

How better access to mental health care can reduce crime

By Elisa Jácome

KEY TAKEAWAYS

- American prisons house a disproportionate number of mentally ill inmates, making them some of the country's largest providers of mental health care.
- Within two years of losing access to health care, those with a history of mental illness are more likely to be incarcerated.
- Extending Medicaid eligibility is a cost-effective way to reduce crime and criminal justice expenditures.

For the past 50 years, the United States has relied on incarceration — rather than addressing many of the root causes underlying criminal activity — and this policy choice is taking a toll on society.

A growing body of research shows that having a criminal record makes it harder to find a job and increases the likelihood of relying on public assistance (see e.g., Dobbie et al. 2018, Mueller-Smith 2015). Those factors — coupled with the high cost of keeping people behind bars — have called into question the cost-effectiveness of today's criminal justice system.

My research offers policymakers a consideration for reducing criminal justice costs while also better serving already vulnerable groups of Americans: increasing access to mental health services.

Measuring the effectiveness of mental health care access has proved difficult because of the lack of data shared and linked between health and law enforcement agencies in the United States. But using administrative data from South Carolina that has been linked across various government agencies, I am able to show that men with a history of mental illness are more likely to be incarcerated after losing access to health care (Jácome 2020).

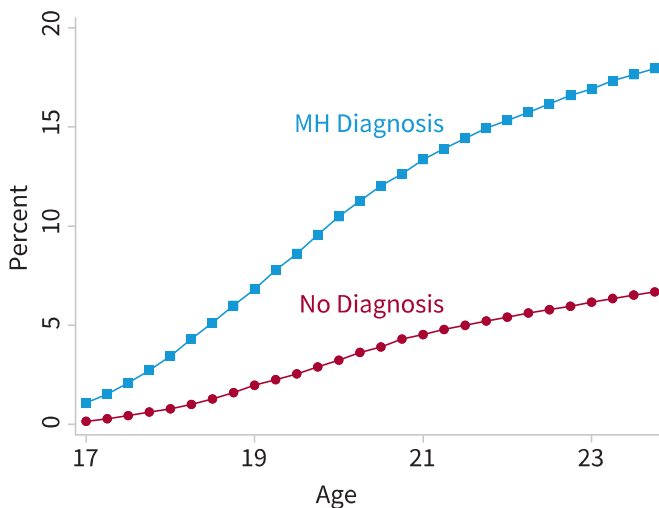
Prevalence of mental illness in the criminal justice population

Starting in the 1970s, policymakers at all levels of government adopted harsher criminal sanctions — such as longer sentence lengths and a higher likelihood of sending convicted offenders to prison — that contributed to rapid growth in the incarceration population (Neal and Rick 2016, Raphael and Stoll 2013). Today, more than 2 million individuals are incarcerated in local jails or in state or federal prisons (Maruschak and Minton 2020).

Individuals with mental illness are significantly over-represented in those facilities. More than one-third of inmates are diagnosed with a mental disorder prior to incarceration (Bronson and Berzofsky 2017). And on any given day, more than 1 million people with mental illness are locked up or on probation or parole (Frank and McGuire 2010).

In particular, low-income men with mental health histories are significantly more likely to be incarcerated than low-income men without mental health histories. Figure 1 shows the cumulative likelihood of incarceration at a given age for low-income men in South Carolina, separately for those with and without mental health histories. Low-income men with prior mental health histories (depicted in blue) were almost three times more likely to have been incarcerated by age 24 than those that had never received a diagnosis (depicted in red). Put differently, among low-income men who served a prison sentence before they were 21, 80 percent of them were diagnosed with a mental health disorder during adolescence.

Figure 1. Share of Low-Income Men Ever Incarcerated, by Mental Health Diagnosis



Those with mental health histories tend to have higher recidivism rates, serve longer sentences, and have more expensive medical needs than those without mental illness (Osher et al. 2012). The criminal justice system therefore spends a significant share of its resources housing and treating people with mental illness. A fifth of state prison expenditures are spent on correctional health care, and a third of this medical care goes to mental health care, pharmaceuticals, and substance-abuse treatment (Pew Charitable Trusts 2014). Correctional facilities have become some of the largest providers of mental health care in the country (Steinberg et al. 2015).

Criminal justice expenditures are a major source of spending at the state and local level, totaling \$250 billion in 2018, or roughly 8 percent of total spending (Urban Institute 2021). Faced with tight budgets, legislatures and local governments are often confronted with reducing these expenditures while maintaining public safety (National Conference of State Legislatures 2021).

