

TECHNOLOGICALLY DISTORTED CONCEPTIONS OF PUNISHMENT

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ABSTRACT

Much recent work in academic literature and policy discussions suggests that the proliferation of actuarial—meaning statistical—assessments of a defendant’s recidivism risk in state sentencing structures is problematic. Yet scholars and policymakers focus on changes in technology over time while ignoring the effects of these tools on society. This Article shifts the focus away from technology to society in order to reframe debates. It asserts that sentencing technologies subtly change key social concepts that shape punishment and society. These same conceptual transformations preserve problematic features of the sociohistorical phenomenon of mass incarceration. By connecting technological interventions and conceptual transformations, this Article exposes an obscured threat posed by the proliferation of risk tools as sentencing reform. As sentencing technologies transform sentencing outcomes, the tools also alter society’s language and concerns about punishment. Thus, actuarial risk tools as technological sentencing reform not only excise society’s deeper issues of race, class, and power from debates. The tools also strip society of a language to resist the status quo by changing notions of justice along the way.

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TABLE OF CONTENTS

INTRODUCTION.....	484
I. THE RISE OF ACTUARIAL RISK TOOLS TO ADDRESS THE PRESSURES OF MASS INCARCERATION	489
A. <i>Actuarial Risk Tools as Sentencing Reform</i>	490
B. <i>The Technological Advancement Narrative</i>	496
C. <i>The Narrative’s Shortcoming</i>	501
II. DESTABILIZING THE STANDARD NARRATIVE: FROM PAROLE GUIDELINES TO ACTUARIAL RISK TOOLS.....	503
A. <i>The Decline of Human-Driven Punishment</i>	505
B. <i>Partially Automated Sentencing Technologies</i>	508
1. <i>Parole Guidelines</i>	508
2. <i>Sentencing Guidelines</i>	512
C. <i>Actuarial Tools Revisited</i>	515
III. ILLUMINATING THE COUNTERNARRATIVE: MUTATING SOCIAL CONCEPTS AROUND TECHNOLOGIES	517
A. <i>“Rehabilitation” and the Theoretical Obfuscation of Incapacitation</i>	517
B. <i>Uniformity, Structural Racism, and Technical Formalism</i>	523
C. <i>From Dangerousness to Recidivism Risk</i>	529
IV. REFRAMING THE RISE OF RISK TOOLS AT SENTENCING.....	533
A. <i>The Politics of Narrative</i>	534
B. <i>Combatting the Standard Narrative, Expanding Debates</i>	539
CONCLUSION	542

INTRODUCTION

Actuarial risk tools are statistical assessments designed to predict a defendant’s likelihood of engaging in recidivism in the future. The tools are controversial, and much ink has been spilled on their use at sentencing. This Article challenges a common justification for tool use advanced by proponents: that actuarial risk assessments are nothing new to sentencing, historically speaking. From the “golden era” of clinical rehabilitation in the 1960s, to the creation of parole guidelines in the 1970s, to the creation of sentencing guidelines in the 1980s, policymakers have embedded actuarial risk assessments in the technologies we create to shape punishment outcomes. Proponents use this reality to justify the expansion of statistically robust actuarial risk tools as sentencing reform today. The argument goes like this: These tools are simply better at doing what humans already try to do. What’s more, advocates claim, the tools may be used for a beneficent

purpose—to address unnecessary reliance on incarceration in a pragmatic way. Since the tools have improved and can continue to improve technically, why not use them?

This Article complicates that argument. Sentencing technologies do not just do what humans do. They change how society understands what we do by altering the meaning of social concepts that shape our human interactions.¹ This Article examines how three social concepts—rehabilitation, racial equality, and dangerousness—have altered through the obsessive pursuit of technological advancement at sentencing. It connects the conceptual changes with critical social transformations that sustain the sociohistorical phenomenon of mass incarceration. This includes increased castigatory government surveillance in marginalized communities, resignation to racialized punishment practices, and legitimation of the expanding net of the carceral state. By illuminating obscured transformations, this Article provides foundation to reframe and expand debates about technological sentencing reforms going forward.

Since the 1960s, states have incorporated risk assessments into the punishment technologies meant to shape sentencing outcomes. Recently, lawmakers, scholars, and policymakers have encouraged states to adopt more statistically robust actuarial risk tools as sentencing reform.² These tools rely on data observing and aggregating offenders' behavior in the past to predict an individual defendant's behavior in the future.³ From an empirical standpoint, it is not clear that the tools reduce crime or incarceration.⁴ Indeed, there is every reason to believe that increasing

1. See generally BERNARD E. HARCOURT, *AGAINST PREDICTION: PROFILING, POLICING, AND PUNISHING IN AN ACTUARIAL AGE* (2007) [hereinafter *AGAINST PREDICTION*]; BERNARD E. HARCOURT, *ILLUSION OF ORDER: THE FALSE PROMISE OF BROKEN WINDOWS POLICING* (2001) [hereinafter *ILLUSION OF ORDER*]; MICHEL FOUCAULT, *DISCIPLINE AND PUNISH: THE BIRTH OF THE PRISON* (Alan Sheridan trans., 1977).

2. See, e.g., Jared Kushner, *The Trump Administration's Commitment to Justice Reform*, in *ENDING MASS INCARCERATION: IDEAS FROM TODAY'S LEADERS* 57, 57–59 (Inimai Chettiar & Priya Raghavan eds., 2019), https://www.brennancenter.org/sites/default/files/publications/2019_EndingMassIncarceration_digital.pdf [<https://perma.cc/4SD9-2HUV>] (endorsing the use of risk assessments and “evidence-based” interventions in criminal justice reform and hailing the First Step Act for introducing tools to the federal system); *Evidence-Based Sentencing*, CTR. FOR SENT'G INITIATIVES, <https://www.ncsc.org/microsites/csi/home/Evidence-Based-Sentencing.aspx> [<https://perma.cc/3XRH-9DM2>] (policymakers); J.C. Oleson, *Risk in Sentencing: Constitutionally Suspect Variables and Evidence-Based Sentencing*, 64 *SMU L. REV.* 1329, 1336–37 (2011) (encouraging use of actuarial risk tools at sentencing).

3. See, e.g., PA. COMM'N ON SENTENCING, *RISK/NEEDS ASSESSMENT PROJECT: INTERIM REPORT 4: DEVELOPMENT OF RISK ASSESSMENT SCALE 2* (2012), <http://pcs.la.psu.edu/publications-and-research/research-and-evaluation-reports/risk-assessment/phase-i-reports/interim-report-4-development-of-risk-assessment-scale/view> [<https://perma.cc/PBE9-CQYR>].

4. See, e.g., JENNIFER K. ELEK ET AL., CTR. FOR SENTENCING INITIATIVES, *USING RISK AND NEEDS ASSESSMENT INFORMATION AT SENTENCING: OBSERVATIONS FROM TEN JURISDICTIONS* app. (2015), <https://www.ncsc.org/~media/Microsites/Files/CSI/RNA%202015/Final%20PEW%20Report%20updated%2010-5-15.ashx> [<https://perma.cc/VE9R-5EAP>] (reporting ambivalent results from

emphasis on risk will not reduce crime *or* incarceration.⁵ Yet tools continue to proliferate as a pragmatic and “smart” sentencing reform in the face of growing bipartisan pressures to reduce reliance on incarceration.⁶

Several debates swirl around tool proliferation as a policy matter, in scholarship, and in the courts.⁷ These debates are shaped by what this Article describes as the standard narrative of technological advancement. Advocates suggest that integrating this technology into the sentencing process is a natural step; an automated assessment of risk improves upon clinical—meaning unstructured—risk assessments and ensures the efficient allocation of resources.⁸ These claims fit within the standard narrative about technology and society: technological improvements make tool use more acceptable and in fact preferable to human judgment. Logically, then, debates focus on whether and what makes tools more or less technically accurate. If the tools are accurate, or at least more accurate than older iterations, then their value at sentencing appears impervious.

Yet, this Article argues that current debates about actuarial risk tools as sentencing reform are incomplete. Sentencing technologies have an effect on society that current debates fail to consider. This Article asserts that technological sentencing reforms change the social concepts that shape punishment and society. It identifies pivotal shifts in the meaning of socially conceived ideas central to punishment *spurred by the introduction of technology itself*.⁹ In analyzing the social mutations, this Article demonstrates two points: (1) the conceptual shifts sustain further

implementing a risk-and-needs tool at sentencing); Megan Stevenson & Jennifer Doleac, *Algorithmic Risk Assessment in the Hands of Humans* (Feb. 6, 2019) (on file with author) (providing similar results for state of Virginia).

5. Actuarial risk tools at sentencing are sometimes discussed as “evidence-based sentencing.” This term is misleading as it suggests that (1) judges do not consider evidence at sentencing already; and (2) the tools are supported by evidence that their use reduces crime. The first is patently false and the second is not borne out by data. In fact, there is reason to believe emphasis on risk *will not* reduce crime. See AGAINST PREDICTION, *supra* note 1. This Article will not perpetuate those misconceptions, and so it does not use the term. For insight to how “rehabilitative” risk tools may not reduce the pressures of mass incarceration, see Jessica M. Eaglin, *Against Neorehabilitation*, 66 SMU L. REV. 189 (2013) [hereinafter Eaglin, *Against Neorehabilitation*]. For a study illustrating that implementing risk tools has not reduced overall incarceration in Virginia, see Stevenson & Doleac, *supra* note 4.

6. See *infra* Part I.A.

7. See *infra* Part I.B.

8. By clinical, I mean a model of prediction or diagnosis that is unstructured and primarily relies on the subjective judgment of an individual decisionmaker. See *infra* note 35 and accompanying text. For critiques that encourage risk tools as part of a path towards modernizing sentencing, see Richard P. Kern & Mark H. Bergstrom, *A View from the Field: Practitioners’ Response to Actuarial Sentencing: An “Unsettled” Proposition*, 25 FED. SENT’G REP. 185, 186 (2013) (noting that actuarial risk tools fit into a modern trend toward prioritizing crime reduction and cost savings); Jordan M. Hyatt et al., *Reform in Motion: The Promise and Perils of Incorporating Risk Assessments and Cost-Benefit Analysis into Pennsylvania Sentencing*, 49 DUQ. L. REV. 707, 711–13 (2011) (emphasizing that formalized risk predictions can save Pennsylvania money while improving current sentencing practices).

9. See *infra* Part I.C.

technological expansion; and (2) these conceptual shifts also obscure and legitimate problematic features of the sociohistorical phenomenon of mass incarceration. Thus, this Article concludes that actuarial risk tools as sentencing reform present a deeper threat than advocates or critics currently acknowledge.¹⁰ As a technological sentencing reform, the tools threaten to strip society of the language to resist the status quo. By changing our conceptions of justice, the tools alter the foundation to critique societal problems sustaining mass incarceration.

This Article identifies and analyzes three social concepts that were altered through the proliferation of sentencing technologies. First, “rehabilitation” changed. Once connoting an egalitarian notion of reintegration and reform, the concept now refers to behavior management through government surveillance. The introduction of technology hollowed out this social concept. It now shares striking resemblance to incapacitation, meaning removal of the opportunity to commit crime in the future through punitive intervention. Yet because the term retains its positive association, society is less willing to critically engage with risk tools’ advance. It also naturalizes the expansion of castigatory government surveillance into marginalized communities. Second, the meaning of racial justice mutated. The term once referred to concerns about arbitrary sentencing and the impact of racialized inequities on sentence outcomes. The introduction of sentencing technologies facilitated interpreting those inequities as natural. As such, sentencing technologies reified structural racism under the auspice of scientific objectivity. It also deified “technical formalism”—meaning here a resistance to engagement with tools in the context of societal realities. This has reduced the normative basis to limit sentencing technologies. It also legitimates the survival of racialized punishment practices that disproportionately affect minorities. Third, the terms danger and risk converged in social meaning. Whereas the two words once had different meanings, they are now considered the same concept in the context of punishment. This conflation strips society of the ability to discern a distinction between threat of actual harm and transformations in the realities of punishment and society. It also legitimates the expansion of the carceral net.

By illuminating these conceptual changes, this Article provides an important but underappreciated reason to resist risk tools as sentencing reform. In historical context, enthusiasm for the proliferation of statistically robust actuarial risk tools now generates from a persistent tendency to seek

10. *But see* AGAINST PREDICTION, *supra* note 1, at 188–92 (critiquing how the actuarial paradigm changes notions of justice). This Article expands on Harcourt’s insight in two ways. First, it critiques the rise of actuarial risk tools in the context of technological sentencing reforms more broadly. Second, it specifies and analyzes transformations in social concepts that inform notions of justice.

technical solutions to sociopolitical problems laid bare at sentencing. Some consider this as the tools' strength as sentencing reform.¹¹ These advocates suggest that actuarial risk tools provide a foundation for a bipartisan and depoliticized shift away from mass incarceration. Such claims, even if offered for a beneficent purpose, are a ruse. Implementing risk tools has costs we all bear—it changes us. Institutionalizing actuarial risk assessments threatens to diffuse political momentum for broader reform by excising social issues from debates. Worse still, sentencing technologies change the language with which society understands human interactions. For those who genuinely want to address the sociohistorical phenomenon of mass incarceration as the status quo, the language to do so is more limited. “Fixing the tools” cannot fix this pernicious but unquantifiable outcome.¹² Thus, this Article urges advocates and lawmakers to resist this reform despite its bipartisan appeal. It also raises broader issues of punishment and society implicated by risk tools' proliferation but obscured from current debates by the standard narrative. This includes the effect of automation inside and outside the punishment context and its relationship to a shifting governmentality.

Ultimately, this contribution invites a more holistic discussion of sentencing reforms on the basis of our human values, not technological possibilities. In the process, it enters three pressing discussions about punishment and society. First, this Article connects scholars critiquing pragmatic criminal justice reforms with those critiquing technological reforms.¹³ In connecting the literatures, this contribution highlights that the concerns of technological reforms are deeper than just stalling broader reforms. The concern lies in changing our conceptions of justice. Second, it speaks to scholars critiquing the actuarial shift. It is not enough to destabilize risk tools by analyzing their effects on individual defendants. This Article encourages a shift in focus to destabilize tools' effects on

11. See, e.g., JOHN F. PFAFF, *LOCKED IN: THE TRUE CAUSES OF MASS INCARCERATION—AND HOW TO ACHIEVE REAL REFORM 198–201* (2017) (encouraging adoption of actuarial risk tools as sentencing reform); Kevin R. Reitz, “*Risk Discretion*” at *Sentencing*, 30 *FED. SENT’G REP.* 68 (2017) (encouraging domestication of statistically robust risk tools in sentencing structures).

12. For a deeper discussion of the policy issues raised in developing risk tools for sentencing, see Jessica M. Eaglin, *Constructing Recidivism Risk*, 67 *EMORY L.J.* 59 (2017) [hereinafter Eaglin, *Constructing*].

13. For a critique of pragmatic sentencing reforms, see Benjamin Levin, *The Consensus Myth in Criminal Justice Reform*, 117 *MICH. L. REV.* 259, 268–71 (2018) [hereinafter Levin, *Consensus Myth*] (distinguishing between “over” and “mass” reforms). For a critique of technological reforms that undercut larger debates about punishment and society, see Amna A. Akbar, *Toward a Radical Imagination of Law*, 93 *N.Y.U. L. REV.* 405, 465–70 (2018) (critiquing police surveillance technologies as detracting from necessary police reform). See generally MICHELLE ALEXANDER, *THE NEW JIM CROW: MASS INCARCERATION IN THE AGE OF COLORBLINDNESS* 222, 226–31 (2010) (critiquing pragmatic criminal justice reforms that avoid race and emphasizing that without structural reforms mass incarceration as a system of subordination will rebound in new form).

society over time. Finally, this intervention joins a growing movement to recharge the humanities—here history and rhetoric—in the fight against mass incarceration.¹⁴ It demonstrates the need to find a language to discuss this sociohistorical phenomenon that is broad enough to critique society, too. Though “bottom up” empirical literature can offer important insight to how law and technology interact on the ground, it means little without a language to give those outputs meaning. By challenging a reform where debate is dominated by discourse on statistical methods, this Article offers an important illustration of need for that complementary humanist approach.

This Article unfolds in four parts. Part I introduces risk tools as a sentencing reform and frames key debates about tools in the context of the standard narrative about technological advancement. Part II destabilizes that narrative. By examining the rise of actuarial risk assessments in previous sentencing technologies since the 1960s to today, it illuminates obscured social debate and context for the tools’ advance. Part III offers the substance of the counternarrative. It highlights transformations to social concepts through and alongside the expansion of technological infrastructure. Part IV discusses the value of this counternarrative and reframes debate for broader discourse on punishment and society going forward.

I. THE RISE OF ACTUARIAL RISK TOOLS TO ADDRESS THE PRESSURES OF MASS INCARCERATION

With more than 1.5 million people in prison and the majority individuals of color, the United States remains squarely within the crisis of mass incarceration.¹⁵ Since the 2000s, law and policymakers have been forced to

14. See Benjamin Levin, *Rethinking the Boundaries of “Criminal Justice,”* 15 OHIO ST. J. CRIM. L. 619, 631–37 (2018) (reviewing THE NEW CRIMINAL JUSTICE THINKING (Sharon Dolovich & Alexandra Natapoff eds., 2017) and reflecting on methodological approaches to criminal justice critiques and celebrating engagement from the humanities); Sara Mayeux, *The Idea of “The Criminal Justice System,”* 45 AM. J. CRIM. L. 55, 88–92 (2018) (noting the increasing role of historians in shaping legal and social discourse on mass incarceration).

15. Between 1970 and 2010, the number of people incarcerated in state and federal prisons jumped from 196 thousand to more than 1.6 million. Compare BUREAU OF JUSTICE STATISTICS BULLETIN, PRISONERS 1925–81, at 2 tbl.1 (1982), with E. ANN CARSON, BUREAU OF JUSTICE STATISTICS, PRISONERS IN 2016, at 3 tbl.1 (2018). In 1950, the United States incarcerated just over 166 thousand people; today it incarcerates 1.5 million. See BUREAU OF JUSTICE STATISTICS BULLETIN, *supra* note 15, at 2 tbl.1; CARSON, *supra* note 15, at 3 tbl.1. In 1978, the prison population was 51 percent white, see BUREAU OF JUSTICE STATISTICS BULLETIN, *supra* note 15, at 4 tbl.3; today it is almost 60 percent black and brown, see CARSON, *supra* note 15, at 5 tbl.3. Though minimal decreases have occurred in recent years, these reductions are largely attributed to court order for reductions in California’s prison population, see *Brown v. Plata*, 563 U.S. 493 (2011), and federal sentencing guideline revisions for the reduction of drug sentences, see Jessica M. Eaglin, *The Drug Court Paradigm*, 53 AM. CRIM. L. REV. 595 (2016) [hereinafter Eaglin, *Paradigm*]. Like the overall number of prisoners, the racial disparities in prisons remains relatively stable compared to its exponential increase in recent decades.

confront the pressures mass incarceration places on the states.¹⁶ In the process, “mass incarceration” has transformed into two overlapping but diverging concepts. Some identify mass incarceration as a sociohistorical phenomenon within which the criminal justice system has expanded and facilitated the massive surveillance and incarceration of the U.S. population with a particular focus on black communities in urban centers.¹⁷ Others identify it as a social and economic mishap of incarcerating too many people for too long for no good public safety reason.¹⁸ Though divergent in both solutions and approach, “mass incarceration” is increasingly referred to as a social problem that demands a bipartisan solution.¹⁹

A common bipartisan solution offered to address the pressures of mass incarceration at sentencing is the expansion of actuarial risk assessment tools.²⁰ This Part describes the advance of actuarial risk tools at sentencing in relation to mass incarceration. Section A describes the proliferation of actuarial risk tools as a pragmatic sentencing reform in recent years. Section B introduces the technological advancement narrative that shapes discourse on the tools as a legitimate sentencing reform in policy debates, court rulings, and scholarship. Section C identifies this standard narrative’s shortcomings.

A. Actuarial Risk Tools as Sentencing Reform

Actuarial risk tools are meant to standardize not the sentence outcome but the assessment of recidivism risk. The tools rely on static and dynamic “risk factors” to standardize the assessment of the defendant’s likelihood of

16. For explanation of the dynamics that make the states, more so than the federal government, susceptible to economic pressures to confront the cost of corrections, see Rachel E. Barkow, *Panel Four: The Institutional Concerns Inherent in Sentencing Regimes: Federalism and the Politics of Sentencing*, 105 COLUM. L. REV. 1276, 1305–06 (2005).

17. See generally ALEXANDER, *supra* note 13; LOÏC WACQUANT, *PUNISHING THE POOR: THE NEOLIBERAL GOVERNMENT OF SOCIAL INSECURITY* (2009); JONATHAN SIMON, *GOVERNING THROUGH CRIME: HOW THE WAR ON CRIME TRANSFORMED AMERICAN DEMOCRACY AND CREATED A CULTURE OF FEAR* (2007).

18. See Michael Waldman, *Foreword* to *ENDING MASS INCARCERATION: IDEAS FROM TODAY’S LEADERS*, at vii, vii–viii (Inimai Chettiar & Priya Raghavan eds., 2019), https://www.brennancenter.org/sites/default/files/publications/2019_EndingMassIncarceration_digital.pdf [<https://perma.cc/4SD9-2HUV>]; PFAFF, *supra* note 11, at 8 (“The criticisms over ‘mass incarceration’ essentially boil down to claims that we have too many people in prison . . . and that we should reduce that number . . .”).

