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Using Electronic Health Record Alerts to Increase Safety Planning with Youth At-Risk for Suicide: A Non-Randomized Trial

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ORIGINAL PAPER

Using Electronic Health Record Alerts to Increase Safety Planning with Youth At-Risk for Suicide: A Non-randomized Trial

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Abstract
Background No study to date has examined the effectiveness of integrating clinical decision support tools, like electronic health record (EHR) alerts, into the clinical care of youth at-risk for suicide.
Objective This study aimed to examine the feasibility and acceptability of using an EHR alert to increase clinicians' use of safety planning with youth at-risk for suicide in an outpatient pediatric psychiatry clinic serving an urban low-income Latino community.
Methods An alert intervention was developed to remind clinicians to complete a safety plan whenever they documented that their patient endorsed suicidal ideation, plan, or attempt during a visit in EHR notes. The alert appeared as a separate window containing a reminder message to complete a safety plan once a clinician finished visit documentation.
Results There were 69 at-risk patients between the ages of 13–21 in the intervention period ($M = 15.71$; $SD = 1.86$; 66.7% female) and 64 ($M = 15.38$; $SD = 1.93$; 68.6% female) in the control period. Logistic regression analyses indicated that patients in the intervention period were significantly more likely than patients in the control period to receive a safety plan ($p < .01$). The pattern of results remained the same after adjusting for demographic variables ($p = .01$). Forty clinicians also completed a questionnaire assessing

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their satisfaction with the EHR alert, indicating moderate satisfaction ($M = 3.01$; $SD = 0.63$; range = 1.11–4.11).
Conclusions EHR alerts are associated with changes in clinicians' behavior and improved compliance with best clinical practices for at-risk youth.

Keywords Suicide prevention · Adolescent · Safety planning · Clinical decision support · Health information technology

Introduction

In the U.S., suicide accounts for one in every ten adolescent deaths and is the third leading cause of death among 15- to 24-year-olds (Curtin et al. 2016; Husky et al. 2012). There is an urgent need to provide adolescents and young adults (youth) at-risk for suicide with best practices in mental health treatment, since many drop out of treatment prematurely (Husky et al. 2012; Spirito et al. 2002). Some evidence suggests that Latino youth are at greater risk of suicidal behavior (ideation and attempts) than other ethnic groups (Duarte-Velez and Bernal 2007). In national surveys, such as the Center for Disease Control's (CDC) Youth Risk Behavioral Surveillance (YRBS), Latino youth are more likely than White and African-American youth to report feeling sad or hopeless, seriously considering suicide, and making a suicide attempt (Kann et al. 2016; Zayas et al. 2011). Although much of the data on the increased risk of suicidal behavior among Latino youth has been based on self-report measures, findings have remained relatively consistent across national surveys for the past 20 years (Price and Khubchandani 2017; Rapp et al. 2017; Zayas et al. 2011). In addition, Latino youth are less likely than White youth to receive quality care and are more likely to drop out of treatment prematurely (Hough et al. 2002; Duarte-Velez and Bernal 2007). Given their poor compliance with treatment, it is imperative that mental health providers intervene quickly when suicidal thoughts and behaviors become evident.

Research has found that the majority of recurrent suicidal events occur within 4 weeks of treatment intake, underscoring the importance of early treatment engagement. Brent and colleagues suggest that interventions for at-risk youth be "front-loaded" to offer early, immediate and effective treatment techniques (Brent et al. 2009). One such recommended treatment intervention is safety planning. A safety plan occurs when patient and clinician work collaboratively to: (1) recognize individual warning signs that may precede a suicidal crisis, (2) identify and prioritize the use of specific internal and social coping strategies a patient can use when suicidal thoughts emerge, (3) identify individuals a patient can contact if coping strategies do not alleviate suicidal thoughts, and (4) identify professionals or agencies who can provide assistance during a suicidal crisis (Stanley and Brown 2012). Safety planning is a key component of cognitive behavioral treatment for adolescent depression and suicide prevention (Stanley et al. 2008) and has become incorporated into other treatments.

