



COMMENT



Band aids for Medicaid: preserving the high numbers of child health coverage during the pandemic

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Impaired fetal growth may impart lasting neonatal and childhood effects. 1.2 Disruptions in intrauterine development resulting in growth restriction put newborns at risk of multiple short-term complications, including perinatal asphyxia, hypoglycemia, hyperviscosity and relative immune deficiency. 1 Furthermore, these infants must often be delivered preterm, incurring substantial risk of the comorbidities of preterm birth such as respiratory distress syndrome, necrotizing enterocolitis, intraventricular hemorrhage and retinopathy of prematurity. 3

In this issue, Andescavage et al. describe an association between MRI-measured placental volumes, fetal brain volumes and Neonatal Intensive Care Unit Network Neurobehavioral Scale evaluations in a group of 44 women with singleton fetal growth-restricted pregnancies. 4 Measured at term equivalent age, the authors found placental volumes correlated with improved self-regulation and decreased excitability.4 Among other findings, regional brain volumes were associated with higher self-regulation and cerebellar volumes directly related to increased attention and decreased lethargy.⁴ These results, obtained in infancy, may underlie the known association of fetal growth restriction with poor school performance and hyperactivity in later school age.⁵ When compounded with the increased likelihood of diabetes, dyslipidemia, obesity, cardiovascular disease and renal disease in this population, the results reinforce the need for long-term comprehensive medical follow-up throughout early adulthood.6

Receiving this care will require consistent health insurance coverage and frequent access to pediatric care. Unlike nations with national healthcare systems, child health insurance in the United States relies on a patchwork of independent insurers, including multiple employer-sponsored private plans, the military health system (TriCare) and government-sponsored insurance, predominantly Medicaid and the Children's Health Insurance Plan (CHIP).⁸ This system leads to poor healthcare value. Analysis of 71 performance measures across domains of healthcare quality, including access to care, efficiency, processes of care and equity, saw the United States ranked last among 11 high-income countries.⁹ Of 10 healthcare outcomes reviewed, including preventable mortality and maternal mortality, the US ranked last, with maternal mortality more than twice the second-to-last performing nation.⁹

Unsurprisingly, the US is the only high-income nation without universal child health insurance coverage. Improving access to care-especially for high-risk newborns such as those described by

Andescavage et al. requires expanding and strengthening coverage for children.⁴ Consistent health insurance coverage correlates with a myriad of positive pediatric health outcomes, including receipt of preventive medical and dental care.¹⁰ Long-term insurance coverage in childhood is associated with improved Body Mass Index, and reduces the likelihood of high-risk sexual activity, teen pregnancy, alcohol use, marijuana use and poor mental health in adolescents.^{11–13} Gaps in coverage, particularly for children with chronic diseases such as asthma are strongly associated with increase emergency department use.¹⁴

For all the havoc the COVID pandemic unleashed on children, from social isolation, hospitalization, multisystem inflammatory syndrome in children, mental health issues, missed immunizations and increased flavored nicotine use; strong federal incentives to maintain children on public insurance throughout the public health emergency have been a silver lining.

As part of the Families First Coronavirus Response Act, states received an increase of 6.2 percentage points in their federal match for Medicaid programs in exchange for maintaining coverage for families and preventing disenrollment.¹⁵ The result is that despite the economic downturn, the number of uninsured children did not increase substantially, as approximately 4.1 million children moved into Medicaid and CHIP from lost employer-sponsored coverage. This continuous coverage requirement, which at this writing, is scheduled to end in April, 2023. created an 11 percent increase in the number of children in public coverage.¹⁶ Nationally, the sum total of these gains is impressive, decreasing the total percentage of uninsured children from 5.7% just prior to the pandemic to an estimated 4.1%.¹⁵