19. Levin, *Consensus Myth*, *supra* note 13, at 262 (noting overlap and emphasizing significance in distinction).

20. See, e.g., Cecelia Klingele, *The Promises and Perils of Evidence-Based Corrections*, 91 NOTRE DAME L. REV. 537, 539 (2015) (summarizing trends in sentencing and corrections). Note two caveats here. First, actuarial risk tools are entering a variety of criminal justice contexts that are simply outside the scope of this Article. For example, whether and how risk tools fit into pretrial detention proceedings is not germane to the critique launched here, even if the implications of this project may overlap. Second, introducing risk tools to sentencing is a *common*, but not the *only* and not yet *necessary* reform either. See *infra* Part IV.A.

engaging in specified behavior defined as “recidivism” in the future. Risk factors can include anything that statistically correlates with the occurrence of behavior defined as recidivism in observations of previously arrested or convicted individuals. Common “static” factors—meaning those that cannot be changed—include gender, age, and criminal history.²¹ Common “dynamic” factors—meaning those that can be changed through interventions—include antisocial attitudes, drug dependency, family ties, social affiliation, education, and employment.²² Based on the presence or absence of various factors accorded a predetermined weight, the tools estimate individual defendants’ “recidivism risk.”

Tools vary in how they define recidivism, which is a fluid concept in the criminal justice system.²³ For purposes of this discussion, the most common tools used at sentencing define recidivism as the likelihood of an individual being rearrested for any behavior within a few years of release.²⁴ Actuarial tools rely on this previously collected data to produce a quantitative estimate that people who share the defendant’s characteristics will engage in specified behavior in the future.²⁵ That estimate is derived from a standardized assessment of various static and dynamic factors selected on the basis of empirical research, convenience, and social policy.²⁶ Court

21. See Eaglin, *Constructing*, *supra* note 12, at 72 n.59.

22. See *id.*

23. See *id.* at 75–78 (discussing various options and significance at sentencing).

24. Many actuarial risk tools used in the states classify defendants according to likelihood of engaging in criminal behavior in the future. See *id.* at 75–78 (describing the definition used in various tools used at sentencing). Some jurisdictions use “risk-and-needs assessment” tools as well. See Francis T. Cullen, *Rehabilitation: Beyond Nothing Works*, 42 CRIME & JUST. 299, 349 (2013) (discussing the risk-need-responsivity, or “RNR,” paradigm in corrections); PEW CTR. ON THE STATES, RISK/NEEDS ASSESSMENT 101: SCIENCE REVEALS NEW TOOLS TO MANAGE OFFENDERS 1–2 (2011), https://www.pewtrusts.org/~media/legacy/uploadedfiles/pcs_assets/2011/pewriskassessmentbriefpdf.pdf [https://perma.cc/ST4Z-8DWW] (encouraging use of RNR approach in criminal justice administration, including post-conviction sentencing). These tools not only predict whether a defendant will commit a crime in the future, but identify their specific risks—like risk of drug abuse—to inform decisions about treatment needs. The distinction means little in the *sentencing* context (as opposed to corrections) as risk-and-needs assessments facilitate incapacitative interventions just as much as traditional risk tools. See, e.g., *State v. Loomis*, 881 N.W.2d 749 (Wis. 2016) (court referencing risks and needs as part of rationale to sentence defendant to longest term available under the statute of conviction).

25. See Eaglin, *Constructing*, *supra* note 12, at 85–87. Note that risk tools convey knowledge about people *like* the defendant. See, e.g., Melissa Hamilton, *Adventures in Risk: Predicting Violent and Sexual Recidivism in Sentencing Law*, 47 ARIZ. ST. L.J. 1 (2015); Sonja B. Starr, *Evidence-Based Sentencing and the Scientific Rationalization of Discrimination*, 66 STAN. L. REV. 803 (2014) [hereinafter Starr, *Rationalization*]. Moreover, risk tools do not predict what people like the defendant do so much as predict what happens to people in the defendant’s current situation. In other words, risk tools estimate the likelihood of a defendant *returning* to the criminal justice apparatus on the basis of other legal actors, like police, unless interventions occur. Even the most dynamic tools, then, are somewhat static in their ability to predict the future given the uncertainty of human nature. See, e.g., Dawinder S. Sidhu, *Moneyball Sentencing*, 56 B.C. L. REV. 671 (2015) (critiquing how risk tools frame defendants as static entities).

26. Advanced tools weight the factors differently, but some tools in use simply add a point for the presence of select factors. Christopher Slobogin, *A Defense of Modern Risk-Based Sentencing* 7

officials use such tools—which can be publicly or privately developed—to calculate a qualitative risk score for an individual defendant.

Though a risk score does not define an outcome for a defendant at sentencing, the tools are clearly meant to “control, order or influence the behaviour of [the judge].”²⁷ Law and policymakers encourage judges to consider actuarial risk tools’ outcomes to “inform sentencing decisions about appropriate community supervision, treatment interventions, and services for the offender.”²⁸ This translates into three primary functions for the sentencing judge: the decision regarding the length of punishment and/or community supervision, the location of that term through incarceration or community supervision, and the imposition of conditions of supervision.²⁹ Typically, judges will receive the actuarial risk tool’s estimates as part of the presentence report. That report, prepared by an officer of the court, offers background information to the judge regarding the offense and offender in advance of sentencing.

While risk assessment tools have been around and debated for decades,³⁰ it was not until 2001 that a state—Virginia—incorporated an actuarial risk assessment tool to directly shape judicial sentencing discretion.³¹ By the late 2000s, several states began to follow suit as a part of an effort to reduce the pressures of mass incarceration. Particularly after the 2008 economic crisis, states’ budgets were pinched and a newfound attention to criminal justice reform emerged after decades of punitive policies. Public and private coalitions began endorsing the use of publicly and privately developed actuarial risk tools in the states as part of a comprehensive agenda to reduce recidivism while saving states correctional costs.³² By 2017, at least thirteen

(Vanderbilt Univ. Law Sch. Legal Studies Research Paper Series, Working Paper No. 18-52, 2018), http://papers.ssrn.com/sol3/papers.cfm?abstract_id=3242257 [hereinafter Slobogin, *Defense*]. For discussion of the factors that go into a tool designer’s decision to develop a tool, see Eaglin, *Constructing*, *supra* note 12, at 79–80, 101–04.

27. Julia Black, *Critical Reflections on Regulation*, 27 AUSTRALIAN J. LEGAL PHIL. 1, 25 (2002).

28. *Evidence-Based Sentencing*, *supra* note 2 (promoting sentencing practices that protect the public and reduce recidivism).

29. See, e.g., Erin Collins, *Punishing Risk*, 107 GEO. L.J. 57, 66 (2018) (discussing the role risk tools play in a judge’s determination of length and location of a sentence) [hereinafter Collins, *Punishing Risk*]; CAL. R. CT. 4.415(c) (permitting judges to consider risk assessments to determine length and conditions of confinement); CTR. FOR SENTENCING INITIATIVES, USE OF RISK AND NEEDS ASSESSMENT INFORMATION IN STATE SENTENCING PROCEEDINGS 3 (Sept. 2017), <https://www.ncsc.org/~media/Microsites/Files/CSI/EBS%20RNA%20brief%20Sep%202017.ashx> [<https://perma.cc/48TF-W3HC>] (endorsing use of risk and needs assessments to “craft[], modify[], and enforc[e] terms and conditions of probation supervision”).

30. See, e.g., AGAINST PREDICTION, *supra* note 1 (locating rise of actuarial techniques in parole during the 1930s).

31. See BRIAN J. OSTROM, NAT’L CTR. FOR STATE COURTS, OFFENDER RISK ASSESSMENT IN VIRGINIA: A THREE STAGE EVALUATION (2002) (implemented in 2001, institutionalized 2002).

32. Klingele, *supra* note 20, at 538–39, 566 (discussing positions of NIC; JRI; private organizations; philanthropists); see also Juliene James et al., *A View from the States: Evidence-Based Public Safety Legislation*, 102 J. CRIM. L. & CRIMINOLOGY 821, 837–39 (2012) (discussing convergence

states required the use of actuarial risk tools at sentencing.³³ In 2017, the American Law Institute endorsed the institutionalization of actuarial risk tools into state sentencing structures.³⁴ With this decision, risk tools promise to further expand in coming years.

These tools are advanced as an improvement upon “clinical” assessments of risk—meaning estimates of likelihood conducted by persons without structure—including possibly judges at sentencing.³⁵ The tools are meant to “nudge” judges towards less punitive alternatives to incarceration for defendants identified as low-risk.³⁶ Oppositely, tools should encourage judges to increase sentences for higher-risk defendants on the basis that criminal supervision is more necessary.³⁷ In theory, considering this information should reduce *unnecessary* reliance on incarceration. The idea is that the tools identify low-risk offenders within certain categories of (low-level and nonviolent) offenders particularly suited for diversion. This information alerts judges to change their sentencing practices in line with budgetary limits and the limited safety concerns.

of different actors to implement evidence-based criminal justice reforms, including actuarial risk assessments at sentencing).

33. Notably, this likely underestimates the number of states that use actuarial risk tools now. It only includes those states that statutorily require consideration of an actuarial risk tool as part of the sentencing process. Compare Starr, *Rationalization*, *supra* note 25, at 809 n.11 (compiling list of twenty states that use risk tools), with Eaglin, *Constructing*, *supra* note 12, at 114–15 (noting the various ways that risk tools enter sentencing).

34. MODEL PENAL CODE: SENTENCING § 6B.09 (AM. LAW INST. 2017). Note that this Article refers to the Model Penal Code: Sentencing provision on evidence-based sentencing presented in the proposed final draft approved by the ALI in 2017. The final draft has not been released to the public as of the date of this Article’s publication. See *Model Penal Code: Sentencing, Proposed Final Draft (Approved May 2017)*, ROBIN A INST. (June 5, 2017), <https://robinainstitute.umn.edu/publications/model-penal-code-sentencing-proposed-final-draft-approved-may-2017> [<https://perma.cc/Y7N8-Y3PW>].

35. See, e.g., Hamilton, *supra* note 25, at 8 (distinguishing clinical and actuarial assessments as line between unstructured and structured decisionmaking about risk); see also PAUL E. MEEHL, CLINICAL VERSUS STATISTICAL PREDICTION (1954) (foundational research on distinction).

36. On Amir & Orly Lobel, *Stumble, Predict, Nudge: How Behavioral Economics Informs Law and Policy*, 108 COLUM. L. REV. 2098 (2008); RICHARD H. THALER & CASS R. SUNSTEIN, NUDGE: IMPROVING DECISIONS ABOUT HEALTH, WEALTH, AND HAPPINESS (2008). In these instances, the information from the tool would encourage judges to reduce sentences, allow community-based sanctions, and inform particular treatment mandates. The internal regulatory mechanisms at play include anything other than a direct command, including such factors as shaming, fear of crime, and fear of public backlash. See Kelly Hannah-Moffat, *Actuarial Sentencing: An “Unsettled” Proposition*, 30 JUST. Q. 270, 289–90 (2013) (“It is possible that those who promote risk approaches do not share the goal of reducing crime or of matching offenders with the programs that ‘work,’ but rather who seek only to manage populations defensibly.”).

37. See, e.g., MODEL PENAL CODE: SENTENCING § 6B.09 cmt. e (endorsing this practice); Sonja B. Starr, *The Odds of Justice: Actuarial Risk Prediction and the Criminal Justice System*, 29 CHANCE 49, 51 (2016) (summarizing empirical study of students assessing risk tools that demonstrates they are more punitive when presented with a higher risk score for the same offense); see also Collins, *Punishing Risk*, *supra* note 29, at 68–69 (discussing a Wisconsin case where the judge later reduced a sentence after reflecting on the anchoring effect of the risk score towards a more severe sentence).

States are incorporating risk tools into the sentencing process in a variety of ways and to varying degrees based upon the unique state structure. In Virginia, for example, the tools are adopted as a structured component to the sentencing process.³⁸ There are two risk tools that operate in the state in tandem with the state's advisory sentencing guidelines.³⁹ Court administrators attach the state's nonviolent offender risk assessment to presentence reports for defendants convicted of specific drug and property offenses.⁴⁰ The assessment sheet characterizes defendants as high-, medium-, or low-risk on the basis of an eleven-factor weighted assessment developed with data from Virginia itself.⁴¹ Defendants identified as low-risk are automatically recommended for diversion from prison to alternative sanctions, which include jail, probation, and other incapacitative alternatives to incarceration.⁴² The second tool, designed for sex offenders specifically, can increase the range of the sentence that a defendant can expect under the state's sentencing guidelines for certain sex crimes.⁴³ The Model Penal Code: Sentencing endorses this structured approach to risk-based sentencing.⁴⁴

Most other states incorporate risk tools in a less structured manner. In Ohio, the state endorses the adoption of actuarial risk tools created by a state-endorsed public institution.⁴⁵ While the state retains sentencing guidelines to inform their discretion, judges are mandated to consider actuarial risk tools as part of the sentencing process if the judge orders a

38. OSTROM, *supra* note 31, at 9–10; Richard P. Kern & Meredith Farrar-Owens, *Sentencing Guidelines with Integrated Offender Risk Assessment*, 25 FED. SENT'G REP. 176, 176–78 (2013).

39. OSTROM, *supra* note 31, at 23–26; Kern & Farrar-Owens, *supra* note 38, at 176–79.

40. OSTROM, *supra* note 31, at 51–56; Kern & Farrar-Owens, *supra* note 38, at 176–77.

41. OSTROM, *supra* note 31, at 27, 44.

42. BRANDON L. GARRETT ET AL., VA. CRIMINAL JUSTICE POLICY REFORM PROJECT, NONVIOLENT RISK ASSESSMENT IN VIRGINIA SENTENCING: THE SENTENCING COMMISSION DATA 4–7 (2018).

43. Kern & Farrar-Owens, *supra* note 38, at 177–79.

44. MODEL PENAL CODE: SENTENCING § 6B.09 and cmt. d–e (AM. LAW INST. 2017) (endorsing Virginia's approach to incorporating actuarial risk tools at sentencing). Other states have attempted to follow in Virginia's footsteps in recent years. For example, Pennsylvania is in the final stages of developing an actuarial risk tool for sentencing after years of study and notice-and-comment. PA. COMM'N ON SENTENCING, PROPOSED SENTENCE RISK ASSESSMENT INSTRUMENT (2019), <http://pcs.la.psu.edu/guidelines/proposed-sentence-risk-assessment-instrument/proposed-sentence-risk-assessment-instrument-published-july-20-2019> [<https://perma.cc/9CHN-XVKS>]. Wisconsin also adopted a commercial risk tool in hopes of replicating Virginia's sentencing process while saving money. Joe Fontaine, *A History of Wisconsin Sentencing—Part XXVI*, CORRECTIONS SENTENCING (May 18, 2007, 1:04 PM), http://correctionssentencing.blogspot.com/2007/05/history-of-wisconsin-sentencing-part_18.html [<https://perma.cc/G2SG-BUZ2>].

45. See OHIO REV. CODE ANN. § 5120.114(A) (West 2019) (requiring that courts use the Ohio Risk Assessment System (ORAS) risk tool if a “court orders an assessment of an offender for sentencing”); OHIO ADMIN. CODE 5120-13-01 (2019) (codifying Ohio Department of Rehabilitation and Correction's selection of ORAS); see also Eaglin, *Constructing*, *supra* note 12, at 70–71 (discussing origin of ORAS in public-private partnership with University of Cincinnati).

presentence investigation report.⁴⁶ In Missouri, the state sentencing commission provides the outcome of an actuarial risk tool's assessment in all sentence reports as part of its sentencing information structure.⁴⁷ The tool is developed by the commission, administered on all defendants, and provided to the judge along with a report on cost savings.⁴⁸

Though this trend is controversial, it appears to have traction. The role of predictions of future dangerousness in the distribution of punishment was highly contentious in the 1970s and 1980s.⁴⁹ Notions of selective incapacitation—the idea that incapacitating high-risk offenders would save costs and reduce crime—have been sharply criticized on basis of cost and social justice concerns.⁵⁰ More recently, scholars and policymakers have spoken out against the proliferation of risk tools at sentencing, often attracting much criticism.⁵¹ Despite meaningful critiques, enthusiasm for the tools' advance remains constant.

46. See OHIO REV. CODE ANN. § 5120.114(A) (introducing risk tool to sentencing); OHIO REV. CODE ANN. §§ 2929.13–18 (West 2019) (providing sentencing guidance to the courts for noncapital convictions).

47. The Missouri Sentencing Advisory Commission provides judges with specific information about past practices to encourage judges to exercise discretion consistently. Ryan W. Scott, *The Skeptic's Guide to Information Sharing at Sentencing*, 2013 UTAH L. REV. 345, 355–56. It maintains an interactive website that allows judges to input information about a defendant. *Id.* at 356, 386. Depending on the factors put into the computer, a judge will see how other judges sentenced a defendant in similar circumstances. *Id.* at 386–390. Note that Missouri adheres to a “sentencing information system” that developed as an alternative to the guidelines movement. *Id.* at 346–47. These critiques concerning information systems have more to do with the method of implementation rather than the introduction of risk technologies in general. See *id.* at 347.

48. Michael A. Wolff, *Missouri Provides Cost of Sentences and Recidivism Data: What Does Cost Have to Do with Justice?*, 24 FED. SENT'G REP. 161, 162 (2012).

49. For example, predictions of future dangerousness were hotly contested as states like Texas introduced jury assessment of risk as part of their structured guidance for capital sentencing. See *Jurek v. Texas*, 428 U.S. 262 (1976). In the noncapital context, the role of risk predictions is deeply intertwined with structural changes in sentencing guidelines that occurred in the 1970s–80s along with the move away from rehabilitation-focused reforms. See *infra* Part II. For an overview of the scholarly debate, see Marc Miller & Norval Morris, *Predictions of Dangerousness: An Argument for Limited Use*, 3 VIOLENCE & VICTIMS 263, 263 (1988).

50. See Michael Tonry, *Purposes and Functions of Sentencing*, 34 CRIME & JUST. 1, 30 (2006) (“The prediction methods proposed were so over-inclusive, producing so many ‘false positives,’ that selective incapacitation was dismissed as impracticable.”); Paul H. Robinson, Commentary, *Punishing Dangerousness: Cloaking Preventive Detention as Criminal Justice*, 114 HARV. L. REV. 1429, 1432 (2001) (“[T]he basic features of the criminal justice system make it a costly yet ineffective preventive detention system.”).

51. It is important to emphasize here that these critiques focus exclusively on sentencing. Anna Maria Barry-Jester et al., *The New Science of Sentencing*, MARSHALL PROJECT (Aug. 4, 2015, 7:15 AM), <https://www.themarshallproject.org/2015/08/04/the-new-science-of-sentencing> [<https://perma.cc/258C-45JL>]; Sonja B. Starr, Op-Ed, *Sentencing, by the Numbers*, N.Y. TIMES, Aug. 11, 2014, at A17; Attorney General Eric Holder, Remarks at the National Association of Criminal Defense Lawyers 57th Annual Meeting and 13th State Criminal Justice Network Conference (Aug. 1, 2014), <https://www.justice.gov/opa/speech/attorney-general-eric-holder-speaks-national-association-criminal-defense-lawyers-57th> [<https://perma.cc/VJX3-Y345>] [hereinafter Holder, Remarks].

B. *The Technological Advancement Narrative*

Actuarial risk tools enjoy broad enthusiasm for their use in part because a narrative of technological advancement shapes debates about the tools in policy circles, academic scholarship, and the courts. This section identifies the narrative and illuminates its impact on debates in these three arenas.

There is a standard narrative about technological advancement in society. The narrative is as follows: Technology fixes problems by standardizing outcomes. As technology improves, humans are more capable of relying upon it without human costs.⁵² This narrative creates an orientation around how the tools improve and the ways we measure those tools. It detracts focus from the effects tools have on society. Implicitly, we presume that better tools mean a better society.

This technological advancement narrative is imprinted onto debates about actuarial risk tools as sentencing reform. The notion is that states have been using the wrong tool or not enough tools at sentencing. Advocates and critics alike focus on how new risk assessments are improved, often emphasizing how technological advances make tools more accurate at predicting outcomes—be it because the datasets are larger, the computers are faster, or the algorithms are more complex.⁵³ This emphasis on technical accuracy comports with the standard narrative about technology.

For example, policymakers emphasize that risk tools offer a costless way to fix existing problems at sentencing. Consider the developers of the Ohio risk assessment system who emphasize that implementing standardized risk assessments prevents the potential of arbitrary decisionmaking if individual judges do assess risk.⁵⁴ The National Center for State Courts underscores how risk tools can reduce unnecessary reliance on incarceration by objectively identifying those offenders most capable of diversion.⁵⁵ Key to the policy argument is the “costless” component of the technological advancement narrative. For example, the American Law Institute (ALI) recently suggested that given the current state of criminal justice, risk tools

52. For an interesting take on the origin of this belief, see generally HUNTER HEYCK, *AGE OF SYSTEM: UNDERSTANDING THE DEVELOPMENT OF MODERN SOCIAL SCIENCE* (2015).

53. Compare Starr, *Rationalization*, *supra* note 25, at 806 (critiquing statistically robust actuarial tools as new way to rationalize discrimination at sentencing), with Aziz Z. Huq, *Racial Equity in Algorithmic Criminal Justice*, 68 DUKE L.J. 1043, 1060–62 (2019) (characterizing introduction of new big data techniques to criminal justice as inevitable). See also Collins, *Punishing Risk*, *supra* note 29, at 74–75 (describing proponents’ endorsement of risk predictions due to increased accuracy).

54. See, e.g., Edward J. Latessa et al., *The Creation and Validation of the Ohio Risk Assessment System (ORAS)*, 74 FED. PROB. 16, 17 (2010) (“[O]ne of the purposes of ORAS was to promote consistent and objective assessment of the risk of recidivism for offenders in Ohio.”).

55. CTR. FOR SENTENCING INITIATIVES, *supra* note 29 (highlighting California and Netherland studies finding that tools’ use led to decreased reliance on incarceration and more diversion while attributing ambivalent results in its ten jurisdiction study to lack of data).

provide an objective means to cope with the pressures of mass incarceration.⁵⁶ The ALI notes that risk tools can save limited financial resources and avoid victimization. As they explain,

[i]f used as a tool to encourage sentencing judges to divert low-risk offenders from prisons to community sanctions, risk assessments conserve scarce prison resources for the most dangerous offenders, reduce the overall costs of the corrections system, and avoid the human costs of unneeded confinement to offenders, offenders' families, and communities.⁵⁷

Incorporating actuarial risk tools into sentencing also avoids victimization because “[i]f prediction technology shown to be reasonably accurate is not employed, and crime-preventive terms of confinement are not imposed, the justice system knowingly permits victimizations in the community that could have been avoided.”⁵⁸ Moreover, because the tools are more accurate than humans based on fifty years of social science research, the ALI suggests that incorporating risk tools is a pragmatic reform supported by data-driven research.⁵⁹ Though not indicative of all policy perspectives on the matter, these endorsements are representative of leading justifications for tool adoption.