Currently, safety planning is being adopted by many mental health agencies as a recommended or even a required intervention for any patient facing suicidal crisis (Zuckerbrot et al. 2007), and is increasingly included as part of electronic health record (EHR) notes clinicians are encouraged to complete with patients at-risk for suicide in New York State. To achieve the National Action Alliance for Suicide Prevention goal of zero suicide, i.e., a commitment to suicide prevention in health and behavioral care systems, many efforts have been made to increase clinician awareness of best practice guidelines for suicide prevention, such as safety planning (National Action Alliance for Suicide Prevention 2012;

Zuckerbrot et al. 2007). Although clinicians' adherence to safety planning has not yet been studied, research indicates that in general, clinician adherence to psychiatric guidelines has been unsatisfactory (de Beurs et al. 2015). Psychiatric guidelines aim to improve the quality of care by advocating best practice models and reducing variation in treatment. However, disseminating guidelines alone might not alter clinicians' behavior (Weinmann et al. 2007), and clinicians may need additional support to implement best practice guidelines.

The use of clinical decision support tools in EHRs is a strategy to improve the quality of care and health outcomes in various areas of medicine (Co et al. 2010), and might represent a means to improve clinician compliance with safety planning with at-risk youth. Clinical decision support tools include alerts and reminders for both providers and patients, clinical guidelines for care, condition-specific order sets, templates for documentation, patient data reports, and diagnostic support (Co et al. 2010; Peters 2017). EHR alerts and reminders have been shown to improve care among children and youth in areas such as hypertension (Brady et al. 2015; Kharbanda et al. 2015), influenza vaccination (Fiks et al. 2009; Stockwell et al. 2015), and human papillomavirus vaccination (Mayne et al. 2014).

Child and adolescent psychiatry has lagged behind other medical fields in the adoption of clinical decision support tools in the EHR (Peters 2017). In one of the only studies to examine the impact of clinical decision supports tools for child mental health problems, Co et al. (2010) found that clinician reminders to assess Attention Deficit Hyperactivity Disorder (ADHD) symptoms and an ADHD note template in the EHR led to an increase in ADHD assessment and documentation among pediatricians working with 5- to 18-year-olds in the community. To the author's knowledge, no study to date has examined the effectiveness of integrating clinical decision support tools into clinical care of youth at-risk for suicide. However, triggering EHR alerts for completion of safety and risk assessments for patients at-risk for suicide could be an invaluable tool for use in clinical practice (Peters 2017), thereby improving physician adherence to best practices and saving youth lives.

The current study sought to extend understanding of the benefits of clinical decision support tools in the EHR with regard to improving care of a high-risk population: urban Latino youth deemed at-risk for suicide. Specifically, we examined the feasibility and acceptability of using an EHR alert to increase clinicians' use of safety planning with youth at-risk for suicide in an outpatient pediatric psychiatry clinic serving an urban low-income Latino community. We hypothesized that (1) an EHR alert would lead to an increase in the number of safety plans authored by clinicians for at-risk patients compared to a historical control period and (2) clinicians would be satisfied with using the alert as part of the EHR system.

Method

Study Setting and Design

The study was conducted in an outpatient child and youth psychiatry clinic in the children's hospital of a large university medical center which serves youth ages 4 through 21 and is located in a low-income, predominantly Latino neighborhood in New York City. The clinic trains predoctoral psychology interns, child psychiatry residents who have completed a residency in general psychiatry, and social work interns, and provides mental health services for approximately 500 children (up to age 10) and nearly 800 youth (ages

11–21). In 2014, over 693 patients presented with a principal diagnosis of anxiety and/or depressive disorders. All visits during the intervention period (September 15, 2014 to March 15, 2015) and during the control period (September 15, 2013 and March 15, 2014) of patients 13–21 years of age were included. The historical control and intervention periods were chosen to control for seasonal/time effects and trainee turnover. This study was approved by Columbia University Medical Center's Institutional Review Board. This study also conforms to the Transparent Reporting of Evaluations with Nonrandomized Designs (TREND) guidelines (Jarlais et al. 2004; see Supplemental Table 1 and Supplemental Figure 1).