Several states, including Georgia, Missouri, North Dakota, Utah and Wyoming, saw more than a 20% increase in Medicaid and CHIP enrollment compared to pre-pandemic numbers. Currently, more than 40 million children nationwide are now publicly insured.¹⁷ Prior to these actions, large percentages of the US population rotated in and out of health insurance coverage, with up to 21.5% of adults and dependent children turning over coverage annually, and only a third re-enrolling in commercial coverage within 5 years.¹⁸ Among children in Medicaid, approximately 10% experienced a cycle of disenrollment/re-enrollment in coverage of up to 1 year—with variability across states. The rate of medical "churn" in-and-out health coverage exceeds 15% annually in Texas.¹⁹

The pandemic response, which prevented removing children from health coverage for bureaucratic reasons such as failing to

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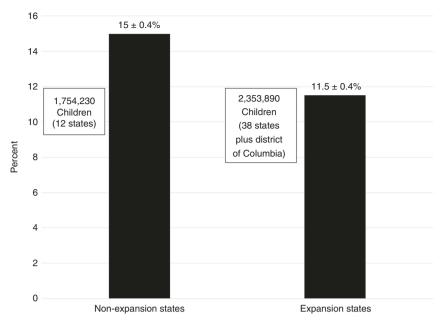


Fig. 1 Average percent gain in Medicaid and CHIP-insured children during pandemic. States which did not opt for Medicaid Expansion as part of the 2010 Affordable Care Act experienced higher gains in the percentage of insured children during the pandemic (mean \pm standard deviation, $15 \pm 0.4\%$ vs. $11.5 \pm 0.4\%$). While 31% of US children live in states that did not expand Medicaid, these 12 states hosted 43% of all children who gained coverage via Medicaid or CHIP during the public health emergency (data taken from ref. ¹⁵ Appendix A, "Child Enrollment in Medicaid and CHIP by State").

re-verify eligibility or changing address, now provides a template for how to best conduct the Medicaid/CHIP programs to better maintain public coverage for children and substantially progress toward universal coverage in pediatrics. Ultimately, this may nudge us toward the better child health outcomes seen in other high-income countries.⁹

Of the 4.1 million children who moved onto Medicaid and CHIP during the pandemic, large differences are seen in states based on their decision to expand Medicaid—a tenet of the 2010 Affordable Care Act. The 12 states that have not expanded Medicaid saw higher gains in insured children (Fig. 1). Beginning with lower overall rates of insured children gave them more room to improve coverage rates. Non-expansion states increased coverage for children by an average of 15% compared to 11.5% in expansion states. Put another way, the 12 states that did not expand Medicaid comprise ~31% of entire US child population, but are home to 43% of the roughly 4.1 million children who gained coverage. This experience demonstrates the potency of Medicaid expansion and provides compelling data to advocates pressing for Medicaid reform in these reluctant states.

Once the requirements for continuous coverage and maintenance of effort tied to federal funding expire, the clock strikes midnight and states will have millions of children at risk of losing Medicaid and CHIP coverage. Reverification to determine Medicaid/CHIP eligibility will again be required, and states have constructed multiple barriers to make re-enrollment arduous¹⁵ (Fig. 2). These include fractured Medicaid and CHIP bureaucracies, in which children eligible for one program must re-enroll in the other separately—even though these programs operate seamlessly in most states. For those who move into CHIP coverage, premiums may disincentivize enrollment. ^{15,20,21} At least 26 states charge premiums or annual fees in CHIP. ¹⁵ In certain cases, failure to pay disenfranchises children from coverage. ^{15,20}

Other impediments include limited efforts to contact parents as their insurance nears expiration, short windows to re-enroll and provide documentation, and providing less than 1 year of coverage per enrollment cycle. Together, these policies reintroduce a complicated network of regulations, which when short-

circuited by the pandemic, actually resulted in better coverage rates, thus questioning the very need for these regulations in the first place. States should re-evaluate the necessity of these barriers and adopt policies more aligned with the continuous health insurance coverage children require. Simply, having experienced high coverage rates during the pandemic, states would do well to re-create those insurance supports rather than expending efforts policing insurance eligibility and enrollment for children.