This narrative fuels policy debates' emphasis on accuracy as well. For example, risk tools appeared frequently in the news after ProPublica published a report and article suggesting that the tools are racially biased.⁶⁰ As the report suggested, popular tools like COMPAS miscategorize black defendants as high risk more frequently than white defendants.⁶¹ The tools stayed in the news when tool developers responded with reports that COMPAS is technically accurate regardless of race.⁶² At the same time, this narrative operates to displace policy critiques that do not emphasize accuracy. As an example, when then-Attorney General Eric Holder critiqued risk tools as being anathema to our criminal justice values, he was

56. See, e.g., Slobogin, *Defense*, *supra* note 26; see also MODEL PENAL CODE: SENTENCING § 6B.09 (AM. LAW INST. 2017); Kelly Hannah-Moffat, *Punishment and Risk*, in THE SAGE HANDBOOK OF PUNISHMENT AND SOCIETY 129 (Jonathan Simon & Richard Sparks eds., 2013) [hereinafter Hannah-Moffat, *Punishment*] (genealogy of tools and cautious optimism).

57. MODEL PENAL CODE: SENTENCING § 6B.09 cmt. d.

58. *Id.* at cmt. e.

59. *Id.* at cmt. a.

60. See Julia Angwin et al., *Machine Bias*, PROPUBLICA (May 23, 2016), <http://www.propublica.org/article/machine-bias-risk-assessments-in-criminal-sentencing> [<https://perma.cc/NBA7-4WF8>].

61. *Id.*

62. See WILLIAM DIETERICH ET AL., NORTHPOINTE, COMPAS RISK SCALES: DEMONSTRATING ACCURACY EQUITY AND PREDICTIVE PARITY (2016), http://go.volarisgroup.com/rs/430-MBX-989/ima/ProPublica_Commentary_Final_070616.pdf [<https://perma.cc/CH8Z-5X6V>].

excoriated.⁶³ Primary among the responses were studies demonstrating tool accuracy. It is as if the accuracy of the tool defines our criminal justice values.

Notable academic debates, too, adhere to the technological advancement narrative. Scholars are quick to tell you how much the tools have changed in the last fifty years.⁶⁴ Indeed, genealogies of risk technology are pervasive.⁶⁵ Scholarship details how tools have advanced to predict more accurately and assess more things than just risk, including needs.⁶⁶ To be sure, vigorous debates continue regarding improvements in the data,⁶⁷ accuracy and reliability of the outcomes,⁶⁸ and the connection between production of information and implementation.⁶⁹ Further analysis connects these debates to how it relates to sentencing.⁷⁰ Yet these arguments suggest that *if* the tools are getting better, then it is time for humans to catch up by using them correctly. These scholars often, but not always, expand focus beyond actuarial risk tools as sentencing reform. Rather, tool proliferation at sentencing is just one of many “algorithmic” reforms meant to improve the administration of criminal justice.⁷¹

Alternatively, punishment scholars are keen to focus on actuarial risk tools’ overlap with criminal history. Advocates emphasize that criminal

63. See Holder, Remarks, *supra* note 51; Jessica Eaglin, *May the Odds Be (Never) in Minorities’ Favor? Breaking Down the Risk-Based Sentencing Divide*, HUFFPOST (Aug. 22, 2014, 12:30 PM), https://www.huffpost.com/entry/may-the-odds-be-never-in_b_5697651 [<https://perma.cc/H9GV-ZB7M>] (summarizing responding critiques).

64. See, e.g., Christopher Slobogin, *The Civilization of the Criminal Law*, 58 VAND. L. REV. 121, 144–56 (2005) (emphasizing that “risk management techniques, like risk assessment methods, have improved immensely over the past few decades” as basis for prevention-oriented sentencing); Slobogin, *Defense*, *supra* note 26, at 3, 13–14 (emphasizing improved accuracy of risk tools over time and over human judgment).

65. For genealogies of the tools, see, e.g., Hannah-Moffat, *Punishment*, *supra* note 56, at 132–37; Jonathan Simon, *Reversal of Fortune: The Resurgence of Individual Risk Assessment in Criminal Justice*, 1 ANN. REV. L. & SOC. SCI. 397, 414–15 (2005).

66. See, e.g., Cullen, *supra* note 24, at 335–46 (describing the emergence of risk and needs assessments).

67. See, e.g., Wayne A. Logan & Andrew Guthrie Ferguson, *Policing Criminal Justice Data*, 101 MINN. L. REV. 541 (2016) (identifying issues with data collected in criminal justice administration).

68. See, e.g., Huq, *supra* note 53, at 1113–15 (detailing challenges to measuring whether tools are accurate on the basis of racial justice).

69. See, e.g., Megan Stevenson, *Assessing Risk Assessment in Action*, 103 MINN. L. REV. 303 (2018); Brandon L. Garrett & John Monahan, *Judging Risk*, 108 CALIF. L. REV. (forthcoming 2019), https://papers.ssrn.com/sol3/papers.cfm?abstract_id=3190403.

70. See, e.g., Slobogin, *Defense*, *supra* note 26 (advancing his fit, validity, and fairness principles for sentencing and policing); John Monahan & Jennifer L. Skeem, *Risk Assessment in Criminal Sanctioning*, 12 ANN. REV. CLINICAL PSYCHOL. 489, 491–93 (2016); accord Collins, *Punishing Risk*, *supra* note 29, at 61 (warning that tools created for corrections present an off purpose use at sentencing); Eaglin, *Constructing*, *supra* note 12 (warning that tool construction implicates sentencing policy).

71. See, e.g., Anupam Chander, *The Racist Algorithm?*, 115 MICH. L. REV. 1023 (2017); Huq, *supra* note 53, at 1045 (noting expansion of predictive technologies at various points in the criminal justice process).

history is used as a crude predictor of recidivism risk.⁷² If actuarial risk tools are better than criminal history at predicting risk, then the tools should be implemented at sentencing.⁷³ In essence, this is the “this is what we’ve always done” argument. It silences the philosophical and public policy reality that states have, until recently, focused on criminal history at sentencing to the exclusion of various risk factors.⁷⁴ For example, Pennsylvania’s Sentencing Commission chose to focus on criminality as measured by “two paramount criteria: seriousness of the (current) offense, and the offender’s criminal history” in development of its sentencing guidelines.⁷⁵ It excluded various other common sentencing factors that could predict future behavior, including those related to poverty.⁷⁶ Yet today the state’s commissioners have, until recently, encouraged use of tools that include such factors.⁷⁷ What matters is whether and how many factors can be included to maintain a satisfactory level of social scientific accuracy rather than whether and how many factors converge with or contradict sentencing policy. This, too, illuminates an orientation toward technical accuracy that only makes sense within the narrative of technological advancement.

This narrative bleeds into the courts as well. Putting aside the question of how to challenge tools in court, it is clear that courts are focusing on technical accuracy. Actuarial risk tools consider factors excluded from sentencing policy due to constitutional concern or public policy disapproval.⁷⁸ Such factors may include gender, age, and socioeconomic

72. Nancy J. King, *Sentencing and Prior Convictions: The Past, the Future, and the End of the Prior-Conviction Exception to Apprendi*, 97 MARQ. L. REV. 523, 539–40 (2014).

73. See, e.g., RICHARD S. FRASE, JUST SENTENCING: PRINCIPLES AND PROCEDURES FOR A WORKABLE SYSTEM (2012); King, *supra* note 72, at 544.

74. See, e.g., AGAINST PREDICTION, *supra* note 1, at 96–98 (noting the trend toward using criminal history as risk factors); King, *supra* note 72, at 541–42; Michael Tonry, *Legal and Ethical Issues in the Prediction of Recidivism*, 26 FED. SENT’G REP. 167, 168 (2014) [hereinafter Tonry, *Issues*] (observing trend toward narrowing predictive factors on criminal history).

75. Mona Lynch & Alyse Bertenthal, *The Calculus of the Record: Criminal History in the Making of US Federal Sentencing Guidelines*, 20 THEORETICAL CRIMINOLOGY 145, 151 (2016) (quoting letter authored by DA Jones, Pennsylvania Commission on Sentencing 1986).

76. See *id.* (noting that the state commissioner considered other offender characteristics like “falsely claimed poverty” as “absurd”).

77. Compare PENNSYLVANIA COMM’N ON SENTENCING, SPECIAL REPORT: THE IMPACT OF REMOVING AGE, GENDER, AND COUNTY FROM THE RISK ASSESSMENT SCALE 1 (2015), <http://pcs.la.psu.edu/publications-and-research/risk-assessment/phase-ii-reports/special-report-impact-of-removing-demographic-factors/view> [https://perma.cc/TGG9-T3R6] (encouraging retention of age, gender, and county in state-developed risk assessment tool), with Pennsylvania Comm’n on Sentencing, Proposed Sentence Risk Assessment Instrument, 204 PA. CODE §§ 305.1-305.9 (2019) (proposed tool retains only age and gender as demographic risk factors).

78. Eaglin, *Against Neorehabilitation*, *supra* note 5, at 215 (policy claim); Starr, *Rationalization*, *supra* note 25, at 805 (making constitutional, methodological, and policy claim); Sidhu, *supra* note 25 (making statutory claim based on the federal Sentencing Reform Act).

status.⁷⁹ Yet because the tools are offered under the umbrella of risk and risk is not connected to a specific sentencing outcome, courts have resisted consideration of their construction as a substantive matter. For example, in *Malenchik v. State*, the Indiana Supreme Court explicitly located technical accuracy at the center of its ruling about actuarial risk tools' advance at sentencing.⁸⁰ In a more recent decision, *State v. Loomis*, the Wisconsin Supreme Court converged on the history of risk tools' advancement and the possibility of technical accuracy when denying a defendant's constitutional due process challenges to actuarial risk tools used at sentencing.⁸¹ Consistent with the standard narrative, the court concluded that consideration of more technically accurate risk tools is beneficial to both the criminal justice system and the defendant.⁸² This remained persuasive to the court even though the defendant explicitly objected to tool use, even if the tool was accurate.⁸³

In summary, the orientation around accuracy is the technological advancement narrative at work in sentencing reform debates. Through it, the pursuit of technical knowledge is defining and shaping sentencing, rather than sentencing shaping and defining the pursuit of technical knowledge. Within the narrative, this development is minimized; it is even worthy of celebration. The implicit conclusion is this: technology is changing and we should change with it. The following section sets the foundation to complicate that conclusion.

79. It is the intersection of all three that implicates racialized concerns of structural inequity. While discussed more explicitly below, it is well understood that the sociohistorical phenomenon of mass incarceration affects geographically and racially marginalized populations the most. *See supra* notes 15–20 and accompanying text (defining contours of mass incarceration). Thus, risk factors that implicate the intersections of structural disadvantage are also racially inflected. *See infra* Part III.B.

80. *Malenchik v. State*, 928 N.E.2d 564 (Ind. 2010). Anthony Malenchik pled guilty to receiving stolen goods and being a habitual offender. *Id.* at 566. The trial judge sentenced him to six years imprisonment with two years suspended—the maximum sentence available given defendant's plea agreement. *Id.* In explaining its decision, the court referenced the outcome of two popular actuarial risk assessment tools, the Level of Service Inventory-Revised (LSI-R) and Substance Abuse Subtle Screening Inventory (SASSI), included in the defendant's presentence investigation report. *Id.* at 566–67. Defendant appealed the sentence to Indiana's Supreme Court. *Id.* at 566. There, the court considered a variety of challenges to use of information produced by actuarial risk tools, some raised by the defendant and several raised by amici as well. *Id.* at 567–73.

81. *State v. Loomis*, 881 N.W.2d 749 (Wis. 2016). Eric Loomis pled guilty to fleeing a police officer and operating a car without the owner's consent. *Id.* at 754. The trial court imposed the maximum sentence available under the statute. *Id.* at 756–57. The trial court, explaining its decision, referenced the outcome of another popular actuarial risk assessment tool, the Correctional Offender Management Profiling for Alternative Sanctions (COMPAS), as a relevant factor. *Id.* at 753–55. Loomis appealed his sentence. *Id.* at 757. The appellate court certified appeal to the Wisconsin Supreme Court, which issued its decision in July 2016. *Id.*

82. *Id.* at 766–67.

83. *Id.* at 765.

C. *The Narrative's Shortcoming*

These debates are lopsided, but the technological advancement narrative obscures their one-sided nature. To be sure, the technology around actuarial risk tools is changing. The datasets are getting bigger, the algorithms are getting more complex, and the computers are getting stronger.⁸⁴ But to characterize those technological advancements as the basis for the expansion of actuarial risk tools overlooks how human values and realism once combined to limit the incorporation of risk technologies into sentencing structures. This is no small step in the expansion of actuarial techniques. Rather, it reflects a significant transformation in and of itself.

To start, it is not a foregone conclusion that technological advancements improve sentencing or society. The narrative orients focus around debates of technical accuracy, as much scholarship and public policy does. It assumes social benefits. Debates on technical accuracy of tools cannot encompass the full implications of risk tools entering sentencing, a point I develop more fully in Part IV. That focus obscures critical transformations that have occurred in *society* facilitated through a turn toward technology. This standard narrative, or discourse, has the effect of masking social transformations which only historical content can illuminate.⁸⁵ As a political tactic, it neutralizes the importance of history as a reason for pause now.

Yet history is a critical component to the standard narrative. In policy debates, scholarship, and court rulings, advocates draw on history to bolster their claims of tool legitimacy as sentencing reform. For example, the ALI draws from the 1962 Model Penal Code references to persistent offenders and dangerous, mentally abnormal defendants to suggest that consideration of recidivism risk is not new, but perhaps more constrained with the adoption of a tool.⁸⁶ Scholars similarly suggest that tool use is at least more transparent than past practices.⁸⁷ Furthermore, they may emphasize use of

84. For an overview of that literature, see, for example, Andrew Guthrie Ferguson, *Policing Predictive Policing*, 94 WASH. U. L. REV. 1109 (2017).

85. Michel Foucault, *Lecture One: 7 January 1976*, in POWER/KNOWLEDGE 78 (Colin Gordon ed., Colin Gordon et al. trans., 1980).

86. MODEL PENAL CODE: SENTENCING § 6B.09 cmt. a (AM. LAW INST. 2017).

87. See, e.g., Reitz, *supra* note 11, at 69–71. There is a deep irony to this rationale. While risk tools are meant to bring *transparency* to sentencing, the construction of most tools is incredibly opaque—developers often refuse to release information about their design and the policy choices embedded in the tools. See Eaglin, *Constructing*, *supra* note 12, at 147; Anne L. Washington, *How to Argue with an Algorithm: Lessons from the COMPAS-ProPublica Debate*, 17 COLO. TECH. L.J. 131 (2018). The ALI rightfully encourages the use of risk tools developed by state agencies explicitly to avoid this dilemma. MODEL PENAL CODE: SENTENCING § 6B.09. This practice is the exception, not the rule, among states adopting risk assessment tools for sentencing. See Eaglin, *Constructing*, *supra* note 12, at 147–51 (noting the opacity of many risk tools used at sentencing); see generally Rebecca Wexler, *Life, Liberty, and Trade Secrets: Intellectual Property in the Criminal Justice System*, 70 STAN. L. REV.

actuarial risk assessments in earlier punishment technologies while critiquing tool detractors for their failure to account for this historical reality.⁸⁸ Together, these explanations suggest that because states already do or should encourage risk-based sentencing, actuarial risk tools can improve that practice.

The result is a deeply one-sided discourse about whether and why we might limit or prohibit actuarial risk tools at sentencing. Advocates bolster claims with the historical past practice argument while critics are quick to sidestep their presence. In this debate, it is easy to overlook the decision by states *not* to introduce actuarial risk tools at sentencing in the recent past and why, a point discussed in the following Part. In this sense, both critics and advocates are often selectively historical. Obscured by the narrative is the simple historical reality that risk assessments may not be new, but our orientation around technical accuracy is. This shift has everything to do with changes in society left underscrutinized because of the narrative shaping debates.

The remainder of this Article reignites history to destabilize this pervasive standard narrative shaping risk tools debates. The aim is to use the *social* history of punishment technologies to construct a novel counternarrative. This, in turn, can facilitate a more balanced and holistic debate about risk tools' proliferation today as part of any response to mass incarceration.

This project builds from the work of scholars that have studied the rise of *actuarialism*, meaning the preoccupation with statistical predictions of risk.⁸⁹ On the one hand, some scholars suggest that the orientation toward risk is part of a larger shift toward managing offenders rather than rehabilitating them in response to a loss of faith in government at the end of the twentieth century.⁹⁰ As a “new penology” emerged in the 1970s with the decline of rehabilitation, government shifted toward techniques of aggregation and bureaucratization to manage groups rather than rehabilitate individuals.⁹¹ These scholars emphasize the darker side of this turn. The largest problem with risk tools is the loss of individualized engagement on the basis of the particulars of specific cases.

1343 (2018) (describing lack of transparency concerns in technologies proliferating across the entire criminal justice system, including risk tools at sentencing).

88. See, e.g., Reitz, *supra* note 11, at 71 (critiquing “ahistorical condemnation” of risk tools at sentencing).

89. See AGAINST PREDICTION, *supra* note 1, at 1 (defining actuarialism).

90. See generally DAVID GARLAND, THE CULTURE OF CONTROL: CRIME AND SOCIAL ORDER IN CONTEMPORARY SOCIETY 53–73 (2001).

91. See Malcolm M. Feeley & Jonathan Simon, *The New Penology*, 30 CRIMINOLOGY 449, 452–54 (1992) (noting rise of systems theory as part of a turn toward actuarial techniques); Malcolm Feeley & Jonathan Simon, *Actuarial Justice: The Emerging New Criminal Law*, in THE FUTURES OF CRIMINOLOGY 173, 185–93 (David Nelken ed., 1994) (exploring intellectual origin).

Alternatively, some scholars locate the rise of actuarialism as the problematic continuation of a path *toward* individualization rather than away from it. In his foundational book, *Against Prediction: Profiling, Policing, and Punishing in an Actuarial Age*, Bernard Harcourt examines the rise of actuarial techniques in criminal justice since the 1930s. Contrary to the aggregation critique, Harcourt attributes the rise of risk assessments to the problematic but long-time dream of prediction, individualization, and a will to know the criminal at sentencing.⁹² As Harcourt suggests, introducing these techniques into punishment is problematic not only because of how they operate—by targeting populations and perhaps, paradoxically, increasing crime—but also because of what they do to social notions of justice.⁹³

This Article draws on both these literatures to construct a counternarrative focused on *society* rather than *technology* to explain actuarial tools' proliferation. It converges with Harcourt's insight that the pursuit of technical knowledge has shaped our notions of just punishment. But while he anticipated that the pursuit of technical knowledge would change us, this Article looks backward to illuminate how it already has changed us. At the same time, it critiques the formalism of aggregative policies in line with those critiquing the problematic turn toward the bureaucratic episteme.⁹⁴ This Article suggests that we changed not only through the orientation around prediction, but also through a technical formalism that emerged in the 1960s and has propelled forward to shape sentencing policy ever since. Illuminating those changes offers a new foundation to debate risk tools now.

II. DESTABILIZING THE STANDARD NARRATIVE: FROM PAROLE GUIDELINES TO ACTUARIAL RISK TOOLS

For the majority of the twentieth century, sentencing worked like this: judges sentenced defendants based on the facts of the case and presentence reports detailing the background of the offender and the nature of the crime. Judges were constrained by legislatures who issued statutory limits on sentences for different offenses, within which judges had to adhere. Parole boards, however, determined the actual length of time a defendant sentenced

92. AGAINST PREDICTION, *supra* note 1, at 193; see also Bernard E. Harcourt, *From the Ne'er-Do-Well to the Criminal History Category: The Refinement of the Actuarial Model in Criminal Law*, 66 L. & CONTEMP. PROBS. 99, 101 (2003).

93. AGAINST PREDICTION, *supra* note 1, at 32–34, 186–92.

94. See, e.g., Albert W. Alschuler, *The Changing Purposes of Criminal Punishment: A Retrospective on the Past Century and Some Thoughts About the Next*, 70 U. CHI. L. REV. 1 (2003); KATE STITH & JOSÉ A. CABRANES, FEAR OF JUDGING: SENTENCING GUIDELINES IN THE FEDERAL COURTS 177 (1998).

to prison would serve based on indicators of his or her rehabilitation. This structure is often referred to as “indeterminate” because the defendant would not know his or her actual sentence at the time of sentencing.

Indeterminate sentencing came under attack in the 1970s. States turned away from rehabilitation as a guiding theory of punishment simultaneous with notable critiques of its value.⁹⁵ Law and policymakers revised sentencing laws to shift toward a “determinate” sentencing structure.⁹⁶ Under this structure, the judge sentences a defendant to a finite term of incarceration. A defendant serves that entire term save a limited amount of possible good credit time offered for early release. Though not all states adopted this structure completely, many shifted in this direction and continue to do so.

