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WHEN THEY HEAR US: RACE, ALGORITHMS AND THE PRACTICE OF CRIMINAL LAW

By: Ngozi Okidegbe*

I. INTRODUCTION

Good morning. Thank you for that wonderful introduction. I would like to thank the editors of the *Kansas Journal of Law and Public Policy* for inviting me here today to speak at this timely symposium about work and the way in which new technologies are affecting work. I think that this symposium has situated itself in a broader conversation about the ways in which new technologies are shaping and reorienting social and legal processes and structures.¹ It is my pleasure to discuss this phenomenon as it relates to race, algorithms, and the practice of criminal law.

Algorithms are transforming the daily practice of criminal law. These algorithms use statistical methods and big data to predict outcomes at different levels of the criminal justice system. Police are using algorithms to predict which individuals are at high risk of committing or being the victim of violence.² Pre-trial algorithms, which are designed to predict the statistical risk of a defendant's risk of flight or pre-trial crime, are being relied upon by bail judges to inform their decision to release or to detain a defendant before trial.³ Sentencing algorithms, that purport to predict an offender's risk of recidivism,

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¹ See generally CATHY O'NEIL, WEAPONS OF MATH DESTRUCTION: HOW BIG DATA INCREASES INEQUALITY AND THREATENS DEMOCRACY (2016); VIRGINIA EUBANKS, AUTOMATING INEQUALITY: HOW HIGH-TECH TOOLS PROFILE, POLICE, AND PUNISH THE POOR (2018).

² Andrew Guthrie Ferguson, *Illuminating Black Data Policing*, 15 OHIO ST. J. CRIM. L. 503, 505–06 (2018).

³ Sandra G. Mayson, *Dangerous Defendants*, 127 YALE L.J. 490, 508–10 (2018) [hereinafter Mayson, *Dangerous Defendants*].

are being used by sentencing judges to determine an offender's sentence or eligibility for a non-prison sentence.⁴ Parole boards are also using algorithms to determine whether to parole inmates.⁵

These algorithms now have a significant impact on the daily lives of all, but particularly on the lives of those ascribed racially marginalized identities, who live in low-income, over-policed, and over-criminalized communities.⁶ These algorithmic predictions produce grave familial, communal, and individual consequences for members of these marginalized communities.⁷ Yet, many jurisdictions have mandated the use of algorithms at one or at all levels of their criminal justice system.⁸ Their use is part of a broader socio-political movement to reform a broken criminal justice system that incarcerates too many people, disproportionately racially marginalized, who could otherwise be released without posing a threat to community safety or the administration of the criminal justice system.⁹

In an effort to address the cost, excess, and socioeconomic and racial disparity in the criminal justice system, political actors have turned to algorithms as a solution to this growing crisis. Those advocating for these algorithms claim that the technology provides an evidence-based assessment of an individual's statistical risk.¹⁰ The idea is that increased reliance on algorithms will improve the criminal justice system by conditioning an individual's apprehension or detention on their statistical risk rather than on the subjective whim of a criminal justice actor.

⁴ Erin Collins, *Punishing Risk*, 107 GEO. L.J. 57, 59–61 (2018); Jessica M. Eaglin, *Constructing Recidivism Risk*, 67 EMORY L.J. 59, 61–63 (2017) [hereinafter Eaglin, *Constructing Recidivism Risk*].

⁵ Cecelia Klingele, *The Promises and Perils of Evidence-Based Corrections*, 91 NOTRE DAME L. REV. 537, 564–67 (2015) (documenting the use of risk assessment for parole hearings).

⁶ EUBANKS, *supra* note 1, at 12 (“Though these new systems have the most destructive and deadly effects in low-income communities of color, they impact poor and working-class people across the color line.”).

⁷ See generally Ngozi Okidegbe, *The Democratizing Potential of Algorithms*, 53 CONN. L. REV. (forthcoming 2021) (manuscript at 18) (on file with author) (“Emerging studies suggest that the formal equality approach of these algorithms harm racially marginalized defendants by subjecting them to risk factors not designed to accurately forecast their risk of flight or crime. By not taking into account the demographic differences in future offending, these algorithms produce inflated risk scores that promote the unfair overincarceration of racially marginalized defendants without any community safety justification.”).

