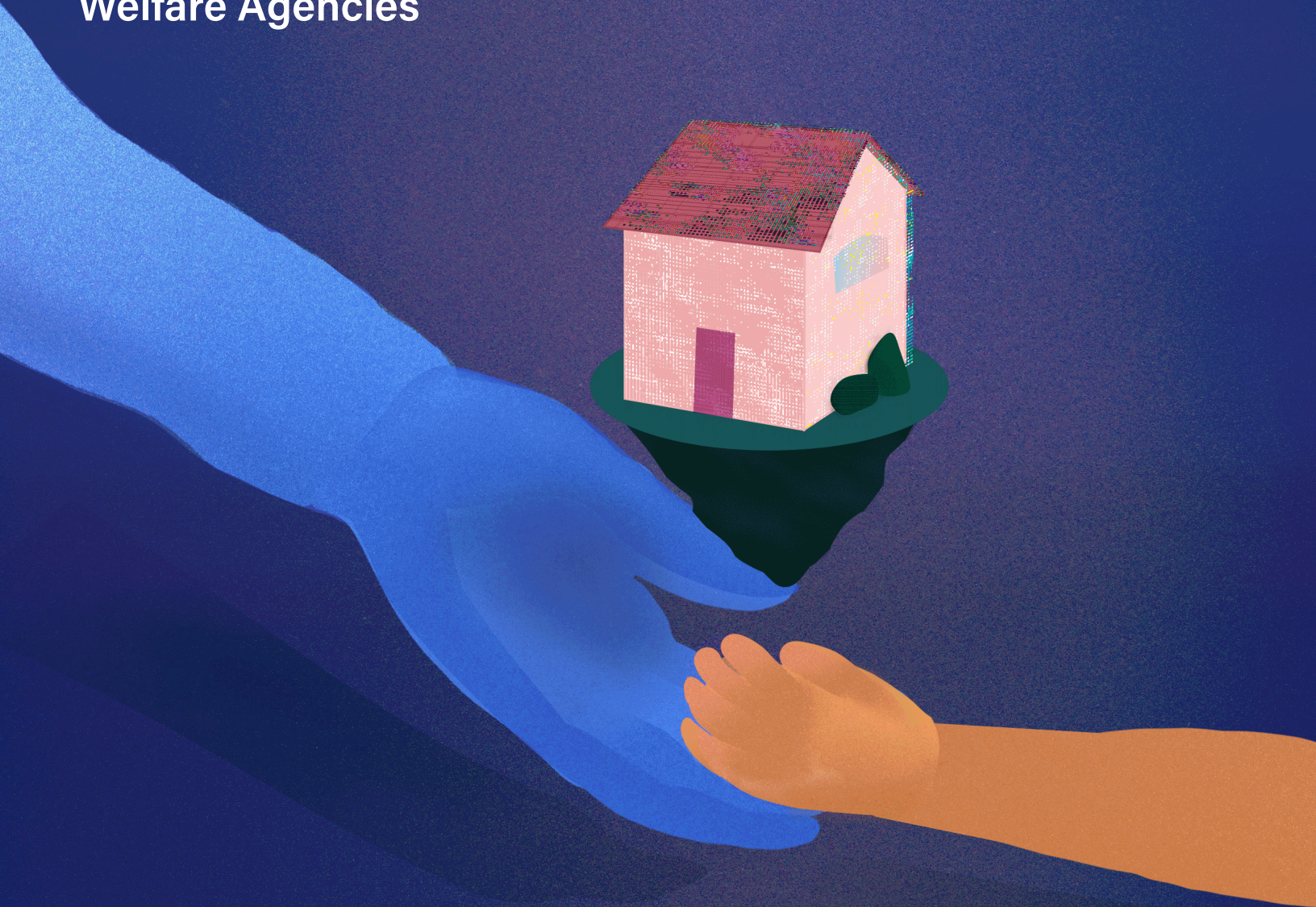# Fostering Responsible Tech Use

Balancing the Benefits and Risks Among Public Child Welfare Agencies

Maddy Dwyer

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The **Center for Democracy & Technology (CDT)** is the leading nonpartisan, nonprofit organization fighting to advance civil rights and civil liberties in the digital age. We shape technology policy, governance, and design with a focus on equity and democratic values. Established in 1994, CDT has been a trusted advocate for digital rights since the earliest days of the internet. The organization is headquartered in Washington, D.C. and has a Europe Office in Brussels, Belgium.

As governments expand their use of technology and data, it is critical that they do so in ways that affirm individual privacy, respect civil rights, foster inclusive participatory systems, promote transparent and accountable oversight, and advance just social structures within the broader community. **CDT's Equity in Civic Technology Project** furthers these goals by providing balanced advocacy that promotes the responsible use of data and technology while protecting the privacy and civil rights of individuals. We engage with these issues from both technical and policyminded perspectives, creating solutions-oriented policy resources and actionable technical guidance.

Fostering Responsible Tech Use

Balancing the Benefits and Risks Among Public Child Welfare Agencies

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With contributions by Bowman Cooper, Kristin Woelfel, Hannah Quay-de la Vallee, Elizabeth Laird, Christina Endres, Miranda Bogen, and Tim Hoagland.

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Contents

Contents

01

Introduction

Across the country, child welfare agencies[1] work with over 390,000 youth in foster care each year by temporarily placing them in foster homes, facilitating adoption if parental rights are terminated, and managing their cases.[2] These agencies are tasked with the high-stakes responsibility of ensuring the safety and wellbeing of youth in their care, but face many challenges, such as lack of coordination across agencies that work with foster youth, insufficient or biased data about a child's environment, and heavy administrative burdens that contribute to high rates of social worker turnover.

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1   *Foster care services are carried out through both public child welfare agencies and private agencies, which must be approved by their respective states. This brief and its recommendations focus on public child welfare agencies at the state and local level.* Dr. Sharen Ford & Natalie Hetro, *Foster Care: State vs. Private Agencies*, Wait No More, perma.cc/DA86-U6RF.