Participants

Participants were 40 mental health clinicians working in the clinic. The majority of clinicians were female ($n = 35$; 87.5%), non-Latino White ($n = 33$; 82.5%), and between the ages of 30 and 39 ($n = 25$; 62.5%). Participants included psychologists ($n = 16$; 40%), psychiatrists ($n = 5$; 12.5%), social workers ($n = 5$; 12.5%), psychology trainees ($n = 5$; 12.5%), child psychiatry residents ($n = 8$; 20%), and a psychiatric nurse practitioner ($n = 1$; 2.5%). Sixty percent of clinicians ($n = 24$) reported having completed their clinical training in the last 5 years.

Measures

Demographic Questionnaire

The demographic questionnaire elicited information on clinician age, gender, race/ethnicity, and prior treatment experience.

Clinician Satisfaction Questionnaire

Clinician satisfaction with the EHR alert intervention was assessed via a 9-item measure designed for this study (e.g., "I am happy with the Allscripts Alert"). Clinicians were asked to rate their responses using a 5-point Likert scale ranging from one (strongly disagree) to five (strongly agree). Item four on the scale (i.e., "I feel the Allscripts Alert made it more difficult to complete my notes") was reverse coded. Cronbach's alpha for the scale was .92.

Alert Intervention

As part of the standard of care in the clinic, all clinicians are required to complete a safety plan note with patients presenting with suicidal ideation, plan, or attempt in the clinic's EHR, Allscripts (Allscripts Corporation, Chicago, IL). The safety plan note includes structured fields for the six safety planning steps outlined by Stanley and Brown (2012) (i.e., warning signs, internal coping strategies, people and social settings that provide distraction, people to ask for help, professional or agencies to contact during a crisis, and making the environment safe). The progress note, treatment plan and evaluation note include categorical fields in which the clinician indicates whether a patient has reported suicidal ideation, plan, or attempt. Clinicians are required to complete a progress note for every patient visit, as well as a treatment plan note every 3 months for each patient on their

caseload. Clinicians are also required to complete an evaluation note whenever they complete an initial psychiatric evaluation with a patient. The intervention was designed so that the alert was triggered whenever a clinician indicated in the categorical fields that a patient reported suicidal ideation, plan, or attempt. The alert appeared as a separate window containing a reminder message to complete a safety plan once a clinician finished documentation of the visit.

A Medical Logic Module (MLM) was used to determine the type of alert message presented to clinicians treating patients at-risk for suicide. The MLM used data entered by clinicians and existing Allscripts records to select messages for clinicians from a preset list. The MLM used the following algorithm for the alerts: After a clinician entered his or her patient data in the progress note, treatment plan, and/or evaluation note, the alert system first scanned Allscripts to see if a safety plan note was authored or revised within the last 24 h. If a safety plan was authored or revised, the clinician received a pop-up message thanking them for completing a safety plan (e.g., "A safety plan was completed 'date' by 'clinician.' Remember to provide the patient with a copy of the safety plan."). If a safety plan was not authored within the last 24 h, the alert scanned for the most recent safety plan in Allscripts. If one existed, the clinician received a pop-up message alerting the clinician to the previous safety plan in the record (e.g. "The safety plan completed for this patient on 'date' by 'clinician' may be out of date. Please revise the plan as needed and provide a copy to the patient."). If no safety plan existed, the alert read, "No safety plan exists in the record. Please complete a safety plan with the patient and provide him/her with a copy" (see Fig. 1 for example alert).

Alert Timing and Study Periods

Prior to the implementation of the alert, clinicians did not receive a reminder to complete a safety plan note available in the clinic's EHR with patients at-risk for suicide. As noted above, we defined the time period from September 15, 2013 until March 15, 2014 as the control period. On September 15, 2014, the alert went live. We defined the time period from September 15, 2014 to March 15, 2015 as the intervention period. The alert only triggered when a clinician reported that a patient reported suicidal ideation, attempt, or plan.