⁸ Eaglin, *Constructing Recidivism Risk*, *supra* note 4, at 61 (“Predictive technologies increasingly appear at every stage of the criminal justice process.”).

⁹ Shaila Dewan & Carl Hulse, *Republicans and Democrats Cannot Agree on Absolutely Anything. Except This.*, N.Y. TIMES (Nov. 14, 2018), <https://www.nytimes.com/2018/11/14/us/prison-reform-bill-republicans-democrats.html> [<https://perma.cc/5G25-5ML6>]; see generally Samuel R. Wiseman, *Bail and Mass Incarceration*, 53 GA. L. REV. 235 (2018).

¹⁰ Mayson, *Dangerous Defendants*, *supra* note 3, at 492–93 (“The core reform goal is to untether pretrial detention from wealth and tie it directly to risk. To accomplish that objective, a growing number of jurisdictions are adopting actuarial risk-assessment tools to sort high-risk from low-risk defendants.”).

Today, we are in the midst of a fraught debate in criminal justice reform circles about the merits of using algorithms. Proponents claim that these algorithms offer an objective path towards substantially lowering high rates of incarceration and racial and socioeconomic disparities without endangering community safety.¹¹ On the other hand, racial justice scholars argue that these algorithms threaten to entrench racial inequity within the system because they utilize risk factors that correlate with historic racial inequities, and in so doing, reproduce the same racial status quo, but under the guise of scientific objectivity.¹²

In this talk, I am going to discuss the challenge that the continued proliferation of algorithms poses to the pursuit of racial justice in the criminal justice system. I start from the viewpoint that racial justice scholars are correct about currently employed algorithms. However, algorithms themselves are not necessarily doomed to propagating the current system. Their effects are a product of their design.

This feature about algorithms is important to think about in our current political climate given that algorithms will continue to proliferate, and more radical measures, such as abolition, appear politically infeasible.¹³ In this context, I advocate that as long as we have algorithms, we should consider whether they could be redesigned and repurposed to counteract racial inequity in the criminal law process. One way that algorithms might counteract inequity is if they were designed by most impacted racially marginalized communities. Then, these algorithms might counterintuitively benefit these communities by endowing them with a democratic mechanism to contest the harms that the criminal justice system's operation enacts on them.

With that in mind, I am going to first discuss the problems with currently employed algorithms from a racial justice perspective. I will then detail the

¹¹ See, e.g., Samuel R. Wiseman, *Fixing Bail*, 84 GEO. WASH. L. REV. 417, 470–72 (2016) (advocating for the development of bail guidelines based in actuarial risk assessment since this could reduce racial disparities). *Id.* (“Because the models make testable predications, the outcomes of which can be tracked, it is possible to detect and correct for disparate impacts.”).

¹² See, e.g., Bernard E. Harcourt, *Risk as a Proxy for Race: The Dangers of Risk Assessment*, 27 FED. SENT’G REP. 237, 237 (2015) (warning that “risk today has collapsed into prior criminal history, and prior criminal history has become a proxy for race. The combination of these two trends means that using risk-assessment tools is going to significantly exacerbate the unacceptable racial disparities in our criminal justice system”).

¹³ An example of the political infeasibility of abolition can be gleaned from the experience in New York State with bail reform. In early April 2020, New York decided to scale back its 2019 bail reform law that had eliminated cash bail for many misdemeanor offenses and non-violent felonies. See NEW YORK STATE DIVISION OF THE BUDGET, FY 2020 NEW YORK STATE EXECUTIVE BUDGET: PUBLIC PROTECTION AND GENERAL GOVERNMENT ARTICLE VII LEGISLATION 182 (2019), <https://www.budget.ny.gov/pubs/archive/fy20/exec/artvii/ppgg-artvii.pdf> [<https://perma.cc/24W4-SS4B>]; Taryn A. Merkl, *New York’s Latest Bail Law Changes Explained*, BRENNAN CTR. FOR JUST. (Apr. 16, 2020), <https://www.brennancenter.org/our-work/analysis-opinion/new-yorks-latest-bail-law-changes-explained> [<https://perma.cc/YZY2-CE RH>].

benefits that these algorithms could have on most impacted communities if designed by them. I will then conclude by sketching out an institutional framework for creating and implementing algorithms in line with achieving this result.