Along with the rise of determinate sentencing—but not inherently connected to it—states and the federal government started developing and implementing reforms derived of technical projects meant to limit and shape the exercise of criminal justice actors’ discretion at the systemic level. First came the parole guidelines designed to rationalize the release of prisoners under the indeterminate sentencing structure.⁹⁷ Shortly thereafter states and the federal government began developing and implementing sentencing guidelines designed to rationalize the exercise of judicial discretion through technical means, often in the context of a determinate sentencing structure.⁹⁸

These technical projects translated into sentencing reforms. Following intellectual historian Hunter Heyck, these reforms can be characterized as “technosocial” because they “involved the quite deliberate reconstruction of social relationships through technological means.”⁹⁹ Critical to this contribution, the tools produced by these projects were meant to alter “[i]deas, practices, and behaviors” through the new technological

95. While notable critiques existed in the 1960s, see, for example, FRANCIS A. ALLEN, *THE BORDERLAND OF CRIMINAL JUSTICE* (1964), it was not until 1974 that empirical studies would put the proverbial “final nail into rehabilitation’s coffin.” See Cullen, *supra* note 24, at 300 (discussing Robert Martinson, *What Works?—Questions and Answers About Prison Reform*, 35 PUB. INT. 22 (1974)).

96. See Kevin R. Reitz, *The Disassembly and Reassembly of U.S. Sentencing Practices*, in SENTENCING AND SANCTIONS IN WESTERN COUNTRIES 222, 223 (Michael Tonry & Richard S. Frase eds., 2001) (“[I]ndeterminate sentencing systems in many U.S. jurisdictions have given way since 1970 to an array of ‘determinate’ sentencing reforms.”).

97. U.S. PAROLE COMM’N, *HISTORY OF THE FEDERAL PAROLE SYSTEM I* (2003); Jack M. Kress et al., *Is the End of Judicial Sentencing in Sight*, 60 JUDICATURE 216, 220 (1976). Many states curtailed or eliminated parole altogether shortly after the introduction of parole guidelines. See *infra* Part II.A. For historical context on the role of the Law Enforcement Assistance Administration in creating technological infrastructure in criminal justice, see generally ELIZABETH HINTON, *FROM THE WAR ON POVERTY TO THE WAR ON CRIME: THE MAKING OF MASS INCARCERATION IN AMERICA* 146–62 (2016).

98. See Reitz, *supra* note 96, at 226–27 tbl.6.1, 228 (collecting list of states adopting sentencing guidelines and noting that many sentencing commissions calibrate sentences through a sentencing grid).

99. HEYCK, *supra* note 52, at 196 (explaining that such projects blended social science research with military research techniques drawn from World War II and the Cold War).

infrastructure that the projects produced.¹⁰⁰ There have been three waves of technosocial reforms implemented to rationalize sentencing outcomes prior to the recent rise of risk tools: clinical rehabilitation risk tools, parole guidelines, and sentencing guidelines. The proliferation of actuarial risk assessments as sentencing reform today can be understood as the fourth wave of technosocial reform. The following sections describe the introduction of various technosocial reforms with an emphasis on the role of risk assessments before returning to the proliferation of actuarial risk tools today.

A. *The Decline of Human-Driven Punishment*

To gain a fuller appreciation of how and why actuarial risk technologies entered sentencing guidelines, a deeper understanding of the collapse of rehabilitation and its relationship with technology is necessary. Prior to the 1970s, both the parole agent and the parole board worked in tandem to release and supervise offenders in the name of rehabilitation.¹⁰¹ For the centralized administrative parole board, rehabilitation offered an important tool for relieving prison overcrowding pressures, inducing participation in prison programming while incarcerated, and a rhetorical justification for offender release.¹⁰² For the parole agent, rehabilitation offered an animating ethos and a rhetorical justification for its function. Prior to the 1950s, that ethos was simply to reintegrate offenders into the labor market. As Jonathan Simon indicates in *Poor Discipline*, the labor market offered a form of “disciplinary control” for offenders, and parole agents largely functioned to connect offenders with the job market before release and after.¹⁰³ Boards would hold hearings to observe offenders and search for “intuitive signs of rehabilitation” like “repentance, willingness to accept responsibility, and self-understanding.”¹⁰⁴ In most states, the decision to release an offender relied as much on the parole agent’s guarantee that the offender’s

100. *Id.*

101. A. Keith Bottomley, *Parole in Transition: A Comparative Study of Origins, Developments, and Prospects for the 1990s*, 12 CRIME & JUST. 319, 321–26 (1990) (describing origin of parole in the United States and attributing its theoretical foundation to rehabilitation).

102. *Id.* at 324.

103. See JONATHAN SIMON, *POOR DISCIPLINE: PAROLE AND THE SOCIAL CONTROL OF THE UNDERCLASS, 1890–1990*, at 47–55 (1993) [hereinafter SIMON, *POOR DISCIPLINE*].

104. Project, *Parole Release Decisionmaking and the Sentencing Process*, 84 YALE L.J. 810, 820 (1975). As a notable exception, Illinois had developed an actuarial tool to predict recidivism risk among inmates and inform parole board decisions. Implemented in 1932 and finessed in the decades leading up to the 1960s, the studies used to develop this tool informed later studies to develop systemic parole guidelines across the states. See Bernard E. Harcourt, *From the Ne'er-Do-Well to the Criminal History Category: The Refinement of the Actuarial Model in Criminal Law*, 66 L. & CONTEMP. PROBS. 99, 120–22 (2003).

community would reintegrate the individual with a job or other assurances.¹⁰⁵

Though parole was the first area of sentencing to experiment with system-wide technosocial reform, the first wave of systemic, technical criminal justice reform was *not* the creation of guidelines; it was the expansion of the clinical model of rehabilitation in the 1950s–1960s.¹⁰⁶ Under the clinical model, parole boards increasingly focused on assessing an offender’s likelihood of recidivism when releasing the defendant while placing less emphasis on the agent’s ability to secure community assurances of reintegration.¹⁰⁷ Though family and employment remained components of reintegration, the clinical model’s focus on the relationship between the offender and the agent reduced the centrality of the community in the punitive process.

There are three explanations for this shift from “disciplinary” reintegration to “clinical” rehabilitation. First, as post-World War II researchers shifted their attention toward the War on Poverty, they chose to systematically focus on individual behavior rather than structural reforms.¹⁰⁸ As researchers shifted their attention toward criminal justice, these same ideologies would influence prison policy reforms while encouraging technical reforms.¹⁰⁹ Second, disappearing jobs made the disciplinary model less feasible. Though the post-World War II era is often characterized as an era of industrial expansion, it was marked by “slow economic growth, frequent recessions, and the displacement of untrained and unskilled labor through automation.”¹¹⁰ This trend produced a “decoupling of the labor market for low-skilled labor from the economy as a whole,” leaving those at the bottom of the skill ladder, among whom many were prisoners, at a disadvantage.¹¹¹ With no place to put workers at the bottom of the hierarchy, administrators needed a new explanation for

105. SIMON, POOR DISCIPLINE, *supra* note 103, at 59, 68.

106. While any number of reforms could be characterized as “systemic,” including the introduction of juries, I emphasize the systemic *technical* reforms that came about only after the idea of criminal justice administration as a system took hold. For more on the fraught idea of system, see Mayeux, *supra* note 14.

107. SIMON, POOR DISCIPLINE, *supra* note 103, at 68–71 (noting breakdown in the disciplinary parole triangle of offender, community, and agent and its replacement with rehabilitation rhetoric social science research). There were, no doubt, plenty of problems with this model of reintegration. *See id.* at 55–59. But the decision to change the structure altogether appears to be a response to structural changes in society rather than simply the shortcomings of that disciplinary model. *See id.* at 64.

108. HINTON, *supra* note 97, at 49.

109. *See* Mayeux, *supra* note 14, at 66 (noting that the post-World War II and Cold War focus on “system” would shift toward criminal justice between 1955–1975, bringing with it “the old Enlightenment idea that human societies could be mastered and steered toward progress through the methods of science”).

110. HINTON, *supra* note 97, at 28.

111. SIMON, POOR DISCIPLINE, *supra* note 103, at 64.

release that did not depend on society.¹¹² Clinical rehabilitation offered that explanation, and risk assessments bolstered the claim.

Third, the prison populations in this postwar period became increasingly concentrated with African Americans.¹¹³ While explaining the cause of this development is beyond the scope of this Article, the increasingly racialized prison population had an effect on the policies that were implemented. The reintegration model no longer “worked,” in part because racialized perceptions of blackness and criminality would make it more difficult to secure jobs for the increasingly black prisoners upon release.¹¹⁴ As surveillance technologies proliferated outside the prison to focus on behavior modifications for young people, particularly young African Americans,¹¹⁵ they also expanded in the prison to formalize treatment and release decisions.

So rather than simply an advance in technologies, risk tools proliferated in prisons to “fill the rhetorical gap” as states transitioned to the “clinical” model.¹¹⁶ Rehabilitation no longer meant connecting parolees with jobs in the face of a shifting economic market. Instead, criminal justice administrators shifted focus to preparing incarcerated individuals for the possibility of jobs as part of a larger effort to improve and standardize rehabilitative services. While laudable in the sense that the clinical model of rehabilitation used risk tools to offer services to those who needed it, this shift was problematic. It grew from a larger initiative to address the sociohistorical conditions that produce crime through a one-sided approach focused on controlling the individual’s behavior rather than simultaneously addressing social conditions in society.¹¹⁷ Under the auspice of clinical accuracy, states became more interested in adopting predictive assessment tools to inform parole release decisions. Though Illinois had used an actuarial risk instrument since the 1930s, by 1961 Ohio, California, and Minnesota were developing such instruments to improve the distribution of rehabilitative services as well.¹¹⁸ Other states would soon follow.¹¹⁹

112. *Id.* at 65–66.

113. *Id.* at 65.

114. See HINTON, *supra* note 97, at 28–29 (describing the impact of declining job prospects for African Americans during the second half of the twentieth century).

115. *Id.* at 32–33.

116. See SIMON, POOR DISCIPLINE, *supra* note 103, at 61.

117. HINTON, *supra* note 97, at 31.

118. As Victor Evjen noted, “Parole prediction methods determine the chances a person has of making a successful or unsuccessful adjustment after release from a penal institution. They are not designed to give the optimum time for release or to portend responsiveness to supervision.” Victor H. Evjen, *Current Thinking on Parole Prediction Tables*, 8 CRIME & DELINQ. 215, 216 (1962); see also AGAINST PREDICTION, *supra* note 1, at 70–71.

119. See AGAINST PREDICTION, *supra* note 1, at 77 (describing proliferation of actuarial risk tools in the states after the 1960s).

Ironically, the perils of automation in the private sector would prove catalysts for the onset of automation in the administration of criminal justice. Efforts to introduce a technical language to justify sentence outcomes would be rehabilitation's own demise as the shoe dropped from how to rationalize release to evaluating whether rehabilitation worked. Cultural forces would converge with empirical studies on *offender behavior* (as part of the larger effort to rationalize decisionmaking) to render rehabilitation unstable.¹²⁰ From academics, critiques attacking the rehabilitative model of sentencing were ongoing since the mid-1960s.¹²¹ By the 1970s, when empirical studies concluding that rehabilitative measures seldom change offenders' behavior in the future bolstered these critiques, states had already started to shift away from rehabilitation.¹²² When the rehabilitative ideal declined, so too did the indeterminate sentencing structure built around it.

B. Partially Automated Sentencing Technologies

In response to these developments, the Nixon administration set out to modernize the American correctional institutions as part of a "long-range master plan" to improve the penal system.¹²³ Alongside efforts to build prisons, the administration would finance technical projects that set the foundation for system-wide parole guidelines. As the following subsections explain, the construction and implementation of parole guidelines would fuel the creation of the second technology introduced at sentencing—sentencing guidelines. The actuarial risk tools proliferating at sentencing now build from these technologies, but differ in important respects that will be addressed as well.

1. Parole Guidelines

The United States Board of Parole implemented the first set of guidelines to standardize prison release around risk and crime severity while eliminating the role of rehabilitation.¹²⁴ Specialists focused on structuring criminal justice decisionmaking and empirical research techniques came

120. Cf. Michael Tonry, *Obsolescence and Immanence in Penal Theory and Policy*, 105 COLUM. L. REV. 1233 (2005) [hereinafter Tonry, *Obsolescence*] (noting the instability of rehabilitation started in the late 1950s).

121. See, e.g., ALLEN, *supra* note 95.

122. See Martinson, *supra* note 95; DOUGLAS LIPTON, ROBERT MARTINSON & JUDITH WILKS, *THE EFFECTIVENESS OF CORRECTIONAL TREATMENT: A SURVEY OF TREATMENT EVALUATION STUDIES* (1975).

123. HINTON, *supra* note 97, at 163–64.

124. See Bottomley, *supra* note 101, at 344.

together to develop the parole guidelines.¹²⁵ Those guidelines generated from initial research for a pilot reorganization program started in 1972.¹²⁶ Funded by the Law Enforcement Assistance Administration, a federal agency developed to create and expand system control in criminal justice reforms, the U.S. Parole Board implemented the guidelines across the country in 1974.¹²⁷ In 1976, Congress legislatively mandated consideration of those guidelines in the parole release process.¹²⁸

The parole guidelines represented a quintessential technosocial innovation. It was a tool designed to standardize sentencing outcomes by partially mechanizing parole release based on studies that would largely quantify components of the decisionmaking process.¹²⁹ Through the tool, infrastructure and parole board control were enhanced. The guidelines blended technical expertise and policy rationales in order to both facilitate the production of parole policy and enforce that policy among individual board actors.

The Parole Guidelines relied on a two-dimensional decision matrix based on offense seriousness and a “Salient Factor Score” indicating the prisoner’s statistical likelihood of reoffending.¹³⁰ The Salient Factor Score was an eleven-point actuarial measurement designed to categorize prisoners into one of four risk categories based on his or her likelihood of reoffending.¹³¹

125. For example, Dr. Don Gottfredson, then Director of the National Council on Crime and Delinquency Research Center, was co-director of the study on parole decisionmaking. U.S. PAROLE COMM’N, *supra* note 97, at 17. He demonstrated a particular interest in “the application of scientific methods to problems of crime and justice” and particularly to efforts to structure decisionmaking. *See, e.g.*, Don M. Gottfredson, *Prediction and Classification in Criminal Justice Decision Making*, 9 *Crime & Just.* 1, 1 (1987). Dr. Peter Hoffman joined the project as the parole board’s Director of Research in 1972 with a focus on empirical methods. U.S. PAROLE COMM’N, *supra* note 97, at 19. Hoffman played an outside role in development of the actuarial risk assessment incorporated into the parole guidelines. *See infra* notes 133–35 and accompanying text.

126. For a description of the project, see DON M. GOTTFREDSON ET AL., *THE UTILIZATION OF EXPERIENCE IN PAROLE DECISION-MAKING: SUMMARY REPORT* (1974).

127. 28 C.F.R. §§ 2.1–2.58 (1976); *see also* Peter B. Hoffman & Barbara Stone-Meierhoefer, *Application of Guidelines to Sentencing*, 3 *L. & PSYCHOL. REV.* 53, 63 (1977).

128. Parole Commission and Reorganization Act of 1976, Pub. L. No. 94-233, 90 Stat. 219 (repealed 1984) (establishing the Parole Commission and mandating parole guidelines, written explanations of parole denial, and an administrative appeal process).

129. *See* HEYCK, *supra* note 52, at 196 (technosocial projects were “intended to produce systems, infrastructures, and institutions” while reconstructing social relationships between people); *see also* Mayeux, *supra* note 14 (describing features of systems thinking that would merge into criminal justice after 1967).

130. Bottomley, *supra* note 101, at 344.

131. Don M. Gottfredson et al., *Making Paroling Policy Explicit*, 21 *CRIME & DELINQ.* 34, 38 (1975) (Salient Factor Score produced four categories of risk: very good, good, fair, and poor); *see also* Peter B. Hoffman & Lucille K. DeGostin, *Parole Decision-Making: Structuring Discretion*, 38 *FED. PROBATION* 7, 15 (1974) (illustrating eleven-point assessment based on nine elements). Revised several times after initial implementation, the tool increasingly reduced the factors included as a means to ensure fairness. So while the tool initially included factors on criminal history, drug dependence, education, employment, and family status, *see* Tonry, *Issues*, *supra* note 74, at 168, it eliminated some variables

At the intersection of the axes of crime severity and the Salient Factor Score, the guidelines offered a range of months within which the offender could expect release. Board examiners were directed to provide explanations for any divergence from the standard range indicated by the guidelines.¹³²

Notably, the guidelines excluded reference to rehabilitation while amplifying the role of recidivism risk. There are three explanations for this absence, each blending the critique of rehabilitation with the promise of technology. First, Dr. Peter Hoffman, a key technical advisor on the parole guideline project, developed substantial research independent of this project searching for a proper parole policy feedback “measure” or “device.”¹³³ His research converged on “parole risk” and asserted that this prediction of possible parole violation was, for all measurable purposes, the same as rehabilitation.¹³⁴ Drawing from his own previous criminological research, he determined that rehabilitation and recidivism risk were coterminous—three decisions about what matters at parole reduced to one: institutional program participation, correctional discipline, and risk of parole violation.¹³⁵

As a second rationale, the move toward risk was driven by the political critiques *against* rehabilitation. As the Parole Project explained in 1975, “The [U.S. Parole Board] has quite properly abandoned the search for the ‘magic moment’ for release based on rehabilitation that characterized parole release decisionmaking for 20 years.”¹³⁶ Relying on the language of empirical research, the Parole Project affirmed a political trend that had already taken form.¹³⁷ It solidified the turn away from rehabilitation by noting that “[e]xtensive social science research strongly suggests that rehabilitation—defined as an increasing likelihood of successful adjustment upon release—cannot be observed, detected or measured.”¹³⁸ In response,

over time. See AGAINST PREDICTION, *supra* note 1, at 70–71 (describing the methodological underpinnings of the Salient Factor Score).

132. Gottfredson et al., *supra* note 131, at 40–43 (describing parole guidelines pilot project implementation and listing indications of guideline divergence); see also 28 C.F.R. § 2.20(c) (1976) (implementing parole guidelines nationally).

133. Peter B. Hoffman, *Paroling Policy Feedback*, 9 J. RES. CRIME & DELINQ. 117, 117–18 (1972).

134. See *id.* at 124 (noting “[s]trong correlations” among institutional progress, discipline, and parole risk).

135. Hoffman also studied a fourth factor—the severity of the present offense. Because that factor remains an independent component at sentencing, it is not referenced in the above text. See *id.* at 121.

136. Project, *supra* note 104, at 826–27.

137. See Tonry, *Obsolescence*, *supra* note 120, at 1252 (noting that faith in the rehabilitative ideal declined far earlier than 1974); see also Cullen, *supra* note 24, at 326–28.

138. Project, *supra* note 104, at 826–27.

the commission literally recast rehabilitation as risk when it translated “parole prognosis” into the assessment of recidivism risk.¹³⁹

Third, the turn away from rehabilitation was animated by racialized assumptions in two ways. There were unfounded assumptions about which prisoners could be rehabilitated as the prison population became majority minority.¹⁴⁰ There were assumptions about the source of racial disparities as well. Policymakers in the 1970s converged on the threat of arbitrary exercise of an individual judge’s discretion as the locus of concern in sentencing reform.¹⁴¹ They largely turned a blind eye to the structural changes in policing practices and sentencing policies as the source of increasing disparities.¹⁴² Because parole guidelines were developed in part to ameliorate disparities at sentencing,¹⁴³ advocates put forth recidivism risk as a promising method to standardize sentencing outcomes without addressing front-end policies.¹⁴⁴

Once again, the rise of risk technologies was not the product of its empirical value, but sentencing did change to accommodate technology. In response to characterizations about society and a desire to find an abstract solution to social problems, risk tools proliferated. In the wake of parole guidelines implementation, the structure of parole remained, but the guiding theory justifying its existence did not. In its place, parole boards implemented what had been a largely off-purpose use of the tools. Whereas actuarial risk tools were “not designed to give the optimum time for release” in the 1960s, by the 1970s that is exactly how the tools were used.¹⁴⁵

Parole guidelines would quickly expand across the states throughout the 1970s and 1980s.¹⁴⁶ Many states would adopt actuarial risk tools as part of

139. See Gottfredson et al., *supra* note 131, at 37. Notably, the technical advisors constructing the Salient Factor Score drew on methodologies to predict risk present since the 1930s in Illinois. See AGAINST PREDICTION, *supra* note 1, at 70–71.

140. HINTON, *supra* note 97, at 169 (attributing the modernization of prisons and prison release programs to the increasingly majority minority prison populations and “the view of national officials and policymakers” who believed that “this ‘new class of inmates’ . . . were incapable of responding to rehabilitative attempts”); FRANCIS A. ALLEN, THE DECLINE OF THE REHABILITATIVE IDEAL: PENAL POLICY AND SOCIAL PURPOSE 30–31 (1981) (noting that rehabilitation declined with the rising non-white prison population).

141. See, e.g., AM. FRIENDS SERV. COMM., STRUGGLE FOR JUSTICE: A REPORT ON CRIME AND PUNISHMENT IN AMERICA 107–12 (1971); KENNETH CULP DAVIS, DISCRETIONARY JUSTICE: A PRELIMINARY INQUIRY (1969).

142. See, e.g., Charles J. Ogletree, Jr., *The Death of Discretion? Reflections on the Federal Sentencing Guidelines*, 101 HARV. L. REV. 1938, 1958 & n.119 (1988) (warning that racial disparities will persist in noncapital sentencing if mitigating factors are not taken into consideration and urging reforms that address structural problems like criminal history).

143. Bottomley, *supra* note 101, at 337–38.

144. See, e.g., John C. Coffee, Jr., *The Repressed Issues of Sentencing: Accountability, Predictability, and Equality in the Era of the Sentencing Commission*, 66 GEO. L.J. 975, 1005 (1978).

145. See Evjen, *supra* note 118, at 216.

146. Bottomley, *supra* note 101, at 344.

their release process as well.¹⁴⁷ Others would curtail or eliminate parole altogether.¹⁴⁸ At the same time, federal agencies would fund technical projects that shifted focus from parole to sentencing.¹⁴⁹ In the wake of the parole guidelines' "success," sentencing guidelines to limit and control judicial sentencing discretion would emerge.¹⁵⁰

2. Sentencing Guidelines

Sentencing guidelines, like parole guidelines before them, were explicit technosocial reforms meant to standardize sentencing outcomes.¹⁵¹ Driven by the political desire to make sentencing more accountable, rational, and transparent¹⁵² and acting in the name of uniformity, almost half the states and the federal government created sentencing commissions or legislative committees at one time or another to develop mandatory or voluntary guidelines with technical assistance.¹⁵³ While parole guidelines applied to parole boards, sentencing guidelines were developed to constrain judicial discretion directly.¹⁵⁴ Those guidelines would mirror technical form to the parole guidelines, including a role for recidivism risk.