Data Analysis

We analyzed time-stamped data files, also known as system usage logs collected from the Allscripts. Our data set did not include any identifying patient information but included data on patient gender, age, race/ethnicity, medical insurance, primary diagnosis, and provider position (e.g., psychologist). We included patients seen in the clinic that were between the ages of 13 and 21. Data were managed and analyzed using SPSS 23 (IBM, Chicago, IL). Descriptive statistics (t tests, Chi square) were used to characterize the number of patients deemed at-risk before and after the alert. In addition, we conducted logistic regression analyses to determine if the alert had a significant impact on the authoring of safety plans for high risk patients. We characterized each at-risk patient as belonging to either the control (no alert) period or the intervention (alert) period. Patients appearing in both the control and intervention periods ($n = 22$) were not included in the analyses. Finally, descriptive statistics and Pearson's correlations were used to analyze data from the clinician satisfaction questionnaire.

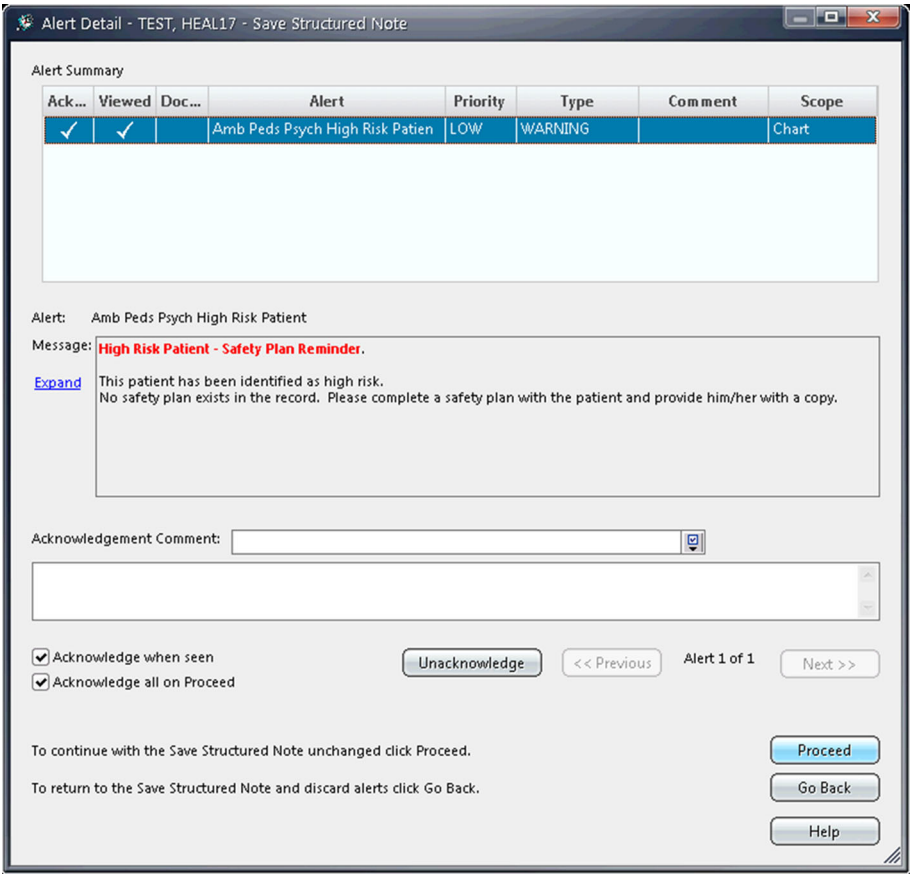

Fig. 1 Example of alert message clinicians receive when no safety plan exists for at-risk patient in electronic health record

Results

During the control period, 1083 patients attended the clinic. Of these, 64 patients between 13 and 21 years of age were deemed at-risk (108 high risk notes). There were 1040 patients who attended the clinic during the intervention period. Of these, 69 patients were considered at-risk (179 high risk notes). Sixty-eight percent ($n = 90$) of the 133 at-risk patients were female with a mean age of 15.55 ($SD = 1.90$). Of the 133 at-risk patients, 69.2% ($n = 92$) self-identified as Latino and 76.7% ($n = 102$) had a DSM-IV mood disorder diagnosis, such as major depressive disorder, dysthymia, depressive disorder not otherwise specified, and bipolar disorder. *T* test and Chi square analyses revealed that at-risk patients in the control and intervention periods did not differ significantly in terms of age, gender, or Latino self-identification or primary DSM-IV diagnosis (see Table 1).