2   *National Foster Care Month: Key Facts and Statistics*, Children's Bureau & Child Welfare Information Gateway (2023), perma.cc/3T2K-4GRK.

To address these issues, child welfare agencies are using, or considering, data and technology systems including artificial intelligence (AI) tools. However, despite the promises that data and technology provide, these systems risk entrenching racial and socioeconomic disparities,[3] stigmatizing foster youth based on social and academic achievement, and compromising the privacy and security of personal data.

This report highlights the ways that data and technology can mitigate some of the problems that child welfare agencies face, while also recognizing their inherent risks. The Center for Democracy & Technology (CDT) offers recommendations to maximize benefits and mitigate the harms, including engaging affected stakeholders, prioritizing data privacy and security, utilizing federal resources for data sharing, and safely implementing AI tools with responsible governance practices. Though these recommendations pertain to all data and technology uses, they are especially important as more and more public agencies are looking to take advantage of AI-powered tools.

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3   *Youth in foster care are three times more likely to be African-American. Foster youth also face unique physical, mental, and emotional challenges – they are two times more likely than their peers to have a disability and about five times more likely to be diagnosed with having an emotional disturbance, which can be categorized as "a disability associated with difficulty maintaining relationships, inappropriate behaviors, and depression."* Vanessa X. Barrett & BethAnn Berliner, *The Invisible Achievement Gap*, The Center for the Future of Teaching and Learning at WestEd, ii & 12 (2013), perma.cc/M944-G9CL.

02 How Data and Technology Can Help Child Welfare Agencies Better Serve Foster Youth

Child welfare agencies can utilize data and technology to increase positive outcomes for youth in foster care through steps such as enabling better coordinated care, promoting timely and appropriate class enrollment,[4] reducing caseworker burden, and assisting and expediting caseworker decision making.

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4   Elizabeth Laird & Hannah Quay de-la Vallee, *Protecting Privacy While Supporting Students Who Change Schools*, Ctr. for Democracy & Tech., 6 (Jul. 19, 2019), perma. cc/446B-N9TK.

Data Sharing and Portability Can Lead to Better Coordinated Care

Foster youth disproportionately face negative health outcomes due to their environments. About half of youth in foster care have chronic physical conditions – almost 10 percent are labeled medically fragile/complex, many have a history of prenatal substance exposure, and many are born prematurely.[5] As a result, youth in foster care often require specific, consistent medical care even as they change homes.

Inter-agency data sharing and portability can support youth in foster care who have complex physical and psychological health issues – but agencies lack the coordination and proper infrastructure to share and maintain child data.[6] In many states, each locality may have different systems that are not interoperable.[7] Because of this, health care providers often do not know whether a given patient is in the foster care system, and thus do not know to ask for historical information that might be collected and maintained by child welfare agencies and/or their partners.[8]

Another context in which this issue arises is in schools. As discussed in the next section, youth in foster care switch schools more frequently than their peers. Some of their vital education records can be delayed or inconsistent, including records of previous educational progress and requirements for specialized education plans or other health related accommodations.[9] Numerous federal statutes govern school data collection and

5   *Physical Health Needs of Children in Foster Care*, American Academy of Pediatrics (Jul. 21, 2021), perma.cc/QCY2-WHU6.

6   Emmeline Chuang & Rebecca Wells, *The role of interagency collaboration in facilitating receipt of behavioral health services for youth involved with child welfare and juvenile justice*, Children and Youth Services Review (Dec. 2010), perma.cc/YD84-4JLL.

7   Sarah Font, *Data Challenges and Opportunities in Child Welfare*, American Enterprise Institute, 2 (Mar. 2020), perma.cc/HW94-37ZG.

8   Mary V. Greiner, Sarah J. Beal, Judith W. Dexheimer, Parth Divekar, Vikash Patel & Eric S. Hall, *Improving Information Sharing for Youth in Foster Care*, American Academy of Pediatrics (Aug. 1, 2019), perma.cc/9CF7-EZNS.

9   Laird & Quay de-la Vallee, *supra* note 4 at 6.

Maddy Dwyer

sharing for both child welfare agencies and school districts. In some ways, these laws have improved data available on youth in foster care; but due to a lack of infrastructure, lack of enforcement, or lack of funding, this data is not being used to its fullest potential.[10]

One example of a solution to this issue is automated, secure data sharing between state child welfare agencies and Medicaid, which covers over 99 percent of foster youth.[11] Improved coordination allows caseworkers and foster homes to have access to necessary information, even as the children they work with/care for change locations. The Administration for Children and Families (ACF) and Centers for Medicare and Medicaid Services within the U.S. Department of Health and Human Services (HHS) even offer a technical guide for states to follow to ensure efficient data sharing between these agencies.[12]

Data Sharing Can Support Timely School Enrollment and Appropriate Class Placement

Foster youth switch schools more frequently than other children do. A California study analyzing statewide individual student education data and child welfare data found that only about two-thirds of youth in foster care attended the same school for the full school year, as compared to 90 percent of their peers. In Colorado, youth in foster care experienced a mobility rate that is over three times greater than that of their peers.[13] Due to their high mobility, foster youth may experience changes in academic expectations, like differences in graduation requirements or course offerings, along with incomplete or delayed transfer of records that result in late enrollment or incorrect course placement.[14]

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10   *See Appendix for more information on these federal statutes (notably, FERPA, USA, IDEA, and ESSA).*

11   *Medicaid Matters for Children in Foster Care*, Children's Defense Fund, perma.cc/ YHT3-BMNK.

12   *Data-Sharing Toolkit for Child Welfare and Medicaid Agencies*, Children's Bureau Express (May 2022), perma.cc/8JAR-UXZT.

13   Barrett & Berliner, *supra* note 3 at ii.

14   Laird & Hannah Quay de-la Vallee, *supra* note 4 at 4.

Robust, secure data sharing between child welfare agencies and state education departments can enable better communication and ensure that foster youth are receiving the educational support they need. For example, in the District of Columbia, the Child and Family Services Agency and the Office of the State Superintendent for Education developed interoperable systems to allow for secure data sharing.[15] This enables the education system to access information about students in foster care and allows the District's child welfare agency to access enrollment information and educational outcome data. With this shared knowledge, child welfare agencies and state education departments can work together to facilitate proper class placement and enrollment based on a foster child's specific needs.