Access to health care and criminal involvement

Given this well-established relationship between mental illness and criminal activity, should we expect that changes in access to mental health care will actually alter criminal involvement, or will this correlation persist?

Prior research suggests that improving access to behavioral health services might be an effective way to reduce criminal involvement. For example, Heller et al. (2017) study three randomized control trials in Chicago and find that low-income adolescents who took part in cognitive behavioral therapy (CBT) programming were less likely to be arrested for both violent and non-violent offenses. Bondurant et al. (2018) find that the availability of substance-abuse treatment facilities alters local crime rates.

In my recent paper, I study whether expanding eligibility for Medicaid — the public-assistance program that provides free health coverage to millions of low-income Americans — would reduce beneficiaries' likelihood of incarceration. Medicaid is the largest payer of mental health services in the U.S., and it covers many inpatient and outpatient behavioral health services, such as prescription medications and psychiatric treatment.

The administrative data I received from South Carolina links individual-level Medicaid insurance claims to law enforcement records and provides a snapshot of what's going on with young low-income adults. The prevalence of mental illness in this sample is high: Among boys enrolled in Medicaid throughout adolescence, more than half had at some point been diagnosed with a mental disorder. The three most common diagnoses were hyperkinetic syndrome of childhood (otherwise known as ADHD), developmental delay, and conduct disorder. It is also worth mentioning that contact with the criminal justice system in this sample was also high even before adulthood — 20 percent of this sample had been referred to the Department of Juvenile Justice at least once before age 17.

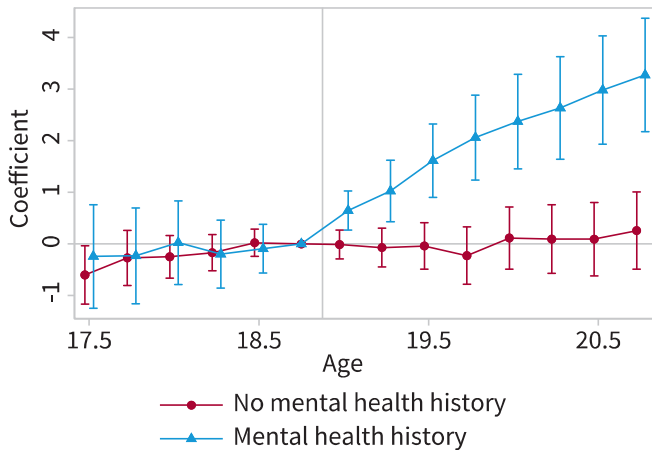
To identify the causal effect of Medicaid eligibility on criminal behavior, I study what happens to low-income men who suddenly lose Medicaid eligibility when they turn 19. In South Carolina, as in many states in the southern United States, low-income children between infancy and 18 have access to Medicaid services through the Children's Health Insurance Program (CHIP). However, South Carolina residents age out of this eligibility when they turn 19 years old and lose public health insurance coverage. There are exceptions — such as for children formerly in foster care or individuals diagnosed with a disability — but by and large, childless adults have very limited access to Medicaid services in adulthood.

To estimate the effect of this sudden loss in coverage, I use an empirical strategy known as difference-in-differences. In particular, I look at the likelihood of incarceration, before and after age 19, for individuals who were impacted by the termination in eligibility (i.e., the treated group). However, an increase in criminal behavior after age 19 could simply be the result of older individuals being more likely to commit crime. To separate the effect of the insurance loss from these age effects, I therefore use a comparison group of low-income men who were not enrolled in Medicaid right before age 19, and who were therefore less affected by the loss in eligibility. I can thus attribute any difference between the treated and comparison individuals after age 19 to the loss in insurance coverage.

I study the outcomes of the two groups, and I see that their likelihood of incarceration looks quite similar before age 19. But those who were enrolled and lost access to Medicaid services were 15 percent more likely to be incarcerated in the two years after turning 19, relative to the comparison group.

The Medicaid claims data allowed me to see whether the effect differs for those with and without mental health histories. Figure 2 shows that individuals without mental health histories who lost access to Medicaid eligibility are no more likely to be incarcerated after age 19 relative to their comparison group (differences depicted in red). The increase in incarceration seems to be driven entirely by individuals with mental health histories (differences depicted in blue). By their 21st birthdays, treated men with mental health histories who lost coverage were 22 percent more likely to have been incarcerated relative to men in the comparison group.