II. RACIAL JUSTICE CRITIQUE

Broadly speaking, currently employed algorithms reproduce the racial status quo for four reasons. The first reason concerns the risk factors of these algorithms. They utilize colorblind risk factors to assess a defendant's statistical riskiness.¹⁴ The cost of this choice is that these algorithms tend to subject defendants to risk factors that are not reliable predictors for their demographic group.

For instance, one of the factors that pre-trial algorithms take into account for assessing pre-trial crime is an individual's arrest record.¹⁵ But empirical studies have shown that arrests are often less accurate predictors of pre-trial crime risk for Black defendants.¹⁶ To compound the issue, members of historically marginalized communities are arrested at higher rates than their white counterparts due to racial profiling.¹⁷ This means that arrest rates are not reflective of criminal offending rates among different demographic groups.¹⁸ These dual issues mean that racially marginalized defendants are more likely to be designated at high risk of crime based on factors that are unreliable predictors of the risk that they in fact pose. This state of affairs only fuels the over-incarceration of racially marginalized people rather than redresses it.

The second problem with these algorithms is that these algorithms ignore the socio-political conditions that give rise to crime and flight and its management with incarceration. An individual's risk of crime is often the product of systemic but often changeable factors.¹⁹ For instance, a robust

¹⁴ Currently employed algorithms tend not to use race or racial information as inputs. Okidegbe, *supra* note 7, at 15.

¹⁵ See, e.g., STANFORD LAW SCH., RISK ASSESSMENT FACTSHEET: CORRECTIONAL OFFENDER MANAGEMENT PROFILING FOR ALTERNATIVE SANCTIONS (COMPAS) PRETRIAL RELEASE RISK SCALE - II (PRRS-II) (2019), <https://www-cdn.law.stanford.edu/wp-content/uploads/2019/06/COMPAS-PRRS-II-Factsheet-Final-6.20.pdf>.

¹⁶ See, e.g., Richard Berk, *Accuracy and Fairness for Juvenile Justice Risk Assessments*, 16 J. EMPIRICAL LEGAL STUD. 175, 185–86 (2019).

¹⁷ Paul D. Butler, *Poor People Lose: Gideon and the Critique of Rights*, 122 YALE L.J. 2176, 2183 (2013) (“The spaces that poor people, especially poor African Americans, live in receive more law enforcement in the form of police stops and arrests.”).

¹⁸ For a deeper discussion regarding the disproportionate rate of Black arrests, see CIVIL RIGHTS DIVISION, U.S. DEP'T OF JUSTICE, INVESTIGATION OF THE BALTIMORE CITY POLICE DEPARTMENT 3 (2016), <https://www.justice.gov/crt/file/883296/download> [<https://perma.cc/J7UB-TPM2>].

¹⁹ Jessica M. Eaglin, *Technologically Distorted Conceptions of Punishment*, 97 WASH. U. L. REV. 483, 507 (2019) [hereinafter Eaglin, *Conceptions of Punishment*] (“[Risk assessment tools] grew from a larger initiative to address the sociohistorical conditions that produce crime through a one-

social assistance program could reduce an individual's risk of committing crime. The risk that a defendant might fail to appear at a bail hearing or a trial could be counteracted if that jurisdiction adopted a system of court reminders.²⁰ But by failing to account for these potential systematic reforms, the algorithm inevitably treats conditions on the ground that correlate with flight and crime as constant and unalterable. Moreover, when we rely on algorithmic predictions in isolation, we allow ourselves as a society to ignore the socio-political context of crime and to exculpate ourselves from our responsibility in creating and maintaining the conditions that give rise to risk.²¹ They allow us to pretend that crime risk is solely the fault of an individual's behavior or characteristics, even though it is societally constructed. From a racial justice perspective, algorithms that are blind to these realities operate only to obscure and maintain carceral conditions that give rise to racial tropes and to the over-incarceration crisis.