147. See SIMON, POOR DISCIPLINE, *supra* note 103, at 169 (detailing orientation around risk); AGAINST PREDICTION, *supra* note 1, at 9 fig.1.1 (documenting the rise of actuarial prediction instruments in parole).

148. Bottomley, *supra* note 101, at 341–47.

149. See, e.g., Kress et al., *supra* note 97, at 216 n.1 (noting funding support from the LEAA); HINTON, *supra* note 97, at 163–75 (detailing the connection between LEAA funding initiatives and correctional policy reforms).

150. See Kress et al., *supra* note 97, at 220 (characterizing the parole guideline development as “successful”).

151. Current guideline states include Alabama, Arkansas, Delaware, District of Columbia, Florida, Kansas, Maryland, Michigan, Minnesota, Missouri, North Carolina, Ohio, Oregon, Pennsylvania, Tennessee, Utah, Virginia, Washington, and the Federal system. Rachel E. Barkow, *Sentencing Guidelines at the Crossroads of Politics and Expertise*, 160 U. PA. L. REV. 1599, 1600 (2012); *Sentencing Guidelines Resource Center: In-Depth Jurisdiction Profiles*, ROBINA INST. CRIM. L. & CRIM. JUST., <https://sentencing.umn.edu/profiles/alabama> (last updated Aug. 23, 2019). In addition, there are states that have developed guidelines but the legislature did not ratify them. In states like Massachusetts, courts commonly use them anyway. See *Massachusetts Guidelines Jurisdiction*, ROBINA INST. CRIM. L. & CRIM. JUST., <https://sentencing.umn.edu/profiles/massachusetts> [<https://perma.cc/7LCL-E4NU>] (last updated Mar. 26, 2018).

152. For the paradigmatic advance of these concepts in sentencing, see generally MARVIN E. FRANKEL, *CRIMINAL SENTENCES: LAW WITHOUT ORDER* 7 (1973) (calling for “consistency,” “ordered rationality,” and “standards” in sentencing).

153. Of course, efforts to reduce disparities in sentencing existed before Judge Frankel’s call to arms in 1973. See, e.g., Shari Seidman Diamond & Hans Zeisel, *Sentencing Councils: A Study of Sentence Disparity and its Reduction*, 43 U. CHI. L. REV. 109, 116–18 (1975). Moreover, the call for systemic regulation of discretion in the criminal justice system also existed before Judge Frankel’s call for reform. See, e.g., DAVIS, *supra* note 141. Yet Judge Frankel’s precise critiques of “lawless sentencing” are largely considered the “brainchild” of what we now understand as the sentencing guidelines, particularly in the federal system.

154. Virginia was, to start, an outlier in its advisory rather than mandatory nature. Only after the Supreme Court’s decisions in *Blakely v. Washington* (2004) and *United States v. Booker* (2005) were guidelines across the states recharacterized as advisory rather than mandatory. See John F. Pfaff, *The*

Sentencing guidelines sought to structure judicial decisionmaking around two factors: crime severity and offender characteristics.¹⁵⁵ In fact, the same technicians who developed the parole guidelines influenced or constructed leading sentencing guidelines.¹⁵⁶ The underlying studies that produced their frameworks also originated from projects funded by the Law Enforcement Assistance Administration.¹⁵⁷ Dr. Peter Hoffman served as a technical advisor on several of the leading sentencing commissions creating guidelines, including Minnesota and Washington State during his time as a Director of Research at the U.S. Parole Commission.¹⁵⁸ In particular, he advocated for and replicated the two-dimensional structure now prevalent in most guideline systems. Hoffman, a primary developer of the Salient Risk Factor tool in the parole guidelines, would bring the biaxial framework to the state guideline systems. To the federal guidelines, he brought the actuarial risk assessment technique as well when he served as the Principal Technical Advisor and primary drafter in constructing the federal sentencing guidelines.¹⁵⁹

Yet sentencing guidelines and parole guidelines differed in an important respect pertaining to recidivism risk. While the structure of the guidelines was the same, the parole guidelines considered the Salient Risk Factor Score in the same location that the sentencing guidelines considered criminal history categories.¹⁶⁰ Thus, a clear connection existed between the criminal

Continued Vitality of Structured Sentencing Following Blakely: The Effectiveness of Voluntary Guidelines, 54 UCLA L. REV. 235, 237 (2006). Adherence to the guidelines (and notably the federal guidelines) remained largely the same before and after the guidelines were rendered advisory. For example, judicial adherence to the federal guidelines hovers somewhere around 80 percent if you include prosecutorial motions to divert from the guidelines in the metric of departure. See U.S. SENTENCING COMM'N, SENTENCES RELATIVE TO THE GUIDELINE RANGE OVER TIME (2006–2017), https://isb.ussc.gov/api/repos:/USSC:figure_xx.xcdf/generatedContent?&table_num=Figure_T4. The Supreme Court continues to struggle with the meaning of advisory versus mandatory sentencing guidelines. See, e.g., *Beckles v. United States*, 137 S. Ct. 886 (2017).

155. See MICHAEL TONRY, SENTENCING MATTERS 10 (1996).

156. Kress et al., *supra* note 97, at 220 (describing their sentencing guideline research project, which “grew out of the successful completion of a decision-making study which developed guidelines for the United States Board of Parole”).

157. *Id.*

158. See Coffee, *supra* note 144, at 1005; see also Brent E. Newton & Dawinder S. Sidhu, *The History of the Original United States Sentencing Commission, 1985–1987*, 45 HOFSTRA L. REV. 1167, 1195, 1288 (2017) (emphasizing Hoffman’s role in federal sentencing guidelines construction as pinch hitter in late stage construction, along with involvement in Minnesota).

159. See Newton & Sidhu, *supra* note 158, at 1195, 1288 (following the advice of Hoffman, the U.S. Sentencing Commission modeled criminal history categories “more on the federal parole guidelines—in particular, its Salient Factor Score (“SFS”)—than on criminal history provisions of the state guidelines”).

160. Most guidelines offer a criminal history score based on points accumulated from prior engagement with the criminal justice system. In this sense, state guidelines are deeply influenced by the Salient Risk Score used in the U.S. parole guidelines described above. For discussion of variety, see RICHARD S. FRASE ET AL., ROBINA INST. CRIM. L. & CRIM. JUST., CRIMINAL HISTORY ENHANCEMENTS SOURCEBOOK (2015).

history categories and recidivism risk for *technical guideline developers* from the start.

Criminal justice actors, however, converged on *criminal history* as the primary mechanism to calculate offender characteristics in sentencing guidelines. For example, Pennsylvania's Sentencing Commission converged on the offender's criminal history as the measure of criminality.¹⁶¹ Minnesota would similarly converge on criminal history factors in place of the Salient Factor Score.¹⁶² By the time the U.S. Sentencing Commission sought comments for its sentencing guidelines in 1986, commentators treated criminal history as the obvious and key factor to account for defendants' differences.¹⁶³ Even states that did not adopt sentencing guidelines but changed their sentencing statutes used the language of risk but only identified factors related to criminal history.¹⁶⁴ State and federal actors explicitly rejected additional risk factors used by technical developers as a means to consider criminality at sentencing. For example, while technical assessments of risk included factors like age and employment status, risk assessments incorporated into sentencing guidelines did not.¹⁶⁵

There are two reasons for this convergence on criminal history rather than broader predictive risk factors. First, law and policymakers sought to avoid philosophical conflict. With the turn away from rehabilitation, lawmakers sought to avoid a contentious divide between those adhering to a retributive orientation and those adhering to consequentialist concerns.¹⁶⁶ Converging on criminal history as the offender characteristic offered an ambiguous method to do both.¹⁶⁷ Criminal history was accorded a natural legitimacy at sentencing even if for undefined reasons.¹⁶⁸ Second, social

161. See Lynch & Bertenthal, *supra* note 75, at 151 (referencing letters from PA Commissioner to Commissioner Block).

162. ANDREW VON HIRSCH, PAST OR FUTURE CRIMES: DESERVEDNESS AND DANGEROUSNESS IN THE SENTENCING OF CRIMINALS 134–37 (1985).

163. See Lynch & Bertenthal, *supra* note 75, at 151 (referencing letters from PA Commissioner to Commissioner Block).

164. See, e.g., OHIO REV. CODE ANN. § 2929.12(D)-(E) (West 1973) (urging courts to consider “risk that the offender will commit another offense and the need for public protection”).

165. See Tonry, *Issues*, *supra* note 74, at 168 (displaying chart with distinctions between risk factors used in criminal justice contexts over time).

166. The turn toward retribution was in part a turn away from risk. See, e.g., JOHN KLEINIG, PUNISHMENT AND DESERT (1973); ANDREW VON HIRSCH, DOING JUSTICE: THE CHOICE OF PUNISHMENTS: REPORT OF THE COMMITTEE FOR THE STUDY OF INCARCERATION (1976); VON HIRSCH, *supra* note 162, at 22–23, 131 (focusing on the “in-out” line on sentencing guidelines to demonstrate desert versus incapacitation theories of construction). Utilitarians ultimately converged on risk after some division on deterrence. See, e.g., RICHARD A. POSNER, ECONOMIC ANALYSIS OF LAW (1975); JAMES Q. WILSON, THINKING ABOUT CRIME (rev. ed. 1983).

167. See, e.g., U.S. SENTENCING COMM'N, GUIDELINES MANUAL § 1A1.1 (2004).

168. See, e.g., Benjamin Ewing, *Prior Convictions as Moral Opportunities*, 45 AM. J. CRIM. L. 253 (2019).

justice concerns justified reliance on criminal history. While some were concerned that criminal history itself would institutionalize race and class into the guidelines, there was clear awareness that including any other risk factors was destined to do so.¹⁶⁹ Thus criminal history emerged as the objective factor in line with human values.

In short, policymakers developing sentencing guidelines were confronted with a choice about whether and how to consider actuarial risk assessments. Though some commissions took empirical literature into account in developing their criminal history categories,¹⁷⁰ the decision to converge on criminal history rather than simply recidivism risk was to a greater extent an attempt to make technology heel to human values reflected at sentencing.¹⁷¹ To be sure, the *orientation* around risk was driven at least in part by technical path dependence from predecessor technologies influenced by WWII and Cold War experts.¹⁷² But realism and human values combined to serve as a limit on the expansion of that technology at sentencing. Accordingly, states used factors related to criminal history as the basis to individualize standardized sentencing ranges in the technical guidelines.

C. Actuarial Tools Revisited

As noted above, states are again building technological infrastructure at sentencing. Today's risk tools are at once the continuation of a path and a divergence from it. Instead of making the tools fit into sentencing, sentencing is now adjusting to fit the tools.

In part, this may have occurred because law and policymakers made risk central to sentencing policy in the 1980s and 1990s. As technical reforms proliferated across the states, law and policymakers reshaped sentencing law and policies around actuarial techniques. While three strikes laws are

169. See, e.g., Lynch & Bertenthal, *supra* note 75, at 150–51.

170. See AGAINST PREDICTION, *supra* note 1 (detailing the empirical literature converging on criminal history as the primary predictor in risk tools leading up to the 1970s).

171. As a further example, over time states adopted “decay” provisions that limit the time within which a prior crime can count towards the current sentence range. See, e.g., Julian V. Roberts & Orhun H. Yalincak, *Revisiting Prior Record Enhancement Provisions in State Sentencing Guidelines*, 26 FED. SENT'G REP. 177 (2014); Dawinder S. Sidhu, *Moneyball Sentencing*, 56 B.C. L. REV. 671, 723 (2015) (introducing limits to federal sentencing guidelines).

172. Alfred Blumstein, *An OR Missionary's Visits to the Criminal Justice System*, 55 OPERATIONS RES. 14, 15 (2007) (“Even though the issue of recidivism has always been of central interest to both criminologists and practitioners, . . . key features that were provoked by the feedback model[constructed in the development of technosocial reforms]—in particular, the distinctions between recidivists and first-timers and the time lags involved in recidivism—had not previously been explored.” (emphasis added)). For more discussion, see Newton & Sidhu, *supra* note 158, at 1289–90 (crediting federal criminal history construction to Peter Hoffman almost exclusively); see also Hoffman & Stone-Meierhoefer, *supra* note 127, at 63 (advocating for application of the biaxial parole guidelines to sentencing guidelines).

the most notable example, states and the federal government expanded a variety of recidivist enhancements in statutes and in their guidelines to increase a defendant's sentence as a crude predictor of recidivism.¹⁷³ In essence, the more states cared about criminal risk, the more susceptible to consideration of actuarial risk technologies we would become.

This Article suggests a richer account is necessary to explain this transition. The standard narrative sustains an exclusive focus on the technical changes achieved over time. It obscures the social changes. Yet this brief history of predecessor sentencing technologies offers two important insights that undermine this narrative. First, technical reforms were meant to shape the social. That is the nature of the "technosocial." In the beginning, the social did shape the technical. Part I demonstrates that today, there has been a pivotal switch obscured by the standard narrative. Second, this history begs an open question: what are those social transformations spurred by the introduction of technology itself? Furthermore, how do those transformations sustain actuarial risk tools' advance as sentencing reform now?

Here is where a counternarrative is necessary. Right now, there is no language to describe this shift in focus. Through the standard narrative it appears logical and consistent with human values. But the pursuit of technological advancement in sentencing is not a foregone conclusion. More to the point, it is not costless. Technological reforms induce long-lasting effects on society that shape our sensibilities over time. It reduces our ability to articulate objection to tool advance that evade quantification because technology literally claims our words. The following Part shows how. In so doing, it gives substance to sentencing's technological counternarrative. Specifically, it illuminates the reality that technology distorts the social concepts that shape our human interactions, and not because our human values evolve.

Before identifying and analyzing shifting social concepts, it is important to explain what does *not* generate this transformation. It is not technological advancement for its own sake. As this novel history illuminates, the technology may be advancing but it can only expand where the social conditions are right. Indeed, advocates suggest as much when they draw upon the history of the tools. More importantly, the catalyst of social transformation is not mass incarceration. This sociohistorical phenomenon provides context for improving carceral processes. It is not a reason to change social ideas that shape punishment. Those ideas have already changed, and our responses illuminate how. Said differently, the social and

173. See, e.g., U.S. SENTENCING COMM'N, GUIDELINES MANUAL § 4A1.1 (2018); WASH. REV. CODE § 9.94A.010 (1999); see generally AGAINST PREDICTION, *supra* note 1, at 91–103 (detailing proliferation of criminal history-based sentencing enhancements modeled on the actuarial paradigm).

economic pressures of mass incarceration may provoke us to implement change, but the crisis itself does not show us how to do it. Human values drive that transformation. And it is in those human values—what we think we are doing—that we can see how technology altered our social concepts. At the intersection of rhetoric and reform, our choices glean insight to technologically-induced mutations that have already occurred.

III. ILLUMINATING THE COUNTERNARRATIVE: MUTATING SOCIAL CONCEPTS AROUND TECHNOLOGIES

This Part builds from the technical history in Part II to lay out a counternarrative to the advancement of risk tools now. It locates the rise of risk tools in three social transformations that have occurred through or alongside the proliferation of sentencing technologies that make statistically robust actuarial risk tools acceptable as sentencing reform. Part A considers how rehabilitation, one of the theoretical justifications of punishment, has altered to more closely reflect incapacitation through the pursuit of technical knowledge. Part B considers how “racial justice” distributed through a focus on technical guideline uniformity reified structural racism while deifying technical formalism. Part C traces the convergence of dangerousness and risk in social meaning. Each of these social transformations facilitates the proliferation of actuarial risk tools not because the technology advances, but because technology changed society.

A. “Rehabilitation” and the Theoretical Obfuscation of Incapacitation

The first transformation concerns the meaning of “rehabilitation.” As noted above, risk tools are central to the demise of rehabilitation. As this Part highlights, the tools are critical to its recent resurgence as well. Obscured in this “pendulum swing” is the fundamental transformation of rehabilitation’s meaning, the central role that technology played in altering that social concept, and its connection to the proliferation of risk tools today without resistance. In other words, technology changed rehabilitation, and not because our human or political values altered.

With the demise of rehabilitation, no single theory emerged to animate sentencing reforms. Scholars largely converged on variations of retribution. In practice, however, the driving theory appeared to be some version of incapacitation, meaning the removal of an offender’s ability to commit future crime.¹⁷⁴ While incapacitation has long been a theory of punishment, it would ascend with the introduction of risk technologies and the expansion

174. See, e.g., Kevin Bennardo, *Incarceration’s Incapacitative Shortcomings*, 54 SANTA CLARA L. REV. 1, 2 (2014).

of the carceral state. By 1982, the controversial theory of “selective incapacitation” would emerge in public policy and scholarly circles.¹⁷⁵ The brainchild of military-research outpost RAND Corporation, this version of incapacitation seeks to identify high-risk defendants through an actuarial risk tool for long prison sentences in order to save costs and reduce crime.¹⁷⁶ But rather than selectively incapacitating the few offenders that posed a threat of dangerousness, states converged on “total incapacitation” by incarcerating large swaths of the population.¹⁷⁷ Though a highly criticized theory due to its limitless bounds, the expansive theory of incapacitation through incarceration proved a popular approach to addressing both crime and social ills.

Risk becomes a critical component of incapacitation because the threat of future criminal behavior legitimates the state’s punitive intervention. In recent years, however, the expansion of statistically robust actuarial tools at sentencing has been legitimated on an alternative ground—rehabilitation. Rehabilitation justifies punishment as a means to reform wrongdoers so that they will not choose to engage in crime in the future.¹⁷⁸ As Judge Roger Warren explained in 2009, using risk tools at sentencing promotes “public safety through ‘recidivism reduction.’”¹⁷⁹ Though he suggested that “‘rehabilitation’ terminology” does not fully capture this aim, he acknowledged that the approach generated from this theory.¹⁸⁰ Justice William Ray Price, Jr., in 2010, emphasized that consideration of risk tools allows the judge to “assess[] each offender’s risk and then fit[] that offender with the cheapest and most effective rehabilitation that he or she needs.”¹⁸¹ Similarly, the National Center for State Courts endorsed the use of risk tools for sentencing decisions that are in essence correctional because the tools

175. See, e.g., Note, *Selective Incapacitation: Reducing Crime Through Predictions of Recidivism*, 96 HARV. L. REV. 511 (1982); MARK H. MOORE ET AL., DANGEROUS OFFENDERS: THE ELUSIVE TARGET OF JUSTICE (1984).

176. RAND Corporation proposed selective incapacitation as a “coherent scheme” at sentencing in 1982. See PETER W. GREENWOOD & ALLAN ABRAHAMSE, RAND CORP., SELECTIVE INCAPACITATION (1982). Researchers surmised that strategically identifying and incapacitating the select individuals believed to be responsible for a disproportionate share of crime could reduce crime without significantly increasing correctional costs. *Id.* The study offered an actuarially derived seven-factor predictive scale that would identify these select individuals for long-term confinement. *Id.*

177. See Jonathan Simon, *The Second Coming of Dignity*, in THE NEW CRIMINAL JUSTICE THINKING 275, 299 (Sharon Dolovich & Alexandra Natapoff eds., 2017); see also JONATHAN SIMON, MASS INCARCERATION ON TRIAL: A REMARKABLE COURT DECISION AND THE FUTURE OF PRISONS IN AMERICA 17–44 (2014).

178. See MODEL PENAL CODE: SENTENCING § 6.02A cmt. a (AM. LAW INST. 2017).

179. Roger K. Warren, *Evidence-Based Sentencing in the State Courts*, 27 FED. SENT’G REP. 248, 251 (2015).

180. *Id.* at 250–51.

181. Hon. William Ray Price, Jr., Chief Justice of the Supreme Court of Mo., State of the Judiciary Address (Feb. 3, 2010), <https://www.courts.mo.gov/page.jsp?id=36875> [<https://perma.cc/UC6H-W8LW>].

can encourage judicial focus on rehabilitative efforts.¹⁸² To be sure, many recognize that the tools ensure treatment or surveillance that can also hold defendants accountable,¹⁸³ yet the association with rehabilitation is there.¹⁸⁴

This shift in association is understandable, but only because the introduction of risk technologies had the effect of changing rehabilitation. When the parole board simplified rehabilitation into a “risk,”¹⁸⁵ the conceptual change stuck. When Robert Martinson and others critiqued rehabilitation on the basis of its empirical efficacy,¹⁸⁶ it had a lasting effect on the idea of rehabilitation as well. As Francis Cullen explains, “It transformed the debate on rehabilitation from a broad and complex critique of the welfare state into the narrower and simpler issue of effectiveness.”¹⁸⁷ Most rehabilitation scholars responded to the “nothing works” critiques by focusing on program effectiveness.¹⁸⁸ If rehabilitation declined in part because it could not be standardized and proven effective as a technical matter, these scholars committed themselves to rehabilitating rehabilitation by proving its effect on risk. In other words, they saved rehabilitation by making the technical assessment of risk central to the theory.

This transformation is wrapped up in the narrative of technological advancement. Pervasive genealogies of actuarial risk tools emphasize the promise of this evolution in risk technologies toward risk and needs responsivity.¹⁸⁹ The “new” tools are not like the “old” tools designed to further selective incapacitation because they identify specific and general risk levels, along with specific interventions.¹⁹⁰ As rehabilitation scholar Don Andrews notes, “past (type 2) assessments of risk fail to prescribe interventions, and ignore the fact that, once in the correctional system,

182. CTR. FOR SENTENCING INITIATIVES, *supra* note 29.

183. *Id.*; see also Warren, *supra* note 179, at 250.