Use Data More Effectively to Reduce Caseworker Burden

Often, the number of cases assigned to a social worker is not representative of their workloads.[16] Caseload is "the number of cases (children or families) assigned to an individual worker in a given time period." Workload, on the other hand, reflects the average time it takes to do the work required for each assigned case, and complete other non-casework responsibilities, including a large number of administrative tasks. Only 20 to 35 percent of a caseworker's time is spent on direct contact with their clients or contact with other individuals assisting in the case, with the remaining time being spent on data entry and clerical work.[17]

Relying only on caseload data is insufficient to paint a full picture of caseworker workloads. Other factors such as case complexity, dynamics of the placement home, the number of children involved in a case, and the number of support staff within an agency[18] must

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15   *Roadmap for Foster Care and K-12 Data Linkages*, The Data Quality Campaign, 15 (Feb. 22, 2017), perma.cc/TY37-B9HD.

16   Joanne Chen, *Caseload Standards & Weighting Methodologies*, San Diego State University School of Social Work Academy for Professional Excellence (Oct. 2019), perma.cc/P7WK-2WDZ.

17   *Id.* at 4.

18   *Id.* at 4-5.

be taken into account to fully understand the demands placed on caseworkers.[19] Failing to capture workload accurately means underestimating the real demands placed on caseworkers and making decisions based on misleading data that can exacerbate issues of burnout,[20] stress,[21] and high workloads that do not permit caseworkers sufficient time with their clients.

Burnt out caseworkers can create data errors and deliver subpar service due to "inadequate investigations and inconsistent case monitoring."[22] In addition to the detrimental costs this creates for foster youth, burnout can also harm agencies, creating other costs such as high turnover, lower staff morale, and lower productivity.[23]

Technology such as chatbots and robotic process automation (RPA) is being touted as assisting with easing some of caseworkers' workload. A chatbot is a computer program that simulates human conversation with an end user, and can be powered by either pre-drafted scripts, conversational AI, or generative AI.[24] RPA is an approach to automating certain tasks traditionally performed manually by humans. Unlike traditional approaches to automation, which generally involve designing a new piece of software and depend on compatibility with existing software, RPA leverages the operating system used by the human user for automation.

Just as other public agencies have begun to leverage chatbots with generative AI capabilities, child welfare agencies could adapt chatbots to connect foster care families to proper resources faster than a caseworker might be able to.[25] For example, a foster parent who is curious about what financial resources their state or locality might be able to offer them can ask a chatbot, which can provide them with links to benefits programs they may be eligible for.

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19   *Id.* at 2.

20   Rafael Engel & Solveig Spjeldnes, *Child Welfare Worker Caseload: What's Just Right?*, Social Work, 361 (Oct. 2009), https://perma.cc/UDR8-RPUP.

21   Chen, *supra* note 16 at 5-6.

22   *Id.*

23   *Id.* at 362.

24   *What Is a Chatbot?*, IBM, perma.cc/J7PY-LRDV.

25   Kevin C. Desouza & Rashmi Krishnamurthy, *Chatbots Move Public Sector Toward Artificial Intelligence*, Brookings Institution (Jun. 2, 2017), perma.cc/5RKU-78FJ.

RPA can potentially assist with time consuming data entry so that caseworkers can spend time on more productive tasks, such as interfacing with families.[26] Essentially, a virtual "robot" "watches" the human user complete their automatable task and "learns" what actions are taken to perform the task correctly. This learning process is then translated into operating system scripts that use the same inputs that a human would: mouse clicks and keyboard input. Through this process, for example, an RPA can trigger an alert to a caseworker that they need to schedule a check in with a specific family or can notify them that a foster child was truant from a class. RPA can also perform tasks such as triggering timely notification for foster homes, which can include when new support programs become available.[27]

Assist and Expedite in Caseworker Decision Making

In addition to reducing administrative burden, emerging uses of data and technology claim to assist and expedite caseworker decision making through technology like predictive risk modeling (PRM). PRM is a form of data analysis that purports to use historical data to understand relationships between many factors to estimate a level of risk for a child. Both the factors that are considered and the definition of risk are determined by those that develop the model.[28]

PRM aims to help increase the efficiency of decision making by assisting caseworkers who need to triage cases – enabling them to focus their attention on those who need it most. A PRM seeks to

26   Kathy Wroblewska, Courtenay Kessler, Victoria Perez-Zetune, Megan Worden & Nina Page, *Analysis of Robotic Process Automation in Supplemental Nutrition Assistance Program: Three Case Studies*, U.S. Department of Agriculture Food and Nutrition Service, 1 (Sep. 2023), perma.cc/XL67-77R8.

27   *Putting the 'Human' Back in Human Services Through Robotic Process Automation*, Northwoods (Feb. 24, 2023), perma.cc/E5YX-RKL2.

28   Danielle Whicher, Emma Pendl-Robinson, Kyla Jones & Allon Kalisher, *Avoiding Racial Bias in Child Welfare Agencies' Use of Predictive Risk Modeling*, U.S. Department of Health and Human Services (Nov. 9, 2022), perma.cc/7PF2-AP4A.

do this by identifying previously unobserved patterns in data that a caseworker might not uncover themselves, given both the sheer volume of information in each individual case and the large amount of time it would take to sift through data on situations similar to the one at hand. PRMs can assign risk levels, which can be used in conjunction with the caseworker's knowledge of the case, helping to make more informed decisions about which cases need to be prioritized. This technology may also prevent children whose families otherwise might not have been investigated from "slipping through the cracks."[29] The complexity of PRMs and their potential to affect crucial decisions means that risk assessment and mitigation, as discussed below, are particularly important.

