CHIP Data Snapshot
Services through May 31, 2021 Fact Sheet

Overview
To monitor the impact of the COVID-19 public health emergency (PHE), the Centers for Medicare & Medicaid Services (CMS) conducted extensive data analysis using the Transformed Medicaid Statistical Information System (T-MSIS) Analytic Files (TAF) and is releasing a comprehensive overview of the PHE’s impact on Medicaid and CHIP beneficiaries and service utilization through May 2021. Specifically, CMS is releasing updated data that examines:

- Enrollment,
- COVID-19 treatment, acute care use, and testing,
- Service use among Medicaid & CHIP beneficiaries age 18 and under,
- Services delivered via telehealth to Medicaid and CHIP beneficiaries,
- Services for mental health and substance use disorders (SUDs) among Medicaid and CHIP beneficiaries, and
- Reproductive health services use during the COVID-19 PHE.

These analyses are essential to increasing our understanding of COVID-19’s effects, as Medicaid and CHIP covered over 110 million Americans for at least one day since the start of the PHE, including children, pregnant people, adults, seniors, and individuals with disabilities, among other groups. Within these beneficiary populations, it is particularly important to note that Medicaid and CHIP covered approximately 45 million children during this time, including many living in poverty or with a special health care need, and are the largest payers for mental health services in the United States.

The preliminary findings show that enrollment has increased substantially since the onset of the PHE. Preliminary data comparing February 2020 to April 2021 show that overall enrollment in

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From a COVID-19 treatment standpoint, nearly 4.1 million beneficiaries have received treatment for COVID-19 through May 2021, with over 340,000 hospitalizations and more than 34 million COVID-19 tests covered via the programs. Further, the secondary impacts of COVID-19 on service utilization have been significant. For children, service utilization across many key domains, such as primary, preventive, dental, and mental health services, has dropped over the course of the PHE. Although rates have rebounded through March 2021 for many of these services, millions of services still need to be delivered to make up for those missed between March 2020 and May 2021. Of all services examined in this analysis, the smallest recovery has been for mental health services and dental services. Although service delivery for children via telehealth has increased dramatically since the onset of the PHE, this increase has not been substantial enough to fully offset the decline in service utilization.

This release includes an updated section on reproductive health services utilization. This is an important addition, as Medicaid is the largest payer for maternity care in the United States, covering more than 4 in 10 births. This analysis found that although the number of beneficiaries in eligibility groups for adults increased, especially for pregnant people and expansion adults, reproductive health service use declined or remained steady during the PHE. Further, the provision of any contraceptives and long-acting reversible contraception dropped in April 2020 and rebounded through March 2021, though there is still a gap in services compared to pre-PHE levels. Perinatal services utilization declined, including prenatal and postpartum visits and bundled payments, which may be tied to the decrease in the number of live births, miscarriages, and stillbirths. However, we might expect increases in postpartum services in the future due to extended postpartum care coverage, due to the requirement that states maintain coverage for eligible people for the duration of the PHE.

Taken together, CMS’s release of COVID-19 data is a major step toward sharing timely data on the nation’s largest health coverage program. These results are essential not only for ensuring robust monitoring and oversight of Medicaid and CHIP, but also for highlighting the distinct impact COVID-19 has had on children’s service utilization, telehealth utilization, services for mental health and SUDs, and reproductive health services. By using these results, CMS, states, and other key stakeholders can help drive better health outcomes for some of our nation’s most vulnerable beneficiaries.

**Findings**

**Enrollment:** Preliminary data comparing February 2020 to April 2021 show that overall enrollment in Medicaid and CHIP increased by over 10%, with the greatest percentage increases found in the pregnant, adult expansion, and other adult eligibility groups. Comparing February 2020 to April 2021, the data show approximately 12% more (10.2 million) beneficiaries enrolled in Medicaid or CHIP, 50% more (489,000) beneficiaries in the pregnant eligibility group, 27% more (4.1 million) beneficiaries in the adult expansion eligibility group, and 20% more (2.1 million) beneficiaries in other adult eligibility groups. There were 1% fewer beneficiaries in the

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4 Other adult eligibility groups include beneficiaries who are older than 21 and fall into categories such as parents and other caretaker relatives, transitional Medicaid Assistance, extended Medicaid due to spousal support, and pregnant women.
blind and disabled eligibility group and 2% fewer beneficiaries in the CHIP children eligibility group.