The third problem with currently employed algorithms is their disregard for the harms that an individual's apprehension or detention engender. However, apprehension or detention risks an individual's bodily, mental, and economic integrity. Moreover, detention risks destabilizing the defendant's family unit's social kinship networks and finances. And for the community that the defendant is part of, detention harms community safety by destabilizing that defendant and reducing their prospect of financial and social reintegration following their detention.²² Despite the risks and harms associated with apprehension and detention, currently employed algorithms ignore them. This leads to the apprehension and detention of individuals whose removal from the community produces harms that jeopardize the safety of their families and their communities. For this reason, it is difficult to imagine how the greater use of algorithms will decrease the negative externalities of incarceration and mass surveillance on these communities.

The final problem is that the majority of the jurisdictions that have turned to algorithms have chosen to employ privately owned and developed ones.²³

sided approach focused on controlling the individual's behavior rather than simultaneously addressing social conditions in society.”).

²⁰ See John Logan Koepke & David G. Robinson, *Danger Ahead: Risk Assessment and the Future of Bail Reform*, 93 WASH. L. REV. 1725, 1765 (2018) (“Small changes in the administration of bail can have a substantial impact on failure to appear rates in a jurisdiction. Many of these reforms are relatively low-cost and low-tech, such as text message reminders about upcoming court dates.”).

²¹ See generally Eaglin, *Conceptions of Punishment*, *supra* note 19.

²² Crystal S. Yang, *Toward an Optimal Bail System*, 92 N.Y.U. L. REV. 1399, 1425–28 (2017); see generally Dorothy E. Roberts, *The Social and Moral Cost of Mass Incarceration in African American Communities*, 56 STAN. L. REV. 1271, 1281–96 (2004).

²³ Hannah Bloch-Wehba, *Access to Algorithms*, 88 FORDHAM L. REV. 1265, 1286 (2020) (contending that “state legislatures and court systems that adopt new risk assessment tools frequently procure them from foundations or the private sector, raising questions about transparency”).

These algorithms lack transparency, accountability mechanisms, and do not reflect the views of most impacted communities. The omission of communal input is particularly concerning because those most impacted by these algorithms' utilization should be the ones to have a say about how these algorithms operate. This contribution is unlikely to occur if algorithms remain designed exclusively by the private sector.

III. A NEW APPROACH

For this reason, the algorithms currently in existence pose a critical threat to eradicating racial inequities in the criminal law process and should be eliminated. One counterargument that has been put forth by those outside of racial justice circles is that these algorithms should remain in use because they are better than the current system.²⁴ In support of this view, they point out that criminal justice actors themselves tend to make arbitrary, ill-informed, and often racially biased decisions that have culminated in the current crisis of racialized mass incarceration and mass surveillance.²⁵ To this point, it is true that racial inequities are endemic in the criminal justice system with or without algorithms. However, these algorithms have the same racist pathologies that criminal justice actors suffer from, but they appear objective. This enables these algorithms to produce the same racial inequities as criminal justice actors but under the guise of scientific neutrality. This state of affairs makes it harder to contest the racism embedded in algorithmic systems, and perversely allows algorithms to legitimate existing racial disparities.

Given this, resistance to currently employed algorithms should continue. However, mere resistance will not, I fear, result in their dismantlement. This is because algorithms are part of a socio-technical phenomenon in which political actors are turning to inexpensive technological shortcuts to solve complex societal problems. Algorithms are everywhere, from banking to healthcare, from hiring to surveillance. The proliferation of algorithms is likely to continue. In the face of continued algorithmic governance, what should be the racial justice response?