In addition to PRMs, certain AI-driven tools attempt to assist caseworkers with the foster family matching process. Although these tools are not widely used by state or local child welfare agencies, such AI tools recommend foster homes for children – seeking to account for characteristics of the child entering the foster system and characteristics of potential foster homes obtained through historical records and previous application statuses.[30]

29   Dan Hurley, *Can an Algorithm Tell When Kids Are in Danger?*, The New York Times (Jan. 2, 2018), perma.cc/3Y9L-WZNJ.

30   Thiag Loganathan & Kevin Jones, *Using AI to Improve Foster Care Matching & Adoption Outcomes*, CDO Magazine (Oct. 12, 2020), perma.cc/X6LK-Q2EP.

Federal Resources For Data Sharing

The federal government has acknowledged the necessity of interoperability between the various state agencies charged with the wellbeing of youth in foster care.[31] As a starting point, the ACF within HHS provides the Comprehensive Child Welfare Information System (CCWIS) as an optional program that supports states who wish to implement it. Implementation of CCWIS requires enhancement of data quality protection, as well as adding additional requirements for bi-directional data sharing with state child welfare agencies, so that caseworkers no longer have to manually enter all data into the child welfare system. The mandatory exchanges added by CCWIS are Medicaid claims, education systems, child welfare courts, child welfare contributing agencies (if applicable), and any other system the child welfare agency uses to collect CCWIS data.[32] This system can be used as a baseline resource, but states can look towards further improvement, such as sharing data with the juvenile justice system.[33]

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31   *See Appendix for "Data Exchange Standards For Improved Interoperability."*

32   *Understanding the CCWIS Final Rule*, Casebook (Sep. 16, 2022), perma.cc/XDR3-2GCW.

33   *See "Grants to States to Enhance Collaboration Between State Child Welfare and Juvenile Justice Systems" in the Appendix for more information about how Congress has supported data sharing between state child welfare agencies and the juvenile justice system.*

03

Irresponsible Data and Technology Use Can Harm Foster Youth

Although data and technology offer the promise of improving services to foster youth, they also come with concerns over privacy and irresponsible use that child welfare agencies should be aware of and work to mitigate to avoid harms falling on children and families.

Lack of Access Controls and Improper Disclosures Can Lead to Stigmatization of Foster Youth and Safety and Wellbeing Concerns

Youth in foster care can suffer significant harm if their sensitive personal information is exposed, especially within the school context. Thus, it is important to limit access to individuals who need it to provide services to foster youth, and for those individuals to not disclose it to unauthorized third parties.

For example, youth in foster care face potential stigmatization by their peers, teachers, and school administration. Previous work from CDT highlighted how something "as simple as a teacher asking about a foster student's court case in a location where other students can hear is enough to create a social stigma and subject that student to bullying and harassment."[34] For this reason, foster children may not want classmates to know about their family situation.

Teachers and school administration may also subject youth in foster care to bias regarding their academic capabilities, especially as they change schools. Highly mobile students like foster youth, who do not have relationships with new school personnel, are more susceptible to biased decision making.[35] Enough data must be shared about the student to place them in the correct classes, but mishandling information may lead teachers or administrators to make inaccurate assumptions about a student's abilities on the basis of their background as a student in foster care.

Handling data with the utmost privacy is also vital in protecting the physical safety and general wellbeing of youth in foster care. For example, foster students who change schools might be doing so to escape from a domestic abuse environment – potentially from a parent or other family member. Failing to protect a student's privacy might jeopardize their physical safety if their new location or enrollment in a new school is exposed to a past abuser.[36] Another example is foster youths' higher risk of identity theft.[37] Because many adults have access to their personally identifiable information during their time in the foster care system, they are more vulnerable to bad actors exploiting their sensitive information, which can significantly impact their general and financial wellbeing by impeding their ability to secure a credit card, housing, or a job.[38]

34   Laird & Quay de-la Vallee, *supra* note 4 at 8.

35   *Id.*

36   *Id.* at 7.

37   *Protecting Children in Foster Care From Identity Theft*, Office of Inspector General, perma.cc/8K64-3E6F.

38   *Five Things Foster Youth Should Know About Digital Safety*, Foster Love (May 11, 2022), perma.cc/US6Y-TM2U.

Data and Algorithmic Bias

A pervasive, well documented issue within the child welfare system is that members of historically marginalized communities, specifically Black families, who come into contact with the system face disparate treatment. In Illinois in 2007, for instance, African Americans made up 19 percent of the state's population but comprised 59 percent of the foster youth population and 34 percent of subjects of reports to protective services for maltreatment.[39] This overrepresentation of Black children and families in investigations for maltreatment and subsequent placement in the child welfare system may be attributable, in part, to biased decision making. A few different theories have been posited to explain that bias, such as the visibility hypothesis[40] and systemic racism and unconscious discrimination.[41]

Efforts to use data must account for biases embedded in that data, which is even more important if it is incorporated into algorithmic decision systems. In this case, algorithmic bias – the tendency of algorithms to make decisions that systematically disadvantage certain groups – may occur because "pre-existing societal

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39   Arthur Horton, Jr. & Jerry Watson, *African American Disproportionate Overrepresentation in the Illinois Child Welfare Systems*, Race, Gender & Class, 66 (2015), perma.cc/H87M-LP9T.

40   *The visibility hypothesis states that children of color are more likely than White children to come into contact with mandated reporters "most likely to report observed or suspected instances of maltreatment," making one expect to see larger concentrations of children of color reported in locations where there are large nonwhite welfare caseloads. Another variant of this hypothesis states that in places with relatively small nonwhite populations, children of color "stand out" more from the other children and are thus more "visible."* Sheila D. Ards, Samuel L. Myers Jr., Patricia Ray, Hyeon-Eui Kim, Kevin Monroe & Irma Arteaga, *Racialized Perceptions and Child Neglect*, Children and Youth Services Review (Aug. 1, 2012), perma.cc/5WS6-CDQN.