Thirty-four out of 69 at-risk patients in the intervention period (49.3%) received safety plans compared to 14 out of 64 high risk patients in the control period (23.1%). A logistic regression analysis showed that clinicians were more likely to complete a safety plan for an at-risk patient during the intervention period than the control period ($p = .001$). The

Table 1 Patient characteristics, by using ^{2} and *t*-tests for differences between intervention and control groups

Characteristic	Control ($n = 64$)	Intervention ($n = 69$)	Test statistic
Female, *n* (%)	44 (68.8)	46 (66.7)	^{2} (1, $N = 133$) = .066, $p = .797$
Age (years), mean (SD)	15.38 (1.93)	15.71 (1.86)	$t = -1.02$, $p = .310$
Latino, *n* (%)	49 (76.6)	43 (62.3)	^{2} (1, $N = 133$) = 3.16, $p = .076$
Diagnosis, *n* (%)			
Mood disorders	53 (82.8)	49 (71.0)	^{2} (1, $N = 133$) = 2.59, $p = .108$
Anxiety disorders	4 (6.3)	10 (14.5)	^{2} (1, $N = 133$) = 2.40, $p = .122$
Other	7 (10.9)	10 (14.5)	^{2} (1, $N = 133$) = 0.38, $p = .540$

pattern of results remained the same after adjusting for age, gender, Latino self-identification, and DSM-IV diagnosis ($p = .002$) (see Table 2).

Clinician Satisfaction with the Alert

The frequency of clinician responses to each of the nine items on the satisfaction survey is presented in Table 3. Overall, clinicians reported feeling neutral about the alert. The mean score for the satisfaction survey was 3.01 ($SD = 0.63$) out of a possible five [one (strongly disagree) to five (strongly agree)], with scores ranging from 1.11 to 4.11. Approximately 27% ($n = 10$) of clinicians reported feeling happy with the alert, 18.9% ($n = 7$) felt it improved their level of care, and 27% ($n = 10$) felt it led them to complete more safety plans. Clinician satisfaction with the alert was not significantly associated with years since completing professional training, role in clinic, or receipt of formal or informal training. However, there was a positive correlation between level of comfort with safety planning and overall satisfaction with alert ($r = .336$, $p < .05$).

Discussion

The current study aimed to examine whether an EHR alert to assess the need and presence of a safety plan in a patient's EHR led to an increase in clinicians' use of safety planning in their clinical work with primarily Latino youth at-risk for suicide. We also examined

Table 2 Multivariate logistic regression models of EHR alert and demographic variables on safety planning

Predictor variables	Model 1 OR (95% CI)	Model 2 OR (95% CI)
Intervention	3.47** (1.63, 7.40)	3.64* (1.63, 8.14)
Female		1.51 (0.63, 3.60)
Age		0.90 (0.73, 1.12)
Latino		0.91 (0.39, 2.14)
Anxiety disorders		1.10 (0.33, 3.63)
Adjustment disorders		0.61 (0.10, 3.40)
Behavior disorders		0.86 (0.12, 6.02)
Other		0.74 (0.07, 7.48)
Pseudo R[a]	.11**	.13*

CI confidence interval

*$p < .05$; **$p < .01$

[a]Nagelkerke R^2

Table 3 Frequency of clinician responses to items on clinician satisfaction questionnaire