**COVID-19 treatment, acute care use, and outcomes:** For COVID-19 treatment and outcomes, nearly 4.1 million beneficiaries have received treatment and more than 340,000 Medicaid and CHIP beneficiaries have been hospitalized through the end of May 2021. Further, Medicaid and CHIP have paid for nearly 34.1 million COVID-19 tests or testing-related services since the start of the PHE, not including tests or testing-related services provided free of charge or covered by other insurance programs, including Medicare.

**Service utilization among Medicaid & CHIP beneficiaries age 18 and under:** There has been a decline in service use among enrollees age 18 and under across a number of key domains. When compared to data from the same time period two years prior, preliminary data for the PHE show 1.6 million (2%) fewer vaccinations for beneficiaries up to age 18, 2.2 million (6%) fewer child screening services, 17.6 million (24%) fewer mental health services, and 12.6 million (24%) fewer dental services. Although rates across many domains are starting to rebound, millions of services still need to be delivered to make up for those missed between March 2020 and May 2021. However, there is considerable state variation in service use rates, with some states returning to or surpassing February 2020 levels of care by June 2020.

**Services delivered via telehealth:** The results demonstrate that the number of services delivered via telehealth surged during the PHE, with more nearly 144 million services delivered via telehealth. This represents an increase of more than 3,700% compared to the same period from two years prior.

**Services for mental health and SUD among Medicaid & CHIP beneficiaries:** For children, there has been a substantial decline in service use since April 2020, with declines continuing through March 2021 in nearly all states. When compared to data from the same time period from two years prior, preliminary data for 2020 show 17.6 million (24%) fewer mental health services for children. For adults age 19 to 64 for both mental health services and SUD services, there appears to be a trend in which the volume of mental health services during the PHE has returned to pre-PHE levels, while the gap in the rate of services has grown. This ongoing gap in the utilization rate is likely due to the large increase in enrollment in the adult and adult expansion eligibility groups.

**Reproductive health services:** Preliminary data suggest that, during the PHE, the provision of any contraceptives and long-acting reversible contraception dropped in April 2020 and rebounded through March 2021, though there is still a gap in services compared to pre-PHE levels. The number of live births, miscarriages, and stillbirths during the PHE are lower than prior years’ levels. The decline in pregnancy outcomes in earlier months of the PHE is not attributable to COVID-19 since these pregnancies were initiated prior to March 2020 (the start of the PHE). The number of beneficiaries in adult eligibility groups increased, especially for pregnant people and expansion adults. Despite this trend, reproductive health service use declined or remained steady during the PHE. Perinatal services declined, including prenatal and postpartum visits and bundled payments, which may be tied to the decrease in the number of live births, miscarriages, and stillbirths. However, we might expect increases in postpartum services due to extended postpartum care coverage due to the requirement that states maintain coverage for eligible people for the duration of the PHE.
For each set of the results, the estimates reflect services that are covered by Medicaid and CHIP. Services covered by other insurance programs, such as Medicare, are not included in these results. Given that there is a sizable population enrolled in both Medicare and Medicaid, with 12.3 million dually eligible beneficiaries in 2019, the results are unlikely to reflect the full scope of COVID-19 related treatments for dually eligible beneficiaries, as Medicare pays first for Medicare-covered services that are also covered by Medicaid because Medicaid is generally the payer of last resort. For more information about COVID-19 related cases and hospitalizations among dually eligible beneficiaries covered by Medicare, refer to CMS' Medicare COVID-19 Data Snapshot.

**Data Sources & Definitions**

Medicaid and CHIP providers, managed care agencies, and Pharmacy Benefit Managers submit administrative claims data to state Medicaid and CHIP agencies for processing. Those state agencies subsequently submit the data to CMS on a monthly basis via T-MSIS, a uniform, national data system for Medicaid and CHIP. Because T-MSIS submissions are difficult to analyze due to their large size and complex relational structure, CMS developed the research-optimized TAF to facilitate the analysis of Medicaid and CHIP data. Additional information about TAF can be found here. This data snapshot utilizes the 2018-2021 TAF to monitor ongoing outcomes related to COVID-19, including measures of Medicaid and CHIP enrollment, COVID-related treatment, and service use. Due to claims submission lags related to state processing and submission via T-MSIS, this analysis primarily focuses on service utilization and health outcomes through the end of May 2021.