41   *Systemic racism and unconscious discrimination suggests that workers who are responsible for investigating allegations of neglect may be consciously or unconsciously coming to racially disparate conclusions as a result of unconscious bias. In a 2012 experiment, visual vignettes picturing messy homes featuring either a Black baby, a White baby, or no baby were used to test whether racial bias may influence caseworkers' decisions about whether a child should be removed under Minnesota's definition of neglect. They found that respondents who saw vignettes with Black babies were more likely to say that the situation meets the state definition of neglect than respondents who saw no baby and/or a White baby. Id.*

prejudices are baked into the data itself."[42]

PRMs, RPA, or other AI tools trained using biased case data risk causing biased decision making and exacerbating racial or socioeconomic disparities.[43] Because Black, Latinx, and Native American families and children are overrepresented in the child welfare system, it is possible that PRMs in particular may inadvertently further entrench existing disparities.[44] Additionally, "government administrative data include more information on certain racial or ethnic groups compared to others because those groups are more likely to be involved in government programs," potentially exposing those groups to further algorithmic scrutiny,[45] and failing to accurately identify needs in other communities. For example, a study found that use of the Allegheny Family Screening Tool in Pennsylvania was on its own "more racially disparate than workers, both in terms of screen-in rate and accuracy."[46] A recent ACLU report similarly found that the Allegheny tool perpetuates racial and disability bias due to "arbitrary" algorithmic design choices.[47]

Over-Reliance on AI

AI tools inherently lack the human judgment that experienced caseworkers possess to make decisions about foster youth cases. For example, the definition of "neglect" does not necessarily

42   Simon Friis & James Riley, *Eliminating Algorithmic Bias Is Just the Beginning of Equitable AI*, Harvard Business Review (Sep. 29, 2023), perma.cc/6SXG-3WG8.

43   Quinn Gawronski, *Racial Bias Found In Widely Used Health Care Algorithm*, NBC News (Nov. 6 2019), perma.cc/U6L8-T4U3.

44   Whicher, Pendl-Robinson, Jones & Kalisher, *supra* note 28 at 3.

45   *Id.* at 6.

46   Logan Stapleton, Hao-Fei Cheng, Anna Kawakami, Venkatesh Sivaraman, Yanghuidi Cheng, Diana Qing, Adam Perer, Kenneth Holstein, Zhiwei Steven Wu & Haiyi Zhu, *Extended Analysis of "How Child Welfare Workers Reduce Racial Disparities in Algorithmic Decisions,"* Arxiv, 2 (Apr. 29, 2022), perma.cc/VH97-ZEZU.

47   Marissa Gerchick, Tobi Jegede, Tarak Shah, Ana Gutierrez, Sophie Beiers, Noam Shemtov, Kath Xu, Anjana Samant & Aaron Horowitz, *The Devil is in the Details: Interrogating Values Embedded in the Allegheny Family Screening Tool*, ACLU (Jun. 2023), perma.cc/P9EQ-ZE4Z.

account for the differences between childcare situations that arise as a result of poverty and true maltreatment by caregivers.[48] Additionally, structured fields in databases may not be inclusive of, or sufficiently nuanced or granular to account for, important factors that caseworkers have confidence are relevant to decisions (e.g., a child's gender identity). Over-reliance on PRMs and other AI tools may result in children being removed from homes where they are not actually at risk and when their situations might be improved by different forms of support. PRMs should never replace human decision making entirely; rather, they should at most be used to provide supplemental information that can increase the efficiency and consistency of human decision making.[49] Even that requires caseworkers to receive appropriate training so that they do not, for example, fall victim to automation bias and defer to the conclusions of a PRM or other AI tool.

Redirecting Resources to Unproven Technology

Not all child welfare agencies will benefit from spending resources on data and technology, particularly when a product's efficacy is unproven. For example, an AI powered tool to predict which adoptive families would stay together, and thus inform the matchmaking process, was touted by the founder as being able to "boost successful adoptions across the U.S. and promote efficiency at cash-strapped child welfare agencies."[50] However, independent investigation into child welfare agency data revealed that the tool actually produced very few results.[51] Data and technology tools that lack independent evidence that they work as intended can actually create more work for child welfare agencies. Depending on the needs of a particular state or locality, funds should be allocated where they are needed most. Child welfare agencies must compare

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48 Whicher, Pendl-Robinson, Jones & Kalisher, *supra* note 28 at 6.

49 *Id.*

50 Sally Ho & Garance Burke, *Inspired By Online Dating, AI tool for adoption matchmaking falls short for vulnerable foster kids*, The Associated Press (Nov. 6, 2023), perma.cc/5FK9-UXEW.

51 *Id.*

the expense of developing or procuring tools with the actual benefits of implementing such systems.[52]

Cybersecurity Risks

Intra- and inter-agency data sharing and technology use can increase the risk of data breaches. For example, RPA raises data privacy and security concerns, as the system potentially has access to foster children's sensitive information contained within case reports or a caseworker's inbox.[53] Introducing RPA into a child welfare agency adds another threat vector for a bad actor to take advantage of. Depending on how these data and technology systems are set up, unauthorized people could have access to case data, putting foster children's privacy at further risk.

Transparency Risks

As a public serving entity, child welfare agencies may risk public backlash if they fail to disclose their use of personal data. For example, developing PRMs requires using sensitive personal data of youth in foster care and their families, which might lead to public distrust if members of the community are not informed of how that data is being used.[54]

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52   Whicher, Pendl-Robinson, Jones & Kalisher, *supra* note 28 at 6-7.

53   Wroblewska, Kessler, Perez-Zetune, Worden & Page, *supra* note 26 at 2.

54   Whicher, Pendl-Robinson, Jones & Kalisher, *supra* note 28 at 7.

04

Recommendations For the Responsible Use of Data and Technology

To deploy data and technology in responsible, rights respecting ways, child welfare agencies should take the following actions:

Identify the Problems that Data or Technology May Solve and the Potential Harms It Could Introduce

- **Assess the Unique Challenges and Needs of the State/ Locality.** As described previously, there are various issues that should be addressed to protect, and better work with, foster youth and families, ranging from informed decision making to reducing caseworker burden to mitigating decades of systemic bias. But child welfare agencies should not assume that acquiring new data and/or technology systems is necessarily

the best solution.[55] For example, communities may not have a sufficient pool of available foster homes to warrant investing in an AI-driven system to assist with matching. Therefore, public agencies should first identify the problems they seek to solve and determine whether data and technology could be helpful – and, if so, whether the benefits outweigh the risks.