Item	1 Strongly disagree *n* (%)	2 Disagree *n* (%)	3 Neither agree/ disagree *n* (%)	4 Agree *n* (%)	5 Strongly agree *n* (%)	Total *n* (%)	Item mean *M* (*SD*)
Adding the Allscripts Alert was a good idea	1 (2.7)	8 (8.1)	21 (56.8)	8 (21.6)	4 (10.8)	37 (100)	3.31 (0.89)
I am happy with the Allscripts Alert	2 (5.4)	2 (5.4)	23 (62.2)	7 (18.9)	3 (8.11)	37 (100)	3.19 (0.89)
I feel the Allscripts Alert improved my level of patient care	2 (5.4)	8 (21.6)	20 (54.1)	7 (18.9)	0 (0)	37 (100)	2.89 (0.78)
I feel the Allscripts Alert made it more difficult to complete my notes	0 (0)	13 (36.1)	18 (50.0)	4 (11.1)	1 (2.8)	36 (100)	3.19 (0.75)
I feel the Allscripts Alert made me a better clinician	3 (8.1)	14 (37.8)	18 (48.7)	2 (5.4)	0 (0)	37 (100)	2.53 (0.74)
I feel the Allscripts Alert aided me in my clinical work	1 (2.7)	6 (16.2)	20 (54.1)	10 (27.0)	0 (0)	37 (100)	3.06 (0.75)
The Allscripts Alert led me to complete more safety plans	1 (2.7)	11 (29.7)	15 (40.5)	10 (27.0)	0 (0)	37 (100)	2.92 (0.84)
The Allscripts Alert led me to revise more safety plans	1 (2.7)	9 (24.3)	20 (54.1)	7 (18.9)	0 (0)	37 (100)	2.89 (0.75)
The Alert should become a permanent part of Allscripts system	2 (5.4)	2 (5.4)	21 (56.8)	10 (27.0)	2 (5.4)	37 (100)	3.22 (0.86)

clinicians' satisfaction with the alert. Consistent with our hypothesis, youth in the intervention period were three times as likely as those in the control period to receive a safety plan. Despite this increase in safety planning, most clinicians reported feeling neutral about the alert. Clinician satisfaction with the alert was higher among those who reported feeling more comfortable with safety planning.

Embedding clinical decision support in EHRs has been shown to be an effective way to improve the quality of care in numerous areas of medicine (Peters 2017). Our study extends this work to the care of minority youth at-risk for suicide. There is an urgent need to provide Latino youth at-risk for suicide with best practices in mental health treatment. Despite the high self-reported suicide attempt rate among Latino youth (particularly Latinas), they are often less likely than White youth to receive quality care that is timely (Hough et al. 2002). Additionally, there is a paucity of research supporting the use of EBTs and practice innovations with ethnic minority children and families (Goldstein et al. 2007; Lau 2006). The alert was associated with increased safety planning with a sample of primarily at-risk Latino youth. Future research should examine whether the alert may help

decrease suicidal ideation and behavior among at-risk youth. Overall, our findings indicate that alerts can help improve adherence to best practice guidelines in suicide prevention among clinicians working with at-risk youth in a busy urban low-income Latino community. The National Action Alliance's Clinical Care and Intervention Task Force has included collaborative safety planning as part of the seven essential elements of suicide care for health and behavioral healthcare systems to adopt (National Action Alliance for Suicide Prevention 2012). If our results can be generalized to other settings, such as school-based mental health and primary care clinics which are more likely to provide mental health care services to at-risk minority youth (Guo et al. 2014), then EHR alerts may be a vital tool to help healthcare systems achieve the goal of zero suicide.

Although our findings indicated that there was an increase in safety planning, there were numerous at-risk patients for whom clinicians failed to complete a safety plan. As noted above, only 50.7% of youth identified as at-risk in the intervention period received a safety plan, meaning that half of at-risk youth did not receive one. One possible explanation for this finding might be the timing of the alert. Clinicians typically complete their notes after a visit ends and only received the alert once an at-risk patient was no longer in the therapy room. Any clinician who forgot to complete a safety plan needed to wait until the next visit to complete one with their patient. One potential area for future research is examining how EHR alerts and clinical decision tools might be used to alter clinician behavior while providing patient care in real time. Perhaps clinicians can complete a brief suicide screen in the EHR or via a tablet computer that connects to the EHR at the beginning of each therapy session to ensure that all at-risk patients receive a safety plan. However, clinicians' use of the EHR during therapy sessions should occur in a way that does not interfere with the therapeutic process. Future research in this area should include clinicians' input in order to make the use of EHR tools during therapy sessions as seamless as possible.