CMS measured enrollment, forgone care, and COVID-related treatment using the following logic:

**Enrollment:** This analysis includes records for every beneficiary who has any Medicaid or CHIP enrollment record in a given month, regardless of the scope of their benefits.

**Vaccinations:** Vaccinations are identified by Current Procedural Terminology (CPT) codes. The vaccines included in this analysis are DTaP, Polio, MMR, Hepatitis B, Hib, Pneumococcal conjugate, Chickenpox, Hepatitis A, and Rotavirus.

**Child screening services:** Child screenings are identified by two types of codes in claims. The first type is CPT codes that are specific to visits by new or established patients (99381-99385 or 99391-99395) and to initial hospital or birth center care for newborns (99460, 99461, 99463). The second type is general CPT codes for new (99202–99205) or established (99213–99215) patients along with a diagnosis code indicating that the service was provided to a child younger than 19 (e.g., Z00.110 Health examination for newborn under 8 days old).

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**Dental Services:** Dental services are defined on the basis of the Current Dental Terminology (CDT) and CPT code groups from standard annual reporting of the states’ provision of Early and Periodic Screening, Diagnostic and Treatment services (CMS-416).

**Mental health services:** Mental health services are identified by claims in which the diagnosis is a mental health condition. In addition to diagnosis, the services are grouped on the claim by type: inpatient, intensive outpatient/partial hospitalization, outpatient, emergency department, and telehealth.

**Substance Use Disorder (SUD) services:** Substance use disorder services are identified by claims in which the diagnosis is a substance use disorder. In addition to diagnosis, the services are grouped on the claim by type: inpatient, intensive outpatient/partial hospitalization, outpatient, emergency department, and telehealth.

**Telehealth:** Telehealth is identified through a combination of procedure codes and procedure code modifiers.

**COVID testing services:** All COVID-19 testing services are grouped into three categories: diagnostic testing, antibody testing, and specimen collection. Diagnostic testing indicates whether an individual has COVID-19. Antibody testing is designed to detect antibodies produced in response to being previously exposed to COVID-19. Specimen collection is the process of obtaining the samples that are necessary to test for COVID-19. Diagnostic testing is identified via Healthcare Common Procedural Coding System (HCPCS) codes U0001, U0002, U0003, and U004 and CPT code 87635. Antibody testing is identified via CPT codes 86328 and 86769. Specimen collection is identified via HCPCS codes G2023 and G2024.

**COVID-19 treatment:** We use the following International Classification of Diseases (ICD), Tenth Revision (ICD-10), diagnosis codes to identify beneficiaries who received treatment for COVID-19:

- B97.29 (other coronavirus as the cause of diseases classified elsewhere) - before April 1, 2020

Although CMS does use laboratory claims for identifying COVID-19 treatment, CMS does not receive lab results from states and cannot determine whether a lab test was positive. Therefore, Medicaid & CHIP COVID-19 cases are only identifiable in TAF data when there is a corresponding COVID-19 related service.

**Reproductive health services:** Reproductive health services are identified using the Common Procedure Coding System (HCPCS), Current Procedural Terminology (CPT), ICD-10 diagnoses and procedures (ICD10-CM or ICD10-PCS), National Drug Codes (NDC), and revenue codes (UBREV) for female Medicaid and CHIP beneficiaries ages 15 to 44.

**Key Considerations**

Readers should use caution when interpreting these results as CMS collects Medicaid and CHIP data for programmatic purposes, not for public health surveillance. Given the complex process of
states collecting, processing, and transmitting claims via T-MSIS, it can take nearly 7 months for CMS to receive 90% of claims. Therefore, this delay between when a service occurs and when it is reflected in the T-MSIS Analytic Files, or the “claims lag,” may impact the accuracy of the results. The length of the lag depends on the submitting state, claim type, and delivery system. It is possible that there is a longer claims lag due to the COVID-19 pandemic. Further, in addition to claims lag, states vary widely in terms of the completeness and accuracy of their T-MSIS data submissions. Additional information about state data quality can be found here and here.

**Next Steps**

CMS is committed to working with state Medicaid and CHIP agencies to help close these gaps in children's health care and in treatment for mental health conditions, and we will continue to monitor both the direct and indirect impacts of COVID-19 on the Medicaid and CHIP populations using TAF data.