- **Carefully Consider Unique Risks Associated With High-Risk Data and Technology Uses.** Even if data and technology have the potential to improve how agencies work with youth in foster care and their families, either the technology itself or its deployment may be high-risk, and should be subjected to scrutiny. For example, AI-driven technology aimed at assisting and expediting caseworker decision making is high-risk in that the technology is new and unproven, and the decisions are highly consequential for children entering the foster care system. Similarly, emerging PRMs are often not independently verified to work and could introduce significant harm and further entrench existing biases.

  If the technology and/or its intended use is high-risk, child welfare agencies should conduct an impact assessment to determine whether to use it in the first place. If they do deploy the technology, they should continuously identify, analyze, and address risks to the health, safety, and civil rights of those the system aims to serve; have appropriate data governance and management mechanisms to ensure data sets are relevant and representative; keep records of how the system functions over the course of its lifecycle; be transparent about the characteristics, capabilities, and limitations of the system; require human oversight to understand, interpret, and potentially intervene in the system; ensure accuracy; and enact appropriate cybersecurity measures.[56]

55   Elizabeth Laird & Hugh Grant-Chapman, *Sharing Student Data Across Public Sectors: Importance of Community Engagement to Support Responsible and Equitable Use*, The Center for Democracy & Technology (Dec. 2, 2021), perma.cc/7JQ9-3AXG.

56   Osman Gazi Güçlütürk, Siddhant Chatterjee & Airlie Hilliard, *Penalties of the EU AI Act: The High Cost of Non-Compliance*, Holistic AI (Feb. 18, 2024), perma.cc/QB3Q-835D.

Engage Affected Stakeholders, From Caseworkers to Foster Youth

- **Bring Caseworkers, Foster Homes, Kinship Caregivers, and Foster Children to the Decision Making Table.** Community engagement should be an ongoing process throughout the lifecycle of the data or technology system, from deciding whether it should be used through post-deployment monitoring. Critical aspects of engaging foster care stakeholders are establishing goals, processes, and roles; working with communities to determine how decisions will be made and communicated; determining and implementing an ongoing governance strategy; ensuring proper representation; and identifying and communicating child welfare agencies' limitations for engagement.[57] Through surveys, meetings, and focus groups, child welfare agencies can assess the perspectives and needs of both the individuals they serve and those that govern the data and technology. Some questions to prioritize asking these critical stakeholders are:

  » What do they see as the most pressing issues that need solving?

  » What are their concerns about introducing new data and technology systems to the foster care system?

  » What are processes that caseworkers are struggling with? Where could data and technology mitigate these pain points?

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57   Laird & Grant-Chapman, *supra* note 55.

Establish and/or Enhance Inter- and Intra-Agency Data and Technology Governance to Guide Decision Making

- **Prioritize Inter-Agency Communication.** Collaboration between child welfare agencies, education agencies, and any other agencies participating in a data sharing system is essential in maintaining high quality data that can inform how to best serve youth in foster care. Agencies can work together to determine which data sources are best for a particular measurement and flag any inconsistencies for remediation.[58]

- **Ensure Adequate Capacity Among Data Stewards and Users.** Caseworkers should be properly trained on the benefits and risks of the particular data or technology system acquired. Systems such as PRMs are complex and require a base understanding of how they process individuals' data and produce decisions. Though caseworkers are not technologists or privacy officers by training, it is vital for them to understand the tools they are working with. Understanding the limitations and risks that come with PRMs, for example, will allow caseworkers to spot when the system may be incorrect either during the information gathering process or in the determination phase.

- **Enable Secure, Appropriate Access Management Controls.** Caseworkers assigned to a specific foster child and any other personnel an agency deems absolutely necessary should be the only individuals with access to sensitive case data. Previous CDT work highlights forms of access controls that child welfare agencies can consider.[59] Within the foster care context, Role-Based Access Control or Attribute-Based Access Control may be the best fits, since they offer the ability to make access to documents or data contingent upon the role of the employee or attribute of the employee or document or data, respectively.[60]

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58   Data Quality Campaign, *supra* note 15 at 13.

59   Hannah Quay-de la Vallee, *Enhancing Privacy and Security through Robust Access Management*, The Center for Democracy & Technology (Mar. 16, 2022), perma.cc/4DTT-J2XE.

60   *Id.*

Maddy Dwyer

- **Practice Data Minimization.** While data can prove helpful in supporting children in foster care, it also poses risks. Consequently, child welfare agencies should determine what data is necessary to collect, especially as it pertains to a child's sensitive personal information. Agencies should weigh the utility of data against the risks of collecting it, and ensure they have a plan for the data, rather than collecting data "just in case" it will be useful in the future.

- **Create Data Retention Standards.** In addition to limiting the collection of extraneous data, agencies should not keep data beyond the time it is needed to serve the individual in question. Agencies must have policies and procedures for data retention and deletion. This is particularly pertinent for the child welfare context, since youth in foster care age out of the system.

- **Ensure Other Agencies Meet Minimum Security Requirements.** When deciding to share data across agencies, it is imperative to review and consider their data privacy and security policies, and whether they align with an agency's basic requirements. If they do not, officials must establish a way to share data without compromising security measures.[61]

- **Encrypt Datasets.** Agencies should use encryption for data in motion and at rest as a standard practice in intra- and inter-agency data sharing to help ensure the privacy and security of foster children's sensitive information.

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61   Elizabeth Laird & Hannah Quay-de la Vallee, *Data Sharing & Privacy Demands in Education: How to Protect Students While Satisfying Policy & Legal Requirements*, The Center for Democracy & Technology, 9 (Nov. 13, 2019), perma.cc/2JLQ-DP6W.