Because the racial effects of currently employed algorithms are not endemic to the technology and stem from a series of design choices, it is worth considering whether we could redesign algorithms against the reproduction of the current racial status quo. This potential is realizable if these algorithms were designed, implemented, and overseen by those hailing from most impacted communities. In other words, the solution is to change who controls these algorithms by situating most impacted communities into algorithmic governance.

²⁴ Sam Corbett-Davies et al., *Even Imperfect Algorithms Can Improve the Criminal Justice System*, N.Y. TIMES (Dec. 20, 2017), <https://www.nytimes.com/2017/12/20/upshot/algorithms-bail-criminal-justice-system.html> [<https://perma.cc/D8P8-2GBZ>].

²⁵ *Id.*

I am going to focus specifically on three potential benefits of this approach.

A. *Democratization Potential*

The first benefit concerns democratization. By democratization, I mean that including racially marginalized communities in algorithmic governance has the power to shift control over the criminal justice system downward towards communities historically harmed and politically disempowered by the system.

This downward shift in power may not necessarily change outcomes, but it matters because the historical and current operation of the criminal justice system has been in service to the interests of wealthier and whiter communities to the exclusion of racially marginalized communities.²⁶ As a result, the system is designed to promote the over-policing and over-incarceration of racially marginalized communities without recognition of the democratic costs that over-incarceration enacts on these communities. Yet over-incarceration hampers these communities' collective ability to participate in democratic structures by denying voting rights and financial security to a large proportion of their community members.²⁷ This functions to deny members of these communities full political, economic, and social citizenship in this country.²⁸ To compound this issue, these harms also strip these communities of the resources required to effectively contest policing and incarceration practices through traditional democratic processes.²⁹

²⁶ Jocelyn Simonson, *The Place of "the People" in Criminal Procedure*, 119 COLUM. L. REV. 249, 252 (2019) ("[T]he ideology of criminal procedure facilitates the exclusion of marginalized communities from everyday criminal adjudication."); K. Sabeel Rahman & Jocelyn Simonson, *The Institutional Design of Community Control*, 108 CALIF. L. REV. (forthcoming June 2020) (manuscript at 15) ("[I]n the realm of criminal law, there is a toxic interaction between systems of mass incarceration, state austerity, privatization, and continued racial subordination and exclusion."); Jocelyn Simonson, *Police Reform through a Power Lens*, 130 YALE L.J. (forthcoming 2021) (contending that shifting power to communities most impacted by incarceration does not guarantee any particular outcome though such power-shifting is reparative and consistent with anti-subordination principles).

²⁷ Dorothy E. Roberts, *Constructing a Criminal Justice System Free of Racial Bias: An Abolitionist Framework*, 39 COLUM. HUM. RTS. L. REV. 261, 266 (2008) [Roberts, *Constructing a Criminal Justice System*] ("[The] criminal justice supervision of a large proportion of black people interferes with their participation in democracy by isolating them in prisons, denying them the right to vote, and damaging broader social and political relationships necessary for collective action.").

²⁸ Dorothy E. Roberts, *Democratizing Criminal Law as an Abolitionist Project*, 111 NW. U. L. REV. 1597, 1602 (2017) ("Moreover, the criminal justice system's supervision of black communities has a disempowering impact that extends far beyond electoral politics. Incarcerating so many members of black communities robs them of material resources, social networks, and legitimacy required for full political citizenship and for organizing local institutions to contest repressive policies.").

²⁹ *Id.*

However, direct inclusion in algorithmic governance offers a workaround to this democratic exclusion. Because of the growing importance of these algorithms in criminal procedure, inclusion in algorithmic governance could mean incorporating these communities' views into criminal law practice and policy. It could thus provide these communities with a mechanism to contest their historical exclusion in the creation and implementation of criminal law practices and policies.³⁰ Moreover, this inclusion may endow these community members with a mechanism to fundamentally change how the system works in their neighborhoods. This change could radically reorient the system to be in line with communal goals and aims.