The Centers for Medicare and Medicaid Services requires states to develop plans for addressing the loss of public-healthemergency-related insurance protections. While each state hosts an individual mix of policies and regulations that influence rates of child health coverage, the mandatory re-evaluation of enrollment policies provides an opportunity to streamline health insurance for children. To ease the burden of administrative "churn" in Medicaid, the federal government has granted 139 waivers to date across 38 states focused on retaining children in Medicaid/ CHIP.^{22,23} The Pediatric Policy Council, in a letter to the Centers for Medicare and Medicaid Services, called for lengthening the response time families have to provide certifying documentation for Medicaid, aligning Medicaid and CHIP, removing lockout periods and eliminating annual and lifetime dollar limits within CHIP as part of a menu of remedies to forestall losses in coverage.

One key provision could help eliminate re-enrollment challenges and maintain high rates of coverage. Providing continuous enrollment for Medicaid-eligible children at birth through the first few years of life has reduced gaps in insurance coverage and increased the percentage of children enrolled in Medicaid for at least 90 days.²⁵

Analysis of seven states that created continuous eligibility after the 2009 CHIP reauthorization saw a 1.8% increase in the duration of child enrollment against a modest 2.2% increase in cost.²⁶ To attain universal children's health insurance coverage, states must consider continuous enrollment, maximizing the known neurodevelopmental benefits that occur during the first 1000 days of life, a time of immense brain and developmental maturation, but also a period where children are uniquely susceptible to social

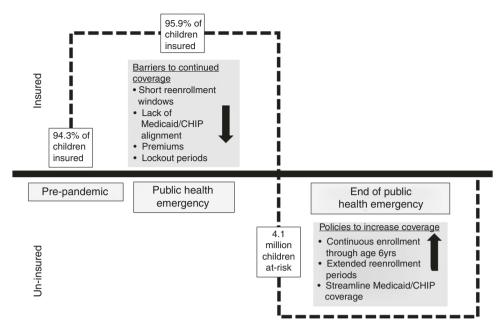


Fig. 2 Schematic of policies impacting Medicaid/CHIP enrollment during the COVID public health emergency. Multiple provisions impact the ability of children to continue Medicaid/CHIP coverage. Selected barriers that may reduce the number of insured children include short periods to enroll in coverage, the inability for children who lose coverage in Medicaid to be automatically enrolled in CHIP, premium payments in CHIP which hamper affordability and lockout periods during which re-enrollment is not allowed. Proposals that maintain coverage and potentially boost the percentage of insured children include continuous enrollment from birth, extended re-enrollment periods and streamlined coverage.

determinants of health.²⁷ The American Academy of Pediatrics recommends continuous enrollment through 5 years of age to maximize receipt of essential early-childhood screening. Simplifying systems to allow families to retain coverage prevents child uninsurance. In 2007, New York State introduced a package of reforms aimed at reducing the rate of 15.4% uninsured children.²⁸ Expanding CHIP to 400% of the federal poverty level, eliminating interview requirements, asset testing for children, prenatal drug and alcohol testing and reducing documentation for Medicaid eligibility redetermination moved 44,000 eligible children onto Medicaid within a year.²⁸ Already Oregon has received federal permission to continuously enroll children through age 6 years. Efforts in Illinois, New York, Washington and New Jersey are ongoing.²²

The easiest answer to the problems of "churn," eligibility, reverification, premiums, lockout periods and annual limits may be to follow the example of the 10 nations that outrank the US in health outcomes and value. Universal child health insurance, dubbed "MediKids," has been proposed for decades. Such a program managed effectively would destigmatize Medicaid enrollment, invest the state and federal government in paying rates that ensure access to general and subspecialty pediatric care and decouple Medicaid financing from state economics and politics. Description of the more decouple more importantly, it would create shared investment and values regarding children's welfare, potentially creating more equity in a public insurance system still heavily tilted toward Black, Hispanic, and Native American enrollment.

While we accelerate our distance from COVID lockdowns, our instinct is to look forward. However, the lessons that best assist the medically complex children described by Andescavage et al. may be best rooted in policies that may now exist in the pandemic's rearview mirror.