Implement and Manage AI Tools Safely and Responsibly

· **Prioritize Transparency in AI Decision Making.** Deciding to procure and implement an AI tool, like PRMs, is a choice that affects children in foster care, foster homes, and caseworkers. Notifying these stakeholders in a timely, transparent manner about what tool an agency is considering, how it would be used, what data it collects, what data it omits, and how it makes determinations is imperative in building community trust.[62]

· **Establish Clear Human-in-the-Loop Policies and Procedures.** Left on their own, PRMs, RPAs, and other AI tools may make mistakes that significantly impact the outcomes of foster youth. Foster care cases are highly sensitive and high stakes in nature, so it is critical that caseworkers use their expertise to double check that information has been input correctly and know when they should override or correct a determination made by a machine. Caseworkers can have knowledge or context of a specific child's situation that a machine may not be able to account for. Accordingly, agencies should have policies in place that make clear caseworkers should not simply defer to automated tools.

· **Establish a Process for Remedying Mistakes.** Child welfare agencies should have a process in place for remedying errors when they are presented with new evidence. An example of this is when a child is improperly entered into the foster care system or not reunited with their birth family. A caseworker or other agency personnel must be aware of how to review what went wrong in the system's determination and how they can prevent a similar situation from happening in the future. This should be done in partnership with the developer of the system, which may be someone from an agency or third party vendor.

· **Establish a Process to Measure Efficacy, Equity, and Financial Impact.** Using a new data or technology system without measuring its impact is a waste of agency time and

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62   Elizabeth Laird, *Responsible Use of Data and Technology in Education: Community Engagement to Ensure Students and Families Are Helped, Not Hurt*, The Center for Democracy & Technology (Feb. 22, 2021), perma.cc/7B7N-VZ7W.

resources. Child welfare agencies must ensure there is a process in place to measure the efficacy, financial impact, and equity impact of newly acquired data or technology systems. This should be a lifecycle process – done before acquisition, in addition to ongoing monitoring. Some questions to begin asking are:

» Are these tools solving the issues we set out to address?

» Are foster children and their families experiencing unintended consequences of these tools?

▪ **Audit Current Child Welfare Data for Bias.** Child welfare agencies should prioritize reviewing their administrative and case data for indicators of bias, so the data and technology systems built on it are best positioned to avoid perpetuating existing disparities. The following are some considerations that agencies should take into account:

» **Review Data For What is Discretionary.** Particularly when deciding what data to feed into a PRM or other AI tool, child welfare agencies should use their expertise to determine what data may have been subject to personal bias, such as assessments of a child's state of affairs or extraneous notes by caseworkers. Information deemed discretionary can then be taken out of the data used to feed these systems or modified to address undue discretion prior to use in AI tools.

» **Ensure Data Points Are Well Labeled.** PRMs and other AI tools typically make determinations for foster youth such as "risk level" or "best fit." These data points must be clearly defined to ensure that users of these tools can understand how to interpret system outputs and assess whether they are making accurate, reliable decisions. For example, child welfare agencies should clearly articulate what best defines a child in foster care as "high risk" or "at risk." A system intended to predict something specific such as the number of caseworker visits, for example, should clearly label its outputs as such rather than using that number as a proxy for a broader concept of "risk" – a signal which could be misinterpreted or misused to motivate unwarranted punitive intervention rather than supportive care.

» **Disaggregate Data by Demographic Group.** One way to prevent racial or other biases is to disaggregate data by demographic subgroups to understand who is represented in the dataset before feeding it into a PRM or other AI tool (assuming such demographic data is included in the dataset at issue). Using this method allows agencies to determine how factors such as overreporting of specific racial groups may affect whether a PRM or other AI will have disproportionate negative effects. From there, agencies can decide how to best pre-process the data (e.g., via stratified sampling) before using it within a predictive system. Disaggregation should also be used to test the outputs of such systems to determine whether there may be disparate impact or other biases.

Be Diligent in Vetting Vendors

When deciding to procure any of the modes of data and technology mentioned throughout this report from third parties, child welfare agencies should implement the following considerations.

▪ **Develop and Apply Clear Standards, Requirements, and Processes for Procurement.** To the extent they will have access to personal data, vendors must follow the same standards (e.g., data deletion, privacy, retention) as a child welfare agency, especially in dealing with sensitive foster youth data. For example, vendors must have secure data storage methods that meet minimum requirements and should by no means sell or use data for purposes other than those contracted for. If vendors are unable to provide critical information or adhere to established standards, the purchasing decision should be reevaluated.

▪ **Probe Vendors About Auditing for Disproportionate Impact.** Child welfare agencies have a responsibility to ensure that data and technology systems purchased through vendors do not cause harm to the foster youth and families they serve. Asking vendors if their products have been audited for disproportionate impact, requesting copies of the test results, and evaluating whether the product is suitably unbiased for the expected

purpose (either in the child welfare or other contexts), is vital. It is unlikely that their tool has been developed specifically to support the foster care system, which is why having an understanding of its potential pitfalls is critical. Agencies should also require vendors to include in any contracts the obligation to audit again for such impacts on the agencies own data, since results may vary when used in different contexts. If vendors cannot supply the above documentation or comply with contract requests – or if an agency is not completely comfortable that the vendor's product is not biased (whether by evaluating a vendor's own testing or commissioning its own) – the purchasing decision should be reevaluated.

- **Ensure Capabilities for Turning Off Unnecessary Features.** Vendors, particularly ones that provide predictive systems, may perpetuate bias by feeding discretionary or other inappropriate data points into their algorithms. Choosing a product that enables a child welfare agency to turn off those specific features can better suit their goal of providing high quality, equitable services to youth in foster care.

05 Conclusion

Child welfare agencies are tasked with the high stakes responsibilities of ensuring the safety and wellbeing of youth in a profoundly vulnerable situation. Data and technology, like PRMs, RPAs, chatbots, and other AI tools, hold promise in assisting agencies to efficiently and equitably carry out these functions.

However, decisions around procurement and implementation of new data and technology systems must center around protecting the best interest of foster youth – including their civil rights and civil liberties. The recommendations provided in this report can help child welfare agencies best utilize data and technology, while mitigating its potential harms.