184. See Collins, *Punishing Risk*, *supra* note 29, at 73–74, 85–91 (emphasizing that “off label” use of popular risk tools at sentencing is encouraged because of its association with rehabilitation).

185. See *supra* notes 136–39 and accompanying text.

186. Martinson, *supra* note 95, at 25 (concluding that “[w]ith few and isolated exceptions, the rehabilitative efforts . . . have had no appreciable effect on recidivism”).

187. Cullen, *supra* note 24, at 329.

188. *Id.* at 335–45 (referencing the seminal research of Paul Gendreau, Donald Andrews, James Bonta, and others). Cullen, on the other hand, argued to maintain rehabilitation for its systemwide benefits. See *id.*

189. See *id.* at 335–45 (detailing emergence of the risk and needs approach); see also *supra* note 65.

190. There are about four “generations” of risk tools. Hannah-Moffat, *Punishment*, *supra* note 56, at 132–36. The first generation refers to clinical assessments, meaning those done by persons based on experience. *Id.* at 132–33. The second refers to those standardized assessments meant to predict likelihood of recidivism based on static factors. *Id.* at 133–34. The third predicts risk based on static and dynamic factors, including those behavior factors that can be changed. *Id.* at 135. The line between the third and fourth generation is a bit murky, but fourth generation tools are meant to identify specific needs to respond to the mutable characteristics that render some defendants at higher risk of recidivism. *Id.* at 136.

offenders are subject to events and experiences that may produce shifts in their chances of recidivism.”¹⁹¹ Accordingly, these scholars pushed beyond criminal history as a predictor of risk to include changeable factors referred to as needs.¹⁹²

In short, rehabilitation transformed to accommodate the pursuit of technical knowledge.¹⁹³ In the process, risk technologies were increasingly insulated from critique because of their association with rehabilitation.¹⁹⁴ The history of actuarial risk tools’ evolution *is* the social history of risk being disassociated with incapacitation and written within the narrative of technological advancement. Indeed, most developers reference the seminal work of rehabilitation scholars when constructing actuarial risk tools.¹⁹⁵ In this sense, the risk technologies proliferating today are aligned with various correctional intervention technologies.¹⁹⁶ But that is not because the tools inherently reflect rehabilitation; rather, it is because rehabilitation came to reflect risk technologies.

Contrary to the standard narrative of technological advancement, the benefit of this transformation is debatable, particularly as this mutation expands from corrections to sentencing. Advocates suggest expanding the consideration of risk is a pragmatic reform central to being “smart on crime.”¹⁹⁷ They applaud states for being “selective and cautious” rather than “starry-eyed and egalitarian” in the pursuit of criminal justice reform.¹⁹⁸

In the context of sentencing rather than corrections, however, the expansion of actuarial risk tools rings of selective incapacitation.¹⁹⁹ As I have explained elsewhere, selective incapacitation and neorehabilitation exist along the same theoretical spectrum, only with a different rhetoric bolstering its advance. Neorehabilitation uses the idea of selective incapacitation to reframe incapacitative interventions for low-risk defendants as rehabilitative programming justified on the basis of its ability

191. Hannah-Moffat, *Punishment*, *supra* note 56, at 135 (quoting D. A. Andrews, *Recidivism Is Predictable and Can Be Influenced*, 1 F. ON CORRECTIONS RES. 11, 11–17 (1989)); *see also* D. A. Andrews et al., *Classification for Effective Rehabilitation*, 17 CRIM. JUST. & BEHAV. 19 (1990).

192. Hannah-Moffat, *Punishment*, *supra* note 56, at 135–37.

193. *See* Cullen, *supra* note 24, at 329 (noting that critiques of rehabilitation’s ineffectiveness “unwittingly gave advocates of rehabilitation a strategy for turning a losing battle into a winning war”).

194. *See, e.g.*, Melissa Hamilton, *Risk-Needs Assessment: Constitutional and Ethical Challenges*, 52 AM. CRIM. L. REV. 231, 242–61 (2015) (noting that to constitutionally attack risk tools one must critique rehabilitation).

195. *See* Klingele, *supra* note 20; *see also* Eaglin, *Constructing*, *supra* note 12.

196. *Cf.* Collins, *Punishing Risk*, *supra* note 29 (critiquing the use of risk tools designed for correctional purposes in the sentencing context).

197. Mary D. Fan, *Beyond Budget-Cut Criminal Justice: The Future of Penal Law*, 90 N.C. L. REV. 581, 635 (2012).

198. *Id.* at 586, 637.

199. *See* Eaglin, *Against Neorehabilitation*, *supra* note 5, at 222–23.

to reduce crime and reduce correctional costs.²⁰⁰ While these management techniques may seem to have some basis in rehabilitating some offenders, the animating ethos of the reform is not the egalitarian aim of traditional rehabilitative interventions of yore, which sought to improve the lives of the defendants processed through the criminal justice apparatus for their sake alone. Instead the ethos lies in the efficient management of groups of people and effectiveness of the carceral state itself.²⁰¹

In practice, blurring this line between rehabilitation and incapacitation may legitimate expanding criminal justice surveillance while also expanding the reach of the criminal justice system. For example, introducing actuarial risk assessments may encourage judges to impose some form of supervision for defendants that would otherwise have been diverted with little or none.²⁰² At the same time, risk tools may encourage judges to impose longer sentences or more onerous surveillance mechanisms for high-risk defendants that prove disintegrative socially and economically.²⁰³ The introduction of electronic monitoring devices has operated in just this manner.²⁰⁴ Yet because the courts or policymakers perceive the interventions as benevolent responses to *recidivism risk*—

200. See *id.* at 222–24 (defining neorehabilitation as the dominant framework for sentencing reforms adopted in response to mass incarceration); see also Erin R. Collins, *Status Courts*, 105 GEO. L.J. 1481, 1499–1500 (2017); Eric J. Miller, *Drugs, Courts, and the New Penology*, 20 STAN. L. & POL'Y REV. 417, 441 (2009) (critiquing neorehabilitation in context of drug courts).

201. Eaglin, *Against Neorehabilitation*, *supra* note 5, at 199–201.

202. This scenario could arise, for example, where an individual characterized as low-risk is subjected to multiple low-visibility criminal justice interventions that can ultimately be more onerous for reintegration than a short stint of incarceration. For examples of low-visibility criminal justice interventions intersecting with risk assessments, see GARRETT ET AL., *supra* note 42, at 8 tbl.2 (identifying various alternative sanctions like electronic monitoring, jailing, and community service available for defendants identified as “low risk” in Virginia). For further explanation of the disintegrative nature of excessive supervision conditions, see, for example, Eaglin, *Paradigm*, *supra* note 15, at 631–32.

203. See Starr, *Rationalization*, *supra* note 25, at 867–70 (discussing experimental study of students exposed to risk assessments where sentences increase for defendants categorized as high risk); Stevenson & Doleac, *supra* note 4, at 13 (finding that risk assessments in Virginia’s sentencing structure have led judges to impose sentences that are 29–46 percent longer where not classified as low risk); Collins, *Punishing Risk*, *supra* note 29, at 68–69 (providing anecdotal evidence of a Wisconsin judge sentencing a defendant to longer term of incarceration due to the influence of an actuarial risk assessment).

204. See Erin Murphy, *Paradigms of Restraint*, 57 DUKE L.J. 1321, 1333–34 (2008) (noting the expansion of GPS monitoring for sex offenders beyond formal supervision periods and to expanding types of offenders); Avlana K. Eisenberg, *Mass Monitoring*, 90 S. CAL. L. REV. 123 (2017) (noting critiques of GPS monitoring devices as a supplement rather than a substitute for other forms of punishment and suggesting constitutional limits to prevent this occurrence); see also *id.* at 152 n.168 (collecting citations that highlight the challenges associated with seeking or maintaining a job while on electronic monitoring).

which in itself demands some form of response—their incapacitative nature will go unnoticed or worse, be considered beneficial.²⁰⁵

At a theoretical level, this social transformation is deeply problematic. As Michael Tonry and Cecelia Klingele have recently warned, the rise of actuarial risk tools introduces the threat of *forgetting* our past.²⁰⁶ This counternarrative offers new insight to this tension. Actuarial risk tools “work” as a neorehabilitative reform because the standard narrative obscures history, or at least reframes it in a positive light. Not only does it obscure the problematic history of science run amok in correction facilities,²⁰⁷ it also redefines why we turned away from rehabilitation at all. Part of that turn, as Michael Tonry notes, was driven by demands for individual rights.²⁰⁸ Statistically robust risk tools certainly undermine that value.²⁰⁹

Yet revisiting the role of technology in the demise of rehabilitation highlights another, more structural change in how we chose to allocate government resources. The narrative of technological advancement mutes the politically driven question of how to cope with conditions deemed undesirable, offensive, or threatening. Actuarial risk tools, particularly with their loose affiliation with rehabilitation, legitimate “intensified intrusion and castigatory oversight” rather than, for example, investing in communities and general welfare as if the two were equivalent political options.²¹⁰ Just because we can predict risk does not mean that we should deal, or always have dealt, with it through the criminal apparatus. Indeed, historian Elizabeth Hinton’s recent book on the transition from the War on Poverty to the War on Crime hinges on the political shift in focusing on risk in criminal justice administration rather than outside it.²¹¹ The rise of actuarial risk tools at sentencing highlights this transformation as well. Actuarial risk tools proliferated in the parole and prison context as a means to isolate localized communities from criminal justice. At the same time, the state underwent a fundamental restructuring whereby it placed resources in criminal enforcement while defunding the welfare state. The orientation

205. See, e.g., Eisenberg, *supra* note 204 (analyzing electronic monitoring as punishment through lens of rehabilitation, deterrence, and retribution but specifically excluding analysis through an incapacitative lens).

206. See Tonry, *Issues*, *supra* note 74, at 167; Klingele, *supra* note 20, at 575–76 (noting the “danger of forgetting” that risk tools present in corrections).

207. See, e.g., Meghan J. Ryan, *Science and the New Rehabilitation*, 3 VA. J. CRIM. L. 261 (2015); Klingele, *supra* note 20, at 575–77.

208. Tonry, *Issues*, *supra* note 74, at 167.

209. See generally *id.*

210. WACQUANT, *supra* note 17, at xxi–ii; Bernard E. Harcourt, *Punitive Preventive Justice: A Critique*, in PREVENTION AND THE LIMITS OF THE CRIMINAL LAW 252, 270–71 (Andrew Ashworth et al. eds., 2013).

211. HINTON, *supra* note 97.

around technology assisted in the obfuscation of this political transformation.²¹²

The standard narrative obscures these changes while removing actuarial risk tools' negative association. Entwining rehabilitation's resurgence and incapacitation through the technical advancement narrative operates to restructure debates about risk tools' advance. In the process, it centers the focus on risk management and why it could work through various programs, rather than what we are doing and its effects on society. Furthermore, to the extent that scholars and policymakers perceive the rise of risk tools as a turn away from retribution rather than just the expansion of incapacitation, they are even less likely to accord skepticism in the face of tools.²¹³ By combining the rehabilitative framing and technological advancement narrative, these features undermine the impetus to limit risk technologies on the basis of philosophies.²¹⁴ This would include, for example, requiring consideration of risk tools in instances where assessments can be regularly administered or limiting the factors upon which risk tools are constructed.²¹⁵

B. Uniformity, Structural Racism, and Technical Formalism

If the first transformation pertains to the conception of a theoretical justification of punishment, the second concerns the relationship between racial justice and technology. Racial justice here means confronting the causes and consequences of enduring racial stratification, most visibly enforced through criminal law. To the extent that parole and sentencing guidelines were adopted in the name of reducing racial disparities neither would resolve that structural dilemma. But instead of recognizing these technologies as an institutionalization of sociohistorical inequalities, studies and policymakers proclaimed it a solution to those inequalities. In the process, the guidelines would fuel an orientation around technical

212. *Id.*; see also Harcourt, *supra* note 210, at 270–71.

213. This “pendulum swing” may be more rhetorical than practical. As Paul Butler noted in 1999, it is difficult to describe much of the sentencing policies of the last thirty years as adhering to retribution rather than incapacitation. See Paul Butler, *Retribution, for Liberals*, 46 UCLA L. REV. 1873, 1883–84 (1999) (noting that the retributive aims of punishment would require reducing racialized impact of punishment); see also Kyron Huigens, *Solving the Apprendi Puzzle*, 90 GEO. L.J. 387, 415–16 (2002) (noting the “uninterrupted dominance of consequentialist conceptions of punishment through most of the last century” despite claims of retribution-oriented reform).

214. See Klingele, *supra* note 20, at 575 (“In many ways, the very term ‘rehabilitation,’ with its connotations of concern for the welfare of the marginalized, provides a dangerous veneer that makes observers less keen to possible abuses of ‘rehabilitative’ tools.”).

215. See Eaglin, *Constructing*, *supra* note 12, at 161–62 (discussing how criminal justice values could shape risk tool construction issues); Collins, *Punishing Risk*, *supra* note 29, at 91–108 (expressing doubt about the use of actuarial risk assessments designed for correctional purposes when used at sentencing).

formalism in sentencing that is critical to the advance of actuarial risk tools now.

This critique draws, by analogy, on the racial realism literature advanced in response to formal equality as a civil rights strategy. While demanding formal equality led to some transformations in society, critics like Derrick Bell have noted that “abstract principles lead to legal results that harm blacks and perpetuate their inferior status.”²¹⁶ Critically, formal equality facilitated abstraction from historical realities, contemporary statistics, and flexible reasoning while “mask[ing] policy choices and value judgments.”²¹⁷ These equality-focused reforms are more harmful, some suggest, *because* they permit relief from guilt or fear of disparate treatment without meaningful engagement in the realities of race and society.²¹⁸

The same can be said of the guidelines and the pursuit of excessive uniformity. Like the focus on formal equality in constitutional jurisprudence, state and federal governments shifted toward a focus on excessive uniformity in sentencing, this time driven by the notion that a partially automating tool, constructed in the abstract, could reduce the threat of “arbitrary” sentencing.²¹⁹ And much like the claims that formal equality succeeded in reducing racial discrimination in society, researchers and studies proclaimed that sentencing guidelines eliminated racial disparities.²²⁰ Together, these notions supported the conclusion that technical projects could fix problems of race and punishment by standardizing sentencing inputs and outcomes.

But the guidelines did not “fix” sentencing; rather, they mechanized it. Beyond the concerns of redistributing sentencing discretion—which are

216. Derrick Bell, *Racial Realism*, 24 CONN. L. REV. 363, 369 (1992).

217. *Id.*

218. See, e.g., Reva B. Siegel, *Discrimination in the Eyes of the Law: How “Color Blindness” Discourse Disrupts and Rationalizes Social Stratification*, 88 CALIF. L. REV. 77, 83, 90–91 (2000); Reva Siegel, *Why Equal Protection No Longer Protects: The Evolving Forms of Status-Enforcing State Action*, 49 STAN. L. REV. 1111, 1119–21 (1997) (developing framework of “preservation-through-transformation” in equal protection law).

219. Compare Ogletree, *supra* note 142, at 1958 (calling for race-conscious provisions to ameliorate the U.S. Sentencing Commission’s failure to address racial disparities in federal sentencing guidelines), with Samuel L. Myers, Jr., *Racial Disparities in Sentencing: Can Sentencing Reforms Reduce Discrimination in Punishment?*, 64 U. COLO. L. REV. 781, 792 (1993) (respectfully critiquing Ogletree’s intervention as “fall[ing] into the same trap” as other race-conscious affirmative action initiatives while demonstrating the shortcomings of parole guidelines in reducing racial disparities for parole release). For insight into the vagueness of “arbitrary” sentencing, see NAOMI MURAKAWA, *THE FIRST CIVIL RIGHT: HOW LIBERALS BUILT PRISON AMERICA* 106–11 (2014).

220. For a list of studies proclaiming guidelines’ success in reducing disparities at sentencing, see Albert W. Alschuler, *The Failure of Sentencing Guidelines: A Plea for Less Aggregation*, 58 U. CHI. L. REV. 901, 915–16 (1991) [hereinafter Alschuler, *Failure*]; Naomi Murakawa & Katherine Beckett, *The Penology of Racial Innocence: The Erasure of Racism in the Study and Practice of Punishment*, 44 LAW & SOC’Y REV. 695, 713 (2010); see generally SAMUEL WALKER, *TAMING THE SYSTEM: THE CONTROL OF DISCRETION IN CRIMINAL JUSTICE 1950–1990* (1993).

significant²²¹—the guidelines made the distribution of punishment more standardized. In large part, this disadvantaged minority defendants because various mitigating factors were excluded or given limited application.²²² To the extent that these guidelines were implemented to address or reduce racial disparities, their “success” is highly debatable. Racial disparities increased in states with or without guidelines during the tough-on-crime decades of the 1980s-1990s.²²³ While supporters of the guidelines advance studies demonstrating reductions in disparity in guideline states, these studies often consider legal factors—like criminal history—as nonracial factors. But this assumption takes for granted the social construction of criminal records. It takes for granted that “the larger context of penal expectations—what constitutes disorder, which behaviors are considered dangerous, and how government should respond—is race-neutral.”²²⁴ Indeed, Albert Alschuler surmised that such studies often “reveal only that the new regime has more consistently applied its own standards” without interrogating those “standards.”²²⁵ Nevertheless, the tinkering with technical sentencing guidelines is considered an appealing intervention when faced with issues of persistent racial disparities.²²⁶

One could ascribe resistance to recognizing the persistence of structural racism permeating in the carceral system as a feature of the standard technological advancement narrative as well. As Naomi Murakawa demonstrates in the context of the federal sentencing guidelines, conservatives and progressives alike converged on modernizing the carceral machine as a means to address structural issues of race in society.²²⁷ For progressives, eliminating the threat of arbitrary discretion would do the work of vindicating racial justice. For conservatives, it would eliminate the possibility of soft judging. On both sides, however, there was a belief that technology could make sentencing better, even if (or because) it required disengaging from reality.²²⁸

221. For an overview of the prosecutorial discretion dilemma in the reallocation of sentencing discretion, see, for example, Rachel E. Barkow, Essay, *The Ascent of the Administrative State and the Demise of Mercy*, 121 HARV. L. REV. 1332 (2008).

222. See Ogletree, *supra* note 142, at 1957–58; see also Andrea Roth, *Trial by Machine*, 104 GEO. L.J. 1245, 1266 (2016) (noting that efforts to mechanize criminal justice administration typically point “away from undue leniency”).

223. See, e.g., MICHAEL TONRY, MALIGN NEGLECT—RACE, CRIME, AND PUNISHMENT IN AMERICA 4 (1995).

224. Murakawa & Beckett, *supra* note 220, at 709.

225. Alschuler, *Failure*, *supra* note 220, at 917; see also Albert W. Alschuler, *Monarch, Lackey, or Judge*, 64 U. COLO. L. REV. 723, 734–35 (1993).

226. Jelani Jefferson Exum, *Forget Sentencing Equality: Moving from the “Cracked” Cocaine Debate Toward Particular Purpose Sentencing*, 18 LEWIS & CLARK L. REV. 95, 148–49 (2014) (describing the U.S. Sentencing Commission’s response to racially disparate mandatory minimums).

227. See MURAKAWA, *supra* note 219, at 109.

228. See *id.*

Putting aside the empirical debate about whether the tools reduced racial disparities or not, they certainly transformed sentencing outcomes. Sentence lengths increased for crimes that disproportionately affect black defendants. As a case in point, drug sentences for crack cocaine increased significantly with the proliferation of federal guidelines.²²⁹ As Jelani Jefferson Exum recently noted, the federal sentencing guidelines anchor crack sentences to powder sentences while overlooking the substantive question of what makes *drug* sentences just for any defendant.²³⁰ Even as the guidelines have been revised to encourage flexibility, they manipulate what judges and society consider the base from which any sentence should be distributed.

Yet sentencing's technological counternarrative suggests that the institutionalization of *technical* guidelines had other effects on society beyond just the transformation of sentencing outcomes. The proliferation of actuarial risk tools in response to the sociohistorical phenomenon of mass incarceration indicates that technical guidelines may have triggered two transformations pertaining to race and technology at sentencing: they reified structural inequality while deifying technical formalism.²³¹ In other words, the guidelines as predecessor technical tools borne of formal equality undermine the role that racial and other social justice claims have on the proliferation of actuarial risk tools now.

Take reification first. The proclamation that guidelines “worked” may have naturalized persistent racial inequities in society and in sentencing outcomes. After creating guidelines with little reference to the political realities of the times—for example, the racialized enforcement of drugs²³²—sentencing guidelines often expanded racial disparities rather than reducing them. Nowhere is this more prevalent than in the implementation of criminal history enhancements as recidivism predictors, a point that Bernard Harcourt emphasizes in his assault on the effect of the actuarial.²³³ Yet this critique applies more broadly. When juxtaposed against the objective and standardized technical guidelines, a “natural” conclusion is that black defendants receive disparate sentences because they engage in more crime. Refusal to engage with the broader structural conditions that lead defendants

229. See Exum, *supra* note 226, at 105 (federal sentencing guidelines accompanied increased sentence lengths for drug offenses).

230. *Id.* at 119–22, 137–43.

231. See DERRICK BELL, *FACES AT THE BOTTOM OF THE WELL: THE PERMANENCE OF RACISM* 101 (1992) (“[T]he legal rules regarding racial discrimination have become not only *reified* (that is, ascribing material existence and power to what are really just ideas)—as the modern inheritor of realism, critical legal studies, would say—but *deified*.”).

232. See, e.g., Exum, *supra* note 226, at 136 (noting that “irrational sentencing policies . . . are largely facilitated by unequal law enforcement and prosecution tactics”).