REFERENCES

 Colella, M., Frérot, A., Novais, A. R. B. & Baud, O. Neonatal and long-term consequences of fetal growth restriction. Curr. Pediatr. Rev. 14, 212–218 (2018).

- Miller, S. L., Huppi, P. S. & Mallard, C. The consequences of fetal growth restriction on brain structure and neurodevelopmental outcome. *J. Physiol.* 594, 807–823 (2016).
- American College of Obstetricians and Gynecologists (ACOG). Fetal growth restriction: ACOG Practice Bulletin, Number 227. Obstet. Gynecol. 137, e16–e28 (2021)
- 4. Andescavage, N. et al. Impaired in-vivo feto-placental development is associated with neonatal neurobehavioral outcomes. *Pediatr. Res.* (2022).
- 5. Sharma, D., Shastri, S. & Sharma, P. Intrauterine growth restriction: antenatal and postnatal aspects. *Clin. Med Insights Pediatr.* **10**, 67–83 (2016).
- Gephart, S. M. & Cholette, M. P.U.R.E. Communication: a strategy to improve carecoordination for high risk birth. *Newborn Infant Nurs. Rev.* 12, 109–114 (2012).
- Valsamakis, G., Kanaka-Gantenbein, C., Malamitsi-Puchner, A. & Mastorakos, G. Causes of intrauterine growth restriction and the postnatal development of the metabolic syndrome. *Ann. NY Acad. Sci.* 1092, 138–147 (2006).
- 8. Shah, S., Kuo, A. A. & Brumberg, H. L. First aid for Medicaid: losses in children's health insurance. *Pediatr. Res.* **89**. 8–11 (2021).
- Schneider, E. C. et al. Mirror, Mirror 2021: Reflecting Poorly: Health Care in the U.S. Compared to Other High-Income Countries (The Commonwealth Fund Reports, August, accessed 1 December 2022); https://www.commonwealthfund.org/sites/ default/files/2021-08/Schneider_Mirror_Mirror_2021.pdf (2021).
- Kreider, A. R. et al. Quality of health insurance coverage and access to care for children in low-income families. JAMA Pediatr. 170, 43–51 (2016).
- Cohodes, S., Grossman, D., Kleiner, S. & Lovenheim, M. F. The Effect of Child Health Insurance Access on Schooling: Evidence from Public Insurance Expansions (National Bureau of Economic Research, Working Paper No. 20178, accessed 24 November 2022); https://www.nber.org/system/files/working_papers/w20178/w20178.pdf (2014)
- Murphey, D. Health Insurance Coverage Improves Child Well-being (ChildTrends 2017, Publication 2017–2022, accessed 24 November 2022); https://www.childtrends.org/ wp-content/uploads/2017/05/2017-22HealthInsurance_finalupdate.pdf (2022).
- Kozloff, N. & Sommers, B. D. Insurance coverage and health outcomes in young adults with mental illness following the Affordable Care Act dependent coverage expansion. J. Clin. Psychiatry 78. e821–e827 (2017).
- Gushue, C. et al. Gaps in health insurance coverage and emergency department use among children with asthma. J. Asthma 56, 1070–1078 (2019).
- Alker, J. & Brooks, T. Millions of Children May Lose Medicaid: What Can be Done to Help Prevent Them from becoming Uninsured (Georgetown University Health Policy Institute Center for Children and Families, 17 February, accessed 10 March 2022); https://ccf.georgetown.edu/2022/02/17/millions-of-children-may-lose-medicaidwhat-can-be-done-to-help-prevent-them-from-becoming-uninsured/ (2022).