06 Appendix – Relevant Federal Statutes

Uninterrupted Scholars Act (USA)[63]

- The law creates exceptions under FERPA that make it easier for schools to release a child's education records to child welfare agencies without prior written consent of parents.[64] It is important to note that these exceptions to FERPA *permit*, but do not require, education agencies to disclose information under these conditions.

  » Allows child welfare agencies access to educational records "in a timely fashion to ensure children in their care are immediately and appropriately enrolled in school and receive the supports and interventions they need for educational success"[65] by permitting education agencies to disclose education records of students to the applicable child welfare agency caseworkers.[66]

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63   20 U.S.C. §1232g(b)(2)(B) (2022).

64   Laird & Quay de-la Vallee, *supra* note 61 at 19.

65   *The Uninterrupted Scholars Act Proposes Amendments to FERPA to Allow Child Welfare Agencies, with the Assistance of Education Agencies, to Better Meet the Educational Needs of Children in Foster Care*, Children's Defense Fund (Sept. 11, 2012), perma.cc/4WVX-FE7B.

66   *Guidance on the Amendments to the Family Educational Rights and Privacy Act by the Uninterrupted Scholars Act*, U.S. Department of Education (May 27, 2014), perma.cc/8Z9F-ZMB3.

○ *Note: Child welfare agencies are also required under the Social Security Act (SSA) to maintain education records in a child's case plan in order to assess educational stability as the child moves between placements while in foster care (also title IV-E of SSA).*

» Permits education agencies to comply with judicial orders for disclosure without parental consent or notification before disclosure, which can provide relevant information to judicial proceedings regarding the child's custody and care.[67]

Family Educational Rights and Privacy Act (FERPA)[68]

- Student data may be shared with a school without parental consent when a student seeks to enroll if (1) a reasonable attempt is made to notify the parent or eligible student, (2) the parents receive a copy of what is shared upon request, and (3) the parent has the opportunity for a hearing to challenge the content of the record.

  » *Note: For perhaps obvious reasons, there can be significant barriers to obtaining parental consent for youth in foster care. FERPA on its own provides a limited number of exceptions to traditional parental consent requirements for data sharing, such as when a student seeks to enroll in school.*

- Educational agencies must maintain a record of all individuals who have requested or obtained access to a student's education record.

- Information that the new school collects about the student cannot be shared with the old school as part of the "seeks to enroll" exception.

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67   *Id.*

68   20 U.S.C. §1232g (2022).

Maddy Dwyer

▪ Schools may transfer discipline information if the conduct poses a significant safety risk; each state must have a procedure in place that will facilitate the transfer of suspension and expulsion records.[69]

Individuals with Disabilities Education Act (IDEA)[70]

▪ The permissible exceptions made by the USA to FERPA, discussed above, are applied to the IDEA as well.[71]

▪ States may require that local education agencies transfer discipline information so long as they also include the student's IEP.[72]

» *Note: This is especially important given the increased likelihood of foster youth to have a disability, including emotional disturbance, which is associated with school discipline issues.*[73]

Every Student Succeeds Act (ESSA)[74]

▪ Requires that states issue public report cards on their progress and goals under the Act, including statistics about vulnerable student populations like foster youth.

» With respect to youth in foster care, states are specifically required to publicly report information on student

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69   Laird & Quay de-la Vallee, *supra* note 4 at 18.

70   20 U.S.C. §1400-09 (2022).

71   *Understanding the Confidentiality Requirements Applicable to Idea Early Childhood Programs Frequently Asked Questions (FAQs)*, U.S. Department of Education (Oct. 2016), https://perma.cc/V3H6-2F29.

72   Laird & Quay de-la Vallee, *supra* note 4 at 18.

73   Barrett & Berliner, *supra* note 3 at 12.

74   20 U.S.C. §6301 (2022).

achievement within this group, including performance on academic assessments and high school graduation rates.[75]

- Through its provision on dropout prevention and programs for at-risk youth,[76] ESSA also requires state agencies to coordinate with local education agencies and alternative education programs attended by incarcerated youth to share student assessments and academic records with correctional facilities. This is so they can provide at-risk youth with "the services needed to make a successful transition from institutionalization to further schooling or employment."[77]

Grants to States to Enhance Collaboration Between State Child Welfare and Juvenile Justice Systems[78]

- As part of the Trafficking Victims Prevention and Protection Reauthorization Act of 2022 (signed into law in January of 2023), Congress authorized the HHS Secretary, in conjunction with the Attorney General and the Administrator of the Office of Juvenile Justice and Delinquency Prevention of the Department of Justice, "to make grants to state child welfare and juvenile justice agencies and child- and youth-serving agencies to collaborate in the collection of data relating to dual status youth" (youth who are involved in both the child welfare and juvenile justice system).

  » Specifically notes that these funds are to be used partially for the development of interoperable data systems.[79]

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75   20 U.S.C. §6311(h)(1)(C) (2022).

76   ESSA Part D, §6421.

77   ESSA Part D, §6421(a)(2).

78   42 U.S.C. §628c (2023).

79   Pub. L. 117-348 (2023).

- *Note: Given the increased likelihood of interaction with the juvenile justice system among foster youth,[80] it is particularly important that child welfare and juvenile justice agencies are capable of exchanging data.*

Data exchange standards for improved interoperability[81]

- Establishes standards for data exchange between state plans approved under parts B and E of Title 42 of the U.S. Code.

- Required data exchange standards:

  - Incorporate a searchable, computer-readable format

  - Contain interoperable standards that have been developed by intergovernmental partnerships

  - Incorporate interoperable standards that were developed by federal entities that have authority over contracting/financial assistance

  - Consistently implement applicable accounting principles

  - Be implemented in a cost-effective, efficient manner

  - Be capable of being upgraded

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80   Cathy S. Wisdom & Michael G. Maxfield, An Update on *"The Cycle of Violence,"* U.S. Department of Justice, 3 (Feb. 2001), perma.cc/Z4LR-UWXF.

81   42 U.S.C. §629m (2018).

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