233. See Bernard E. Harcourt, *Risk as a Proxy for Race: The Dangers of Risk Assessment*, 27 FED. SENT'G REP. 237 (2015) [hereinafter Harcourt, *Risk*]; see also AGAINST PREDICTION, *supra* note 1.

of color to have longer criminal records is in itself a kind of structural racism.²³⁴

Actuarial risk tools build from this insight in more overt ways. The presumption that social conditions are natural is a necessary precondition to the advance of actuarial risk tools to distribute punishment. It suggests that all defendants are formally equal, but some are more likely to commit crime in the future. This is contrary to reality,²³⁵ and can function to “launder in” structural racism.²³⁶ As I have repeatedly asserted, the “objective” factors that culminate to produce “risk” reflect the realities of social neglect and susceptibility to police surveillance.²³⁷ While tools do not consider race directly, they consider factors that correlate with historical disadvantage. As two criminologists recently put it:

Why are you at risk? Well, perhaps you have been involved in law breaking in the past—or, perhaps you have spent time as a young Black man in a community where you will be watched very closely and likely detained for behaviors that would not draw the attention of police in white suburban neighborhoods.²³⁸

One could expand this out, as Naomi Murakawa and Katherine Beckett have, to question why interpersonal violence disproportionately occurs amongst marginalized populations, particularly young black men.²³⁹ Structural disadvantage—meaning lack of access to resources—gives important context to both criminal history and interpersonal violence, which

234. See Murakawa & Beckett, *supra* note 220, at 706 (critiquing the focus on intent-based discrimination in criminal justice administration as a means to “obscure[] the role of race in the U.S. stratification system, the construction of particular issues as crime problems, and in shaping the current propensity to rely on coercive social control mechanisms to solve those problems”).

235. Bernard Harcourt spends a great deal of time explaining why orienting criminal justice policies around risk is not likely to reduce crime, focusing on the elasticities of various subpopulations. See AGAINST PREDICTION, *supra* note 1. I have summarized this empirical argument in the context of “rehabilitative” tools as well. See Eaglin, *Against Neorehabilitation*, *supra* note 5.

236. See GEOFF K. WARD, THE BLACK CHILD SAVERS: RACIAL DEMOCRACY AND JUVENILE JUSTICE (2012) (laundering in racial bias in structured decisionmaking generally); Tim Goddard & Randolph R. Myers, *Against Evidence-Based Oppression: Marginalized Youth and the Politics of Risk-Based Assessment and Intervention*, 21 THEORETICAL CRIMINOLOGY 151, 157 (2017) (laundering in racial bias in risk tools specifically).

237. Eaglin, *Against Neorehabilitation*, *supra* note 5; Eaglin, *supra* note 63; Eaglin, *Constructing*, *supra* note 12. For a powerful summary of the ways black people are disproportionately vulnerable to racialized policing techniques, see Devon W. Carbado, *Predatory Policing*, 85 UMKC L. REV. 545, 549 (2017). For a theoretical framework to further conceptualize how criminal justice administration operates to exacerbate and solidify social marginalization, see Monica C. Bell, *Police Reform and the Dismantling of Legal Estrangement*, 126 YALE L.J. 2054, 2083 (2017).

238. Goddard & Myers, *supra* note 236, at 157.

239. See Murakawa & Beckett, *supra* note 220, at 704–06 (explaining how social science critiques of interpersonal violence and criminal history can downplay or erase structural racism).

actuarial risk tools (and their proponents) deflect.²⁴⁰ In other words, the produced disorder of criminal administration becomes the natural order of things when translated into technical assessments of “risk.”²⁴¹

Actuarial risk tools reify race in the sense that they breathe life into the pervasive stereotype of black criminality, framed in the rhetoric of objective and empirical data. Actuarial risk tools treat socially constructed factors as objective and translate them into an assessment of criminal propensity. While justified as a technical means to reduce incarceration, institutionalizing this reform threatens to reinforce the heart of the criminal-black-man myth. That is, it may affirm the notion that black people (young black men in particular) are more dangerous.²⁴² This is a place we have been before.²⁴³ Only now the data being used is inaccessible and the narrative surrounding it—that of technology—is more durable because we are further enmeshed in the pursuit of technical knowledge.

To the second point, the introduction of technical guidelines may have deified technical reforms both as *the* way to fix sentencing and as *the* means to address racial disparities. Here, following the insights of both political scientist Naomi Murakawa and historian Elizabeth Hinton, efforts to modernize the carceral apparatus since the 1960s have been the way to address critiques of criminal justice and society more broadly.²⁴⁴ To the extent that advocates encourage risk tools as a means to address the crisis of mass incarceration, it appears in line with these previous efforts. Certainly, some states and the federal government are investing a significant amount of time, energy, and resources in developing and defending risk tools in recent years.²⁴⁵ The critique that judges have the “wrong information” and technology can improve upon it similarly bolsters the analogy.

The larger point here, however, is that the technical guidelines may have encouraged the formalism with which many approach actuarial risk tools today. This “technical formalism” refers to two things. First, the broader notion that “recidivism risk” is objective rather than socially constructed, and that factors used to construct it are objective and neutral as well. Second,

240. See *id.* at 706 (critiquing social science research on criminal justice and racial discrimination more broadly).

241. See THE ILLUSION OF ORDER, *supra* note 1, at 150, 161 (discussing Foucault’s notion of subject creation and noting that social concepts are shaped by our punitive practices).

242. See, e.g., Dorothy E. Roberts, *Foreword: Race, Vagueness, and the Social Meaning of Order-Maintenance Policing*, 89 J. CRIM. L. & CRIMINOLOGY 775 (1999); KATHERYN RUSSELL-BROWN, THE COLOR OF CRIME (2d ed. 2009).

243. See KHALIL GIBRAN MUHAMMAD, THE CONDEMNATION OF BLACKNESS: RACE, CRIME, AND THE MAKING OF MODERN URBAN AMERICA (2010).

244. HINTON, *supra* note 97; MURAKAWA, *supra* note 219.

245. See Eaglin, *Constructing*, *supra* note 12 (for example Virginia, Pennsylvania, and the federal system).

the notion that by achieving empirical accuracy regardless of tool construction, tools are legitimate at sentencing just as much as they are in other contexts. Both encourage allowing technology to dictate sentencing policy rather than our human values.

Two caveats are important here. This argument does not suggest that relying on inaccurate risk tools is a better alternative. No, the point is that we are choosing to double down on technology in the face of a social crisis. We have, following Harcourt, “chosen this [technical] conception of just punishment . . . [o]r rather, it chose us.”²⁴⁶ When we cede the foundation of sentencing to technical knowledge because of racial justice critiques, we bind ourselves to the pursuit of technical knowledge. It will not fix discrimination, but it may exacerbate structural racism in ways we cannot yet fathom.

To the second caveat, this critique is not meant to excoriate the notion of sentencing guidelines—guidance to the court is valuable. But the way we chose to write guidelines—as technical projects derived of World War II and Cold War technologies—had an impact that cannot be quantified, but is being replicated. To the extent that scholars and advocates insist upon a “compared to what” argument, that too is the technological advancement narrative at work in sentencing. There are other ways to address racial inequality in the distribution of punishment. As Jelani Jefferson Exum recently suggested, one approach would be to focus on the purposes of punishment that guide judges.²⁴⁷ Another is to write the guidelines substantively rather than technically—a point Albert Alschuler has made for years.²⁴⁸ In other words, state actors could try to parse out what makes a defendant more or less culpable *descriptively*. We chose not to do that, and that decision had a substantive effect on society illuminated by the proliferation of actuarial risk tools as sentencing reform today. It eroded our normative values about how to limit or regulate technologies at sentencing.

C. From Dangerousness to Recidivism Risk

As a final transformation, the extent to which we care about technical assessments of recidivism risk as a social norm is the effect of previous punishment practices and policies. The pursuit of technical knowledge interwoven with the transformation of punishment practices would legitimate and obscure the conflation of “recidivism risk” and “future dangerousness” upon which actuarial risk tools now build. In this context,

246. AGAINST PREDICTION, *supra* note 1, at 32 (emphasis omitted).

247. Exum, *supra* note 226, at 143–45 (explaining Particular Purpose Sentencing).

248. See, e.g., Alschuler, *Failure*, *supra* note 220, at 941–45 (proposing descriptive guidelines rather than data-driven technical grids).

three things happened at once to facilitate this seemingly pervasive overlap in terms: the “system” expanded while opportunities for exit disappeared, particularly for poor and marginalized communities, in invisible ways; ongoing technosocial projects committed to shoring up expertise would legitimate the transition from dangerousness to risk; and the politics of crime would drive a generalizing fear that spans from fear of danger to fear of any crime, no matter the type, under the assumption that people who commit low level crimes could actually be much more threatening and require incapacitation. These transformations converge to sustain a nondiscriminating acceptance of actuarial risk tools at sentencing.

The idea of a criminal justice “system” creates a problematic closed loop effect on criminal justice actors. As criminal justice actors embraced abstraction and system-wide visualization through the guidelines, the tools would simultaneously obscure various problematic realities in criminal justice. In particular, the guidelines would obscure the significant impact of prosecutorial discretion in charging different crimes for similar behavior.²⁴⁹ It centered sentence outcomes on the basis of quantifiable metrics like drug weight or amount stolen, even when these metrics could easily distort the significance of the crime and led to objectively irrational sentence outcomes.²⁵⁰ It also erased important distinctions between defendants and crimes in the effort to standardize outcomes.²⁵¹ Following another scholar’s recent critique of system in criminal justice, “[c]rime’ was where the [technosocial reform] began, a category of inputs from somewhere out there in society that, for the system’s purposes, could be taken as given.”²⁵² The abstract technosocial tools would obscure the how and the why of the processing.

This “closed loop” phenomenon would prove critical to the advance of actuarial risk tools. The very idea that a risk assessment tool could facilitate justice presumes that there is justice in the data that the system produces. Said differently, technosocial reforms like the guidelines can inadvertently erase “[the] different actors with different interests, incentives, and

249. See, e.g., Sonja B. Starr & M. Marit Rehani, *Mandatory Sentencing and Racial Disparity: Assessing the Role of Prosecutors and the Effects of Booker*, 123 YALE L.J. 2, 6 (2013) (noting the “surprisingly wide gap” between theoretical and qualitative literature on prosecutorial discretion shaping sentencing outcomes and empirical research that “effectively ignores that role”). As Starr and Rehani specifically note: “[T]he guidelines recommendation is itself the end product of charging, plea-bargaining, and sentencing fact-finding.” *Id.*

250. See Alschuler, *Failure*, *supra* note 220, at 918 (discussing “troubling inequalities produced in the name of equality by sentencing guidelines” and discussing *Chapman v. United States*, 500 U.S. 453 (1991)).

251. *Id.* at 918–24.

252. Mayeux, *supra* note 14, at 81.

prior[assumptions].”²⁵³ With the guidelines, it erased the presumptions of prosecutors, technical developers, commissioners, and more.²⁵⁴ Risk assessment tools function similarly, erasing the assumptions and flaws that produce the data being manipulated as much as the meanings ascribed to the manipulated data.²⁵⁵

At the same time, social science researchers were hard at work reaffirming the legitimacy of social scientific expertise after critiques placed doubts on the assessment of future dangerousness.²⁵⁶ In particular, a series of studies were launched that would culminate in the emphatic transition from future dangerousness to risk.²⁵⁷ Risk is much broader in scope and administrative in origin.²⁵⁸ Any defendant presents some risk of future criminal behavior, just as any law-abiding individual presents the same possibility.²⁵⁹ Starting with the deinstitutionalization of mental health facilities and expanding with the rise of preventive detention laws, actuarial risk tools were a point of ongoing research whilst punitive policies increasingly endorsed reliance on incarceration. As the line between sexually violent predators and criminal justice blended, resistance to actuarial risk tools in sentencing would diminish. So while all or nothing clinical assessments of dangerousness were debunked, broader notions of

253. Benjamin Levin, *Values and Assumptions in Criminal Adjudication*, 129 HARV. L. REV. F. 379, 384 (2016).

254. For example, consider the literature critiquing prosecutorial charging practices and their impact in a guideline structure. *See supra* note 249.

255. Levin, *supra* note 253, at 384 (calling for more information about courts and the actors in them before ascribing meaning to data produced by courts); Eaglin, *Constructing*, *supra* note 12, at 139–40 (questioning the assumptions of technologists manipulating data); *see also generally* HINTON, *supra* note 97, at 14–15, 18–25 (critiquing production and manipulation of criminal justice data).

256. Criticism stemmed from reforms concerning the mentally ill, which led to legal, political, and empirical critiques of “psy-experts” assessing future dangerousness to influence the confinement of criminal defendants. Simon, *supra* note 65, at 400–04. From the social scientific perspective, research demonstrated that the results of clinical predictions of future dangerousness were often wrong. JOHN MONAHAN, *THE CLINICAL PREDICTION OF VIOLENT BEHAVIOR* (1981). From the legal perspective, a series of cases concerning the due process rights of mentally ill ex-prisoners cast doubt on the prevailing idea that judges and psy-experts should predict dangerousness in criminal justice decisionmaking. These critiques converged with political resistance grounded in notions of equality—demands not to treat people differently based on race, ethnicity, gender, age, and social class. Tonry, *Issues*, *supra* note 74, at 167. When added to the larger penological shift away from rehabilitation, a general skepticism emerged regarding criminal justice decisionmakers using or making predictions of future dangerousness. *See id.*; *see also* Simon, *supra* note 65, at 402–03.

257. Nikolas Rose, *At Risk of Madness*, in *EMBRACING RISK: THE CHANGING CULTURE OF INSURANCE AND RESPONSIBILITY* 209, 211–12 (Tom Baker & Jonathan Simon eds., 2010) (providing an overview of the research conducted by Herbert Steadman and John Monahan in conjunction with the MacArthur Foundation).

258. *Id.* at 210–13.

259. *See id.*; cf. Sandra G. Mayson, *Dangerous Defendants*, 127 YALE L.J. 490, 520 (2018) (arguing that state authority for preventive restraint derives from dangerousness level rather than status as defendant/nondefendant in the pretrial context).

risk were given social scientific legitimacy that spread from mental health to the criminal justice context.²⁶⁰

Finally, fear of crime would stoke anxieties and fuel the politicization of any criminal risk, including the risk of returning for any reason. Two diverging perceptions of criminals as either evil or indecipherable gave legitimacy to fears of any kind of lawbreaking, regardless of the crime committed or the context in which it occurred.²⁶¹ Politicized, racialized, and media-fueled instances of individuals committing crimes after release from criminal justice custody only confirmed these fears.²⁶² In addition, messaging that crime existed exclusively within the individual made the prospect of incapacitative punishment deeply appealing.²⁶³ States started implementing severe recidivist enhancements.²⁶⁴ Simultaneously, the risk of recidivism of any type would take hold in the public psyche. What emerged was a concern for recidivism of any kind.

Yet starting in the late 1980s, significant changes to criminal justice both expanded the opportunities for capture within the criminal apparatus while erasing the opportunity for successful exit, particularly for poor and marginalized defendants. Increased funding to police and increased investment in criminal justice infrastructure produced an upsurge in arrests for comparatively minor crimes.²⁶⁵ As Hinton demonstrates, these efforts were specifically directed at poor urban communities, which helps to explain the overrepresentation of people of color in that arrest surge.²⁶⁶ Increased contact, in turn, leads to increased arrest and possible conviction, even if only for misdemeanor offenses.²⁶⁷ Arrests and convictions for even misdemeanor offenses can trigger a cycle of surveillance and exclusion that

260. For a more in-depth consideration of the rise of risk as compared to dangerousness in the mental health context, see Rose, *supra* note 257; Henry J. Steadman et al., *From Dangerousness to Risk Assessment: Implications for Appropriate Research Strategies*, in MENTAL DISORDER AND CRIME 39 (Sheilagh Hodgins ed., 1993); Robert Castel, *From Dangerousness to Risk*, in THE FOUCAULT EFFECT: STUDIES IN GOVERNMENTALITY 281 (Graham Burchell et al. eds., 1991).

261. For discussion of these dual images, see GARLAND, *supra* note 90, at 134; see also SIMON, *supra* note 177, at 36.

262. As a notable example, consider the extensive literature on Willie Horton and sentencing policy. For discussion, see MURAKAWA, *supra* note 219, at 108.

263. Sharon Dolovich, *Exclusion and Control in the Carceral State*, 16 BERKELEY J. CRIM. L. 259, 265 (2011).

264. See Eaglin, *Against Neorehabilitation*, *supra* note 5 (summarizing incapacitative sentencing reforms); see also King, *supra* note 72, at 532–37 (providing an overview of recidivism enhancements starting in the 1970s).

265. See HINTON, *supra* note 97, at 146–62. Examples of expanded “infrastructure” go beyond just the introduction of administrative agencies to the creation of technical infrastructure like criminal record databases and other types of resources that allowed for the efficient surveillance of marginalized communities. See *id.*

266. *Id.* at 177.

267. Carbado, *supra* note 237, at 546 (“A variety of social forces (including broken windows policing, racial stereotypes, racial segregation, and Fourth Amendment law) converge to make African-Americans vulnerable to ongoing police surveillance and contact.”).

makes the process of exiting the criminal justice apparatus more difficult.²⁶⁸ Among other practices, the rise of criminal justice debt would also trap defendants, creating a revolving door of arrests, convictions, and technical violations.²⁶⁹ Actuarial tools assessing recidivism risk measure these occurrences just as much as they predict “future dangerousness.”²⁷⁰

Understanding this conflation is critical to contextualizing the institutionalization of actuarial risk tools at sentencing now. Repeat offending is frequently, if not ubiquitously, associated with the idea of future dangerousness and future offending. It is, as Harcourt asserts, “a semiotic shaped by the new technology of prediction.”²⁷¹ We believe risk tools are indispensable to sentencing now because it evokes a threat of dangerousness. We associate recidivism with dangerousness because that is what technical projects started to predict.

Of course, the preoccupation with recidivism risk cannot be attributed to the creation of guidelines alone. Many states did not adopt guidelines, and many states that did chose not to maintain some of the most draconian policies reflected in, for example, the federal sentencing guidelines. Nevertheless, the pursuit of system control through technical reforms naturalized the mutation of sentencing such that actuarial assessments of recidivism risk would appear normal if not necessary components in the felony sentencing process. This, combined with a pervasive faith in technological advancement, would prove central to the rise of risk tools as a response to demands that law and policymakers address the pressures of mass incarceration.

IV. REFRAMING THE RISE OF RISK TOOLS AT SENTENCING

So far this Article exposes a counternarrative about actuarial risk tools entering sentencing. Contrary to the standard narrative that technology advances to improve sentencing, this narrative suggests that risk tools’ advance is the effect of social transformations catalyzed by previous sentencing technologies. Technology may be advancing, but society has changed in problematic ways to make statistically robust risk tools more palatable at sentencing.

268. *Id.*; see also Eisha Jain, *Arrests as Regulation*, 67 STAN. L. REV. 809, 812–13 (2015) (noting how arrests, even for misdemeanor offenses, function as a “screening tool” or a “low-cost audit mechanism” to access social services, obtain jobs, and other everyday functions).

269. See, e.g., ALEXES HARRIS, *A POUND OF FLESH: MONETARY SANCTIONS AS PUNISHMENT FOR THE POOR* (2016); Murakawa & Beckett, *supra* note 220, at 717–19 (noting protracted exit points from the system and highlighting increasing monetary penalties and alternatives to incarceration).

270. See Eaglin, *Constructing*, *supra* note 12, at 76.

271. AGAINST PREDICTION, *supra* note 1, at 189–91.

This Part takes up the normative value of this counternarrative. Part A situates the counternarrative in political terms. It considers whether exposing the counternarrative is good or bad in the face of mass incarceration. Part B identifies the value of this counternarrative in practical context—for the courts in sentencing jurisprudence and for the normative debates on the future of sentencing reforms. It pushes to the fore problematic trends obscured in debates about accuracy and rhetoric of technological advancement.

A. The Politics of Narrative

The standard narrative and its counternarrative offer competing ways to frame the expansion of actuarial risk tools at sentencing. Framing narratives shape, drive, and justify reforms and debate. Right now, tool accuracy is a topic of hot debate because it fits within the standard narrative of technological advancement. While this narrative has a political value because it depoliticizes mass incarceration, this Part suggests that the cost of this reform is greater than that narrative's logical end point—accuracy—can bear. As such, it asserts that the counternarrative is necessary to shape debates about the expansion of actuarial risk tools.

To the extent that law and policymakers pose risk tools as a means to reduce incarceration, they are playing on the turn toward empiricism as a means to cope with political pressures of mass incarceration.²⁷² The standard narrative works well in this respect. To the extent that race and class are raised in this debate, they are secondary to the larger concern of technology for technology's sake: empirical accuracy. For example, claims that including certain factors undermines social justice values are often dismissed because such removal would undermine a tool's technical accuracy.²⁷³ Claims that actuarial risk tools will disproportionately mischaracterize racial minorities, too, are dismissed on the basis of technical accuracy.²⁷⁴ Yet the social history of risk tools indicates that technical accuracy does not account for why states are adopting the tools. This helps explain why recent studies debating whether the tools are more or less

272. See, e.g., PFAFF, *supra* note 11, at 198–200 (encouraging actuarial risk assessment tools as reform to cope with political pressures of mass incarceration). *But see, e.g.,* Levin, *supra* note 253, at 387 (highlighting shortcomings in the “power of empiricism”). *Cf.* Alice Ristroph, *Desert, Democracy, and Sentencing Reform*, 96 J. CRIM. L. & CRIMINOLOGY 1293, 1335 (2006) (noting the “age of empiricism” as early as 2005 and critiquing its influence on retributive theories of punishment).

273. See, e.g., Slobogin, *Defense*, *supra* note 26, at 11–13 (noting the tension between fit, validity, and fairness principles when considering a tool used at sentencing).

274. See, e.g., Sandra G. Mayson, *Bias In, Bias Out*, 128 YALE L.J. 2218, 2233–38 (2019) (summarizing diverging perspectives on actuarial risk assessments' effect on racial minorities and noting divide between effect and statistical accuracy).

accurate than judges are not likely to temper risk tools' advance.²⁷⁵ Nevertheless, accuracy operates to narrow the scope of critique about risk tools. As a natural endpoint of the technological advancement narrative, it also urges the inclusion of factors that undermine philosophical and normative limits. In other words, "accuracy" debates simply cannot bear the full implications of risk tools' ascent. That is not its purpose.