B. Accountability

The second benefit concerns accountability. Currently, most impacted communities have a diminished capacity to influence or hold accountable criminal justice actors and others responsible for the over-incarceration of their community members. This is because of most impacted communities' reduced political power to influence elections or appointment processes.³¹ However, their inclusion in algorithmic governance might promote accountability by providing a means by which to render criminal justice actors and other officials responsive to their interests and needs. This facilitation of accountability could transform these communities from the objects of the criminal justice system into its subjects and partial controllers.

C. Less Racially Disparate Factors

The final benefit of direct inclusion in algorithmic governance is the possibility that these communities' expertise could render algorithms less racially disparate. Unlike the technocrats traditionally involved in algorithmic design, most impacted communities possess experiential knowledge about how the criminal system operates in their neighborhoods.³² If harnessed, this expertise could assist in identifying risk factors within currently employed algorithms that promote the over-policing and the over-incarceration of their community members at the expense of their communities' safety and cohesion. These communities' expertise could also be used to identify and prevent the detention of defendants most likely to be harmed by the experience.

³⁰ Jocelyn Simonson, *Democratizing Criminal Justice through Contestation and Resistance*, 111 NW. U. L. REV. 1609, 1610 (2017) (“[T]he unequal distribution of political power means that the resulting criminal laws and enforcement are rarely responsive to the interests of the poor populations of color most likely to come into contact with the system as arrestees, defendants, or victims.”).

³¹ Roberts, *Constructing a Criminal Justice System*, *supra* note 28, at 1597 (contending that the criminal justice system's operation reduces the political power of black people to elect candidates that would promote their interest).

³² For an in-depth discussion, see generally Ngozi Okidegbe, *Discrediting Communal Knowledge Within an Algorithm Epistemology* (unpublished manuscript) (on file with author).

These three possibilities illustrate that algorithms, if designed as part of an anti-racist project, could play a substantial role in disrupting and contesting racial stratification in the criminal justice system. If my proposal is actualized, these algorithms could become a viable tool for communities to secure transformative change.

IV. CONCLUSION

I will conclude by discussing the institutional framework that could usher in the creation of algorithms that could unlock these potential racial justice benefits. The crux of my proposal is the creation of criminal justice commissions composed of members from most impacted communities and technocrats charged with creating the formula of any algorithm used in the criminal justice system. Institutional design choices could facilitate the sharing of power between community commissioners and technocrats. In terms of composition, I propose selecting community commissioners from those with direct experience with the criminal justice system, such as formerly incarcerated individuals or victims of crimes. This proximate relationship ensures that community commissioners possess the experiential expertise about the system's operation needed to blunt its racialized effects. Importantly, these algorithms would have a harm reduction component that would incorporate factors weighing against an individual's apprehension or detention and would take into account the individual, familial, and communal consequences of so doing. One such harm reduction factor could be the fact that the defendant is the primary caregiver of a minor child. The power over the harm reduction component should rest in the hands of community commissioners.

Beyond this, the actualization of the proposal should spark a deeper conversation about the purpose of the criminal justice system. Though these conversations are already underway in legislatures across the country, the viewpoints of most impacted communities remain largely disregarded and unacted upon. Yet, these criminal justice commissions could change that by opening up criminal justice policy and the concept of community safety and of risk to be inclusive of all constituents involved, those hailing from low income racially marginalized communities.

It is important to note that this proposal does not guarantee the end of over-incarceration. That could only be guaranteed by complete decarceration or abolition of the criminal justice apparatus. However, until either those options are achieved, the proliferation of algorithms demands creative thinking around how best to avoid their racially disparate effects. An approach that only critiques algorithms without considering what they could achieve in anti-racist projects is becoming increasingly unsustainable, especially since these algorithms are here to stay. Furthermore, an approach that does not allow community members to change these algorithms serves only to perversely prevent these communities from influencing the algorithms threatening their safety. When viewed in the present-day context, the approach fails to offer a

way forward if opposition to algorithms is unsuccessful. The hope of this talk and my work is to start a conversation about the need for a multifaceted approach to addressing the dangers that algorithms pose to racially marginalized communities.