Notably, I find that the effects are more pronounced for men who were relying on Medicaid for access to mental health medications and for those who were using mental health services right before turning 19. Finally, I use the detailed information in the arrest and incarceration records to show that these men were more likely to be incarcerated for violent crimes (e.g., assault, robbery), drug offenses, and property crimes (e.g., burglary, motor vehicle theft).

Figure 2. Likelihood of Incarceration, by Mental Health History

Overall, the results suggest that losing access to mental health services plays an important role in explaining the observed rise in criminal involvement. In other words, Medicaid provided an important safety net for these low-income men by providing access to services that helped curtail criminal behavior.

Cost-benefit analysis

Providing health coverage to individuals with mental illness seems to be one way to significantly reduce their criminal involvement. But how do the benefits of expanding coverage compare with the costs?

From a policymaker's perspective, the main cost of extending Medicaid eligibility is the expense of providing health care. That depends on how many people use the program as well as the cost of providing services. Back-of-the-envelope calculations suggest that the cost of providing a cohort of low-income young men in South Carolina with Medicaid coverage for two additional years amounts to roughly \$15 million.

However, there are substantial benefits that can be accrued from extending Medicaid eligibility. First, there are the reduced fiscal costs from fewer incarcerations. Second, as prior research has shown, incarceration imposes significant social and fiscal costs in the form of

reduced employment prospects and increased reliance on public assistance.

If I compare the cost of extending Medicaid eligibility with the fiscal and social benefits from fewer incarcerations, I find that for every dollar spent on Medicaid, society recoups 50 cents. However, it is worth noting that criminal activity is also quite costly for the individuals who are victims of crime, not only in terms of stolen or damaged goods but also as a result of time or psychological costs. Once I consider the reduced costs from fewer violent, property, and drug-related victimizations, I find that for every dollar spent on Medicaid, society recoups \$2 in benefits.

This cost-benefit comparison only assumes that Medicaid has crime-related benefits. To the extent that extending Medicaid eligibility generates other fiscal and social benefits — e.g., reductions in mortality (Miller et al. 2021) — then this calculation is conservative. Regardless, the benefits of extending Medicaid eligibility to low-income young adults seem to outweigh the costs.

Policy implications

This research highlights the crime-reduction benefits associated with Medicaid eligibility and suggests that policymakers might consider improving access to health care as one of the tools in their arsenal for reducing crime and criminal justice expenditures. The findings might be particularly relevant for states and localities where access to health care is more limited and crime rates are high, including several states in the South. Moreover, to the extent that mental health care helps individuals make fewer errors in judgment or decision making, then access to health care could potentially make traditional policies for reducing crime (such as longer sentence lengths and hiring more police officers) more effective. In other words, those with better mental health are more likely to understand — and be deterred by — the consequences of criminal activity.

The policy that I consider in the cost-benefit calculation is extending Medicaid eligibility to low-income individuals past age 19. Nevertheless, governors, state legislatures, and other policymakers could also consider alternatives. South Carolina already allows for individuals who were formerly in foster care to receive Medicaid coverage until they are 26 (SCDHHS 2021). So policymakers could similarly consider extending Medicaid eligibility for additional years past age 19 for those with a mental health diagnosis or who are using Medicaid’s behavioral health services. Another possibility is implementing a limited benefit program like South Carolina’s Family Planning program — which allows low-income individuals to access family planning-related services — thereby allowing individuals to continue accessing behavioral health services past age 19 despite not being eligible for full insurance coverage. These more targeted policies would likely be less expensive than extending Medicaid eligibility to full cohorts of low-income individuals, although identifying and verifying the subset of beneficiaries would likely impose its own costs.

For states that have already expanded Medicaid eligibility to childless adults, a related policy recommendation would be to ensure that there are sufficient providers of behavioral health services for both Medicaid and non-Medicaid beneficiaries and, in particular, for young adults. Indeed, Medicaid expansions under the Affordable Care Act were associated with longer wait times and difficulty securing appointments, which likely reflects a shortage of medical providers available to treat Medicaid patients (Miller and Wherry 2017). Finally, if extending Medicaid eligibility has already occurred or if it remains politically unworkable, then policymakers might also consider providing or improving access to affordable behavioral health services, through alternative governmental or non-governmental agencies.

Overall, the underlying theme of these policy recommendations is that improving access to mental health care for low-income young men with mental health histories would be a cost-effective way to reduce their contact with the criminal justice system. Young

adults are the group of Americans that are most likely to be uninsured, making them the group that stands most to gain from any future health insurance expansions.

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Elisa Jácome is a SIEPR postdoctoral fellow working on topics in public finance and labor economics. Her research focuses on criminal justice, mental health, and economic mobility.

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