This displacement makes risk tools as a technosocial reform also a quintessential neorehabilitative reform. The language of technical accuracy "disaggregate[s] . . . crime from social and governmental forces" and instead focuses on individual character and responsibility.²⁷⁶ Even as scholars and policymakers try to write politics into tools, the standard narrative operates to silence them. For progressives and conservatives alike, this limitation has appeal. For progressives, this opens the possibility of rehabilitation and diversion long considered untenable for political reasons. For conservatives, it maintains a radical individualism introduced in the 1970s that detracts from broader critiques about structural forces.²⁷⁷ For both, it offers political cover for judges and other decisionmakers in the face of pressures to do "smart" reforms. These strands converge for both progressives and conservatives alike to agree upon this turn toward technosocial reform.

Some would suggest that this is a good thing. One could argue that technical accuracy offers a neutral platform to facilitate decarceration.²⁷⁸ After all, *empiricism*—not selective incapacitation—is the foundation of agreement.²⁷⁹ This is the line the ALI tries to draw in the Model Penal Code: Sentencing provision endorsing actuarial risk tools. The ALI suggests ambivalence to increases in incarceration while endorsing decreases on the basis of risk.²⁸⁰ It is the faith in data-driven interventions that drives the

275. See Julia Dressel & Hany Farid, *The Accuracy, Fairness, and Limits of Predicting Recidivism*, 4 SCI. ADVANCES, Jan. 17, 2018, at 1, 2.

276. Miller, *supra* note 200, at 427 (noting language of therapy at center of drug courts operates in same fashion); Eaglin, *Against Neorehabilitation*, *supra* note 5, at 201 (connecting drug courts and risk tools under umbrella of neorehabilitation).

277. See, e.g., WILLIAM R. KELLY ET AL., FROM RETRIBUTION TO PUBLIC SAFETY: DISRUPTIVE INNOVATION OF AMERICAN CRIMINAL JUSTICE 3, 11–13 (2017) (recognizing that structural problems like poverty drive crime, but proposing solutions that emphasize "an effective mechanism or process to sort disordered, and thus divertible, offenders from those who are violent or habitual offenders and need to be separated from society, or those who are chronic offenders or just plain criminals and deserve retribution and punishment?"); see also Goddard & Myers, *supra* note 236, at 162 (noting that evidence-based interventions ignore structural causes of crime considered not "amenable to change").

278. See Dan M. Kahan, *The Secret Ambition of Deterrence*, 113 HARV. L. REV. 413, 478–81 (1999) [hereinafter Kahan, *Secret Ambition*].

279. See, e.g., Fan, *supra* note 197, at 639–40 (citing Dan M. Kahan, *The Cognitively Illiberal State*, 60 STAN. L. REV. 115, 145–48 (2007)).

280. MODEL PENAL CODE: SENTENCING § 6B.09 cmt. a (AM. LAW INST. 2017) ("Section 6B.09 takes an attitude of skepticism and restraint concerning the use of high-risk predictions as a basis of elongated prison terms, while advocating the use of low-risk predictions as grounds for diverting otherwise prison-bound offenders to less onerous penalties."); see also *supra* notes 38–42 and

reform. That reform exists at the end of a larger narrative about technical advancement. From this perspective, a counternarrative is detrimental. Countering the narrative means countering the depoliticized platform. Liberalism, some would suggest, discourages such a course of action in the face of bipartisan recognition of the need to reduce reliance on incarceration.²⁸¹

This approach treats the institutionalization of actuarial risk tools as costless, or at least manageable at the outset. For example, John Pfaff encourages the expansion of actuarial risk tools despite the controversial inclusion of factors that correlate with race and gender in “deeply problematic ways” because they offer a “significant” political advantage that can lessen systemic accountability problems in criminal justice.²⁸² Similarly, Kevin Reitz encourages reforms that “domesticate” risk tools at sentencing in part because they encourage “lenity” in response to the pressures of mass incarceration.²⁸³ Actuarial assessments of risk, such critiques suggest, are just one of many tools available to cope with mass incarceration.

The counternarrative set forth here illuminates the shortcoming of this perspective. The institutionalization of statistically robust actuarial risk tools is not thaumaturgic—it is a solution that emerges out of more than sheer technical will.²⁸⁴ Rather, it is the effect of prior technologies shaping our human values while obscuring deeply political transformations in society. To concede on the basis of politics to the expansion of risk tools threatens to mask the difficult problems of historical change that create the foundation for their very expansion. It threatens to depoliticize mass incarceration, while legitimating a particular path away from its current size

accompanying text (describing sentencing structures in the states similar to the approach endorsed by the ALI).

281. See Kahan, *Secret Ambition*, *supra* note 278, at 145–48 (noting the liberal argument in support of deterrence’s technical façade). For general discussion of the bipartisan nature of criminal justice reforms prevalent in the states, see, for example, Barack Obama, Commentary, *The President’s Role in Advancing Criminal Justice Reform*, 130 HARV. L. REV. 811 (2017) (highlighting bipartisan agendas); *The Conservative Case for Reform*, RIGHT ON CRIME, <http://rightoncrime.com/the-conservative-case-for-reform/> [<https://perma.cc/W728-XND3>] (conservative reform agenda); *Mass Incarceration*, AM. CIV. LIBERTIES UNION (2019), <https://www.aclu.org/issues/smart-justice/mass-incarceration> [<https://perma.cc/GJB7-SFTS>] (progressive reform agenda); see also Sharon Dolovich & Alexandra Natapoff, *Introduction: Mapping the New Criminal Justice Thinking*, in *THE NEW CRIMINAL JUSTICE THINKING* 1, 1 (Sharon Dolovich & Alexandra Natapoff eds., 2017) (“[T]here is an emerging willingness on all sides to question, challenge, and rethink our existing approach to preventing and punishing crime.”).

282. See PFAFF, *supra* note 11, at 198–201.

283. Reitz, *supra* note 11, at 71 (criticizing risk tool critics for ahistorical critiques).

284. See Michel Foucault, *Politics and the Study of Discourse*, in *THE FOUCAULT EFFECT: STUDIES IN GOVERNMENTALITY* 53, 68 (Graham Burchell et al. eds., 1991).

and scope.²⁸⁵ That path includes the expansion of surveillance mechanisms and logics from the prison to society. The standard narrative, when combined with the fear of politics, legitimates these transformations even while it avoids speaking of them. Whether this reform changes sentencing outcomes—a point that advocates diverge on for various reasons²⁸⁶—it will change us. As the counternarrative illuminates, these reforms *already have* changed us. They changed the conditions on which we interrogate technical projects at sentencing and our understanding of its functions. Particular care, reflection, and skepticism should be accorded to this development at the precipice of continuing further down this path.

Exposing the tension between reality and the narrative that facilitates tool expansion offers three valuable insights to current debates about sentencing reforms. First, exposing this oppositional discourse undermines the strategically simplistic advance of actuarial risk tools. This is a good thing. A progressive politics is one that takes historical context into account. While advocates of risk tools appear to have the upper hand on the historical point,²⁸⁷ this Article makes that platform far more ambivalent. Thus, it urges critical reflection and caution when wading into the waters of risk-based sentencing reforms. The institutionalization of actuarial risk tools at sentencing is not a foregone conclusion, nor has their recent expansion prevented a meaningful change in course. This counternarrative offers a new foundation for pause; one that does not invite the standard narrative's singular emphasis on technical accuracy.

Second, this counternarrative offers new insight into the balance of various criminal justice reforms being pursued to address mass incarceration. Various reforms have emerged to address the political, economic, and social pressures of mass incarceration. How we choose to reduce reliance on incarceration will have implications for the long-term effort to dismantle the sociohistorical phenomenon of mass incarceration.²⁸⁸ In a recent article, Benjamin Levin offers a particularly insightful framework to engage with these diverging reforms.²⁸⁹ As he suggests,

285. Notably, this “depoliticized” approach is exactly how we ended up with mass incarceration. As scholars like Murakawa and Hinton have shown, it was the areas of agreement rather than disagreement within which the perilous contours of mass incarceration took form.

286. See Starr, *Rationalization*, *supra* note 25, at 862–65 (highlighting the inconsistency in supporters' arguments about whether tools have effect at sentencing).

287. See MODEL PENAL CODE: SENTENCING § 6B.09 (AM. LAW INST. 2017); Reitz, *supra* note 11; King, *supra* note 72, at 532–37.

288. See, e.g., Eaglin, *Against Neorehabilitation*, *supra* note 5; Eaglin, *Paradigm*, *supra* note 15; Chaz Arnett, *Virtual Shackles: Electronic Surveillance and the Adultification of Juvenile Courts*, 108 J. CRIM. L. & CRIMINOLOGY 399 (2018); Chaz Arnett, *From Decarceration to E-carceration*, 41 CARDOZO L. REV. (forthcoming 2019); Aya Gruber et al., *Penal Welfare and the New Human Trafficking Intervention Courts*, 68 FLA. L. REV. 1333 (2016).

289. Levin, *Consensus Myth*, *supra* note 13.

pragmatic reforms that focus on the quantitative aspects of mass incarceration can conflict with or undermine the potential for reforms that address the sociohistorical aspects of this phenomenon.²⁹⁰ He notes, as many critics have, that a particular shortcoming of the pragmatic approach may be the focus on low-level, nonviolent drug offenders to the exclusion of other, broader structural reforms that produce and sustain crime and inequality in the United States.²⁹¹

This counternarrative builds on Levin's intervention by illuminating the significance of a certain *type* of pragmatic sentencing reform that requires particular skepticism and caution: those that invoke the language of science and technology as the basis of transformation.²⁹² Technosocial reforms—which always draw on the actuarial²⁹³—are not just one of many pragmatic criminal justice reforms being adopted in the face of mass incarceration. They are meant to change society. Yet because they operate within the narrative of technological advancement, little scrutiny is applied to how or why society accepts those changes. By tracing the origin of risk tools along with transformations in society, this contribution joins in Levin's insight that not all criminal justice reforms are the same. It also bolsters the assertion that, in the grand scheme of criminal justice reforms emerging in the face of mass incarceration, the institutionalization of statistically robust actuarial risk tools is neither necessary nor preferable despite their bipartisan appeal.²⁹⁴

Finally, this Article joins a growing literature aimed at igniting the humanities in the fight against the sociohistorical phenomenon of mass incarceration.²⁹⁵ Technological sentencing reforms are remarkable because they do more than just diffuse motivation for more expansive sentencing reforms aimed to address deeper issues of punishment and society. This Article demonstrates how these reforms actually strip society of the

290. *Id.* at 309–15.

291. *Id.* at 314–15 (warning that shifting typologies may stymie broader structural reforms); *see, e.g.,* Eaglin, *Paradigm*, *supra* note 15 (critiquing focus on low-level, nonviolent offenders); Gruber et al., *supra* note 288 (same); *see generally* JAMES FORMAN, JR., *LOCKING UP OUR OWN: CRIME AND PUNISHMENT IN BLACK AMERICA* (2017) (critiquing exclusive focus on low-level, nonviolent offenders to exclusion of other individuals caught in criminal justice system).

292. Risk tools exist at the intersection of both discourses on science (rehabilitation as therapy) and technology (risk management as technical accuracy).

293. This is so because the tools are developed on the basis of World War II/Cold War technologies wherein “the predictor” was *the* intervention of choice considered to have championed the war. *See* HEYCK, *supra* note 52.

294. Harcourt, *Risk*, *supra* note 233; *see also* Eaglin, *Against Neorehabilitation*, *supra* note 5.

295. *See, e.g.,* HINTON, *supra* note 97 (history); Mariana Valverde, “Miserology”: *A New Look at the History of Criminology*, in *THE NEW CRIMINAL JUSTICE THINKING* 325 (Sharon Dolovich & Alexandra Natapoff eds., 2017) (history); BERNARD E. HARCOURT, *THE ILLUSION OF FREE MARKETS: PUNISHMENT AND THE MYTH OF NATURAL ORDER* (2011) [hereinafter HARCOURT, *ILLUSION OF FREE MARKETS*] (history and rhetoric).

conceptual foundations to resist both future technological reforms *and* the status quo. So while it is true that actuarial risk tools could stall reforms beyond the low-level, nonviolent drug offenders whom reformers are most keen to consider,²⁹⁶ its implications go far beyond that critique. Such reforms shape and legitimate “moral, political, and intellectual sensibilities” about justice that should be interrogated but will not be.²⁹⁷ The capacity to scrutinize these sensibilities is lost because the underlying social concepts—our words and their meaning—are changing to accommodate the technologies.²⁹⁸ The technologies, in turn, legitimate the status quo. The implications are concerning. All the empirical studies in the world could demonstrate the negative effect of the tools, but without the words to conceptualize a problem, society is helpless to resist their advance. Yet resisting their advance is necessary to resisting the status quo. This Article illuminates the need for a complementary approach to oppositional research. By writing into a space dominated by statistics, it illuminates the necessity of the humanities as a form of resistance.

B. Combatting the Standard Narrative, Expanding Debates

Contrary to the standard narrative, sentencing’s technological counternarrative invites a broader discourse on the meaning of actuarial risk tools entering sentencing. This section raises three interrelated concerns that have been relatively absent from policy debates about risk tools thus far, but should be amplified. It concludes by reflecting on the value of the counternarrative in practical context for judges at sentencing.

The first concern relates to incapacitation logics. As actuarial risk tools proliferate in state sentencing structures, the United States rounds its fortieth year of incapacitation-driven sentencing reforms. If risk tools represent the pendulum swing in punishment theory, we are not changing course. Rather, we are changing rhetoric and methods. The standard technological narrative obscures this deeply problematic choice of course in criminal justice, and paradoxically it is doing so just as the crisis of mass incarceration is coming into view.

What does it mean that incapacitation continues to dominate sentencing? Specifically, how does this relate to the evolution of punishment theory? As Alice Ristroph recently explained, the theories of war evolved with the introduction of more sophisticated technologies and recognition that

296. See Eaglin, *Paradigm*, *supra* note 15.

297. AGAINST PREDICTION, *supra* note 1, at 187.

298. Cf. AGAINST PREDICTION, *supra* note 1, at 188–92 (noting that the pull of prediction shapes notions of justice).

justifying theories of war was no longer *limiting* war in practice.²⁹⁹ She calls on punishment theorists to do the same.³⁰⁰ How does the advance of more statistically robust actuarial risk tools play into this call for transformation? Scholars should begin to consider this question.

The second concern relates to automation. The counternarrative illuminates that tools change us. Technology wears us down. This insight applies to judges just as much as it applies to society at large. The introduction of actuarial risk tools threatens to deskill judges or devalue their expertise by replacing it with that of a computer. Paradoxically, history suggests that continual efforts to make sentencing *easier* are problematic. Sentencing technologies offer, as Albert Alschuler noted in 1991, a way for judges to sentence without sentencing.³⁰¹ I concur in this insight, but challenge myself and other scholars to articulate how and why this is problematic going forward.

One alternative that appears imminent to me, but remains largely outside sentencing scholars' purview, is the specter of automated judging. Indeed, technical developers saw sentencing guidelines as a response to the possible end of judicial discretion.³⁰² While judges and scholars alike vocally resisted the proliferation of sentencing guidelines in part on this basis, the reception to actuarial risk tools is far more ambivalent. Whether a long way off or just around the corner, the institutionalization of risk tools makes the specter of automated judging more possible. Like the introduction of actuarial risk tools, this point appears deeply intertwined with the way we interpret issues relating to the technologies at sentencing, and particularly the once-mandatory sentencing guidelines. Scholars opposing risk technologies in sentencing should begin to engage with this possibility as well.

The third concern builds from the last. Tracing the origin of actuarial risk tools in criminal justice highlights its deep connection to the introduction of automation in the private sector in the 1950s–1960s.³⁰³ Since the introduction of scientific discourse with clinical rehabilitation, technical reforms have distracted from automation and its effects on society. At the same time, the turn toward automation transformed society by shaping our responses to political and social crises.

299. Alice Ristroph, *Just Violence*, 56 ARIZ. L. REV. 1017, 1020 (2014).

300. *Id.*

301. Alschuler, *Failure*, *supra* note 220, at 907 n.21 (“[A] [sentencing guidelines] grid makes it easy to assign sentences to cases without thinking about the cases. Moreover, the very use of a sentencing grid makes some sentencing decisions de facto.”).

302. See Kress et al., *supra* note 97, at 219 (emphasizing that sentencing guidelines avoid disparities that arise from legislatively mandated sentencing outcomes).

303. See *supra* Part II.A.

This dynamic goes far beyond just sentencing. Indeed, tracing the technological narrative at sentencing illuminates how, in line with the work of Loïc Wacquant and Bernard Harcourt, punishment is an important arm in a shifting governmentality.³⁰⁴ The narrative of technical advancements in the security state operates to distract and naturalize the transformation of government. Identifying how, over time, values change to facilitate the technical *efficiency* of the government through surveillance mechanisms in the face of deteriorating social conditions for marginalized communities is a strand worthy of further exploration both in the punishment context and outside it as well.³⁰⁵

* * *

The counternarrative, of course, does not have implications for scholars alone. If nothing else, the counternarrative urges expansion of the resistance rhetoric pervasive among risk tool critiques from policymakers and scholars alike. It emphasizes that this language of resistance should not focus exclusively on what risk tools mean to individual defendants. The concern goes beyond whether it mischaracterizes defendants and undermines notions that those who engage in crime can change.³⁰⁶ Rather, resistance rhetoric should emphasize what it will do to us—to all of us—and our notions of justice.³⁰⁷ Acknowledging this broader range of objections could bolster some of the day-to-day confrontations with actuarial risk tools in the courts.

There is some precedent for this. As noted above, the advance of risk tools is at heart the advance of default incapacitative logics. While incapacitation is perhaps the most difficult theory to undermine because of its limitless nature, the United States Supreme Court recently did just that in *Graham v. Florida*.³⁰⁸ There, the majority of the Court categorically banned life without parole sentences for juvenile defendants that committed nonhomicide offenses.³⁰⁹ Notably, the majority limited default

304. See generally HARCOURT, ILLUSION OF FREE MARKETS, *supra* note 295, at 40–44 (critiquing neoliberal penalty in the United States); WACQUANT, *supra* note 17, at xviii (critiquing the role of punishment in advancing neoliberalism in the United States and abroad).

305. See, e.g., VIRGINIA EUBANKS, AUTOMATING INEQUALITY: HOW HIGH-TECH TOOLS PROFILE, POLICE, AND PUNISH THE POOR (2017) (critiquing surveillance techniques in U.S. welfare systems).

306. See, e.g., Sidhu, *supra* note 25 (emphasizing that risk tools undermine notions of individual autonomy and individual capacity for change); Collins, *Punishing Risk*, *supra* note 29, at 98–106 (identifying underappreciated costs to individuals when dispensing sentences with a risk assessment tool).

307. See, e.g., Holder, Remarks, *supra* note 51 (emphasizing how tools undermine criminal justice values).

308. 560 U.S. 48 (2010).

309. *Id.*

incapacitation logics.³¹⁰ After going through a discussion of risk, dangerousness, and incorrigibility, the Court writes, “[i]ncapacitation cannot override all other considerations.”³¹¹ In his concurrence, Justice Stevens bolsters this claim in his defense of proportionality review. He writes, “Society changes. Knowledge accumulates. We learn, sometimes, from our mistakes.”³¹² This statement is the heart of the counternarrative—sometimes we get it wrong, and it is up to us to right the ship.

State courts and commissions can right the ship by resisting the pull of actuarial risk tools in various ways. Some already have. For example, North Carolina’s Sentencing Commission considered introducing an actuarial risk tool for sentencing and determined that their profiling practices based on criminal history made use of actuarial tools at sentencing unnecessary.³¹³ The important point in this development is that the Commission pierced the tools’ veil to consider what risk factors were consistent with state sentencing policy. In doing so, the Commission implicitly undermined the technological advancement narrative. It also subtly pushed the legislature and executive branch to find another way to reform criminal justice. Though perhaps a small victory in the grand scheme of sentencing reform, such resistance is critical in the face of inexorable sentencing technologies.

CONCLUSION

There is a standard narrative about technological advancement that often shapes the discourse on actuarial risk tools entering sentencing. This Article develops a necessary counternarrative to that standard story. Specifically, it asserts that society is changing through and alongside technology, and not because our human values have evolved. This Article considers how three social concepts—rehabilitation, racial justice, and dangerousness—mutated through and alongside predecessor technologies. These social transformations provide the foundation for risk tools’ expansion now. They also obscure problematic transformations that sustain the sociohistorical phenomenon of mass incarceration. These include the expansion of government surveillance in marginalized communities, resignation to racialized punishment practices, and the expansion of the carceral net. This Article illuminates how these transformations remove resistance to the expansion of actuarial risk tools today while stripping advocates of a language to critique and resist the status quo. Thus, this Article offers

310. *Id.* at 73.

311. *Id.*

312. *Id.* at 85 (Stevens, J., concurring).

313. See N.C. SENTENCING & POL’Y ADVISORY COMM’N, RESEARCH FINDINGS AND POLICY RECOMMENDATIONS FROM THE CORRECTIONAL PROGRAM EVALUATIONS, 2000-2008, at 25 (2009).

foundation for deeper, and more skeptical, engagement with the advance of pragmatic technological sentencing reforms.

Ultimately, this Article demands a historically situated question. Instead of addressing structural problems in society in the 1960s, states and the federal government started building technological infrastructure to partially automate sentencing. Are we doing the same thing now, in the face of mass incarceration? By placing faith in technology to save us from ourselves, are we turning a blind eye to the structural problems that drive reliance on incarceration *and* the criminal apparatus more generally? Only by answering this question can we truly appreciate the fundamental tension between the rise of actuarial risk tools at sentencing and the broader effort to dismantle the sociohistorical phenomenon of mass incarceration in the United States. *Zeitgeist* concerns of technical accuracy cannot answer this question, but they can distract us from that more holistic perspective on criminal justice reform. In the process we may succumb to another peril: the pursuit of technical knowledge may come to define our human values going forward.