- Georgetown University Center for Children and Families analysis of February 2020-June 2021 (Centers for Medicare and Medicaid Services State Medicaid and CHIP Applications, Eligibility Determinations, and Enrollment Data); https://data.medicaid.gov/dataset/6165f45b-ca93-5bb5-9d06-db29c692a360.
- Centers for Medicare and Medicaid Services. August 2022 Medicaid and CHIP Enrollment Data Highlights (accessed 4 December 2022); https://www.medicaid. gov/medicaid/program-information/medicaid-and-chip-enrollment-data/report-highlights/index.html (2022).
- Fang, H., Frean, M., Sylwestrzak, G. & Ukert, B. Trends in disenrollment and reenrollment within US commercial health insurance plans, 2006-2018. JAMA Netw. Open. 5, e220320 (2022).
- Corallo, B., Garfield, R., Tolbert, J. & Rudowitz, R. Medicaid Enrollment Churn and Implications for Continuous Coverage Policies (Kaiser Family Foundation Issue Brief, 14 December, accessed 15 November 2022); https://www.kff.org/medicaid/issuebrief/medicaid-enrollment-churn-and-implications-for-continuous-coveragepolicies/ (2021).
- Brooks, T., Roygardner, L., Artiga, S., Pham, O. & Dolan, R. Medicaid and CHIP Eligibility, Enrollment, and Cost Sharing Policies as of January 2020: Findings from a 50-State Survey (Georgetown University Center for Children and Families and Henry J. Kaiser Family Foundation, March, accessed 5 December 2022) https:// files.kff.org/attachment/Report-Medicaid-and-CHIP-Eligibility,-Enrollment-and-Cost-Sharing-Policies-as-of-January-2020.pdf (2020).
- Medicaid and CHIP Payment and Access Commission. An Updated Look at Rates of Churn and Continuous Coverage in Medicaid and CHIP (Issue Brief, October, accessed 5 December 2022); https://www.macpac.gov/wp-content/uploads/ 2021/10/An-Updated-Look-at-Rates-of-Churn-and-Continuous-Coverage-in-Medicaid-and-CHIP.pdf (2021).
- Tolbert, J. & Ammula, M. 10 Things to Know About the Unwinding of the Medicaid Continuous Enrollment Requirement (Kaiser Family Foundation, 16 November, accessed 2 December 2022); https://www.kff.org/medicaid/issue-brief/10-thingsto-know-about-the-unwinding-of-the-medicaid-continuous-enrollmentrequirement/ (2022).
- Lee, R. More States Move to Expand Continuous Eligibility for Children and Adults in Medicaid (Georgetown Center for Children and Families. "Say Ahhh! Blog," 24 May, accessed 2 December 2022); https://ccf.georgetown.edu/2022/05/24/more-states-move-to-expand-continuous-eligibility-for-children-and-adults-in-medicaid/ (2022).

- Pediatric Policy Council, Comments on Notice of Proposed Rule CMD-2421-P, "Streamlining the Medicaid, Children's Health Insurance Program Application, Eligibility Determination, Enrollment and Renewal Process." November 2022.
- Johnson, K. Missing Babies: Best Practices for Ensuring Continuous Enrollment in Medicaid and Access to EPSDT (Johnson Group Consulting, Inc. January, accessed
 December 2022); https://ccf.georgetown.edu/wp-content/uploads/2021/03/missing_babies_EPSDT_Medicaid_exec_summ_jan2021_final_Johnson.pdf (2021).
- Ku, L., Steinmetz, E. & Bruen, B. Continuous-eligibility policies stabilized medicaid coverage for children and could be extended to adults with similar results. *Health* Aff. 9, 1576–1582 (2013).
- 27. Garner, A. S. & Saul, R. A. Thinking Developmentally: Nurturing Wellness in Childhood to Promote Lifelong Health (American Academy of Pediatrics, 2018).
- Tallon, J. R., Gould, D. A. & Birnbaum, M. Improving Enrollment and Retention in Medicaid and CHIP: Federal Options for a Changing Landscape 1–36 (Medicaid Institute at United Hospital Fund, August 2009).
- Perrin, J. M., Kenney, G. M. & Rosenbaum, S. Medicaid and child health equity. N. Engl. J. Med. 383, 2595–2598 (2020).

COMPETING INTERESTS

The author declares no competing interests.

ADDITIONAL INFORMATION

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