Additionally, clinicians' satisfaction with the alert was largely neutral, and few felt it improved their level of care or increased their safety planning. Some research indicates that too many EHR alerts can lead to provider fatigue and dissatisfaction (Peters 2017). However, only 11% ($n = 4$) of the clinicians in this study reported that the alert made it more difficult for them to complete their notes. Despite clinician attitudes, safety planning alerts may facilitate a constructive pause or "time out" in clinical decision making for high risk behaviors. Time out procedures have been found to be helpful in quality initiatives aimed at reducing medical errors (Stahel et al. 2009). It should also be noted that clinicians were unaware that the alert lead to an increase in safety planning. Perhaps clinicians' attitudes toward the alert might be more positive if they were aware of its influence on their behavior.

Our results might also be related to clinician perceptions of safety planning in general. For instance, Chesin et al. (2017) found that while emergency department staff felt positive about the use of safety planning with an at-risk veteran population, many did not believe that safety planning would decrease imminent risk of suicide. There are currently major gaps in our knowledge about risk factors that predict imminent risk of suicide (Glenn and Nock 2014) and protective strategies. It is possible that safety planning increases clinicians' comfort with at-risk patients by allowing them to more thoroughly discuss coping strategies with these individuals. However, given the limited knowledge available to clinicians about which imminent risk factors they should be attending to, this increased comfort might not translate to increased confidence that at-risk patients will use their safety plan during a crisis. Clinicians might feel neutral about the alert's effectiveness because they are uncertain whether safety planning has any impact on decreasing suicidal behaviors among at-risk youth. Future research should examine whether clinicians' attitudes toward

safety planning influences their behavior, including frequency and quality of safety planning, as well as their attitudes towards interventions aimed at increasing their use of safety planning.

While the literature on the use of safety plans and clinical utility of safety planning interventions is sparse, it is widely viewed as a useful clinical practice. So much so that the EHR alert has been made standard of care in the clinic. It should be noted that clinicians' satisfaction with the alert was positively related to their comfort with safety planning. Future research should aim to improve clinician understanding and training in the use of safety planning to increase comfort with the intervention before implementing clinical decision support tools. Future research should also aim to understand clinician perspectives on what is helpful and not helpful about EHR alerts and how to make EHR alerts more effective tools when treating at-risk youth.

Study limitations include the use of a single clinic site for implementation and a small number of clinicians using the alert, which limits the generalizability of the findings. We also did not measure patient outcomes to better assess the benefits of the alert for improving care, preventing suicidal behavior, or emergency room visits. Our results relate only to the frequency of use and provider satisfaction. Future research should examine the impact of the alert on patient outcomes including symptoms, emergency services use, and treatment attendance.

Conclusions

This study suggests that clinical decision support tools, such as EHR alerts, can increase the number of at-risk patients for whom therapists author safety plans. Thus, the use of EHR alerts has the potential for improving care for youth at-risk for suicide. Future work should be conducted to evaluate the use of alerts in different clinical settings, as well as to develop an EHR dashboard (i.e., a tool to view and manage patient data) that will succinctly communicate information related to patients' suicidal risk, such as triggers and coping skills listed in the safety plan. Sharing safety plan information through EHR alerts or dashboards might reduce fragmentation and improve care coordination for youth at-risk for suicide by helping clinicians in different departments reinforce and refine coping strategies. Enhanced care coordination can lead to increased treatment engagement and adherence, reduction in ED visits and inpatient hospitalizations, and decreased suicidal ideation and behavior among at-risk youth.

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Compliance with Ethical Standards

Conflict of interest The authors declare that they have no conflict of interest.

Ethical Approval All procedures performed in studies involving human participants were in accordance with the ethical standards of the institutional and/or national research committee and with the 1964 Helsinki declaration and its later amendments or comparable ethical standards. Informed consent was obtained from all individual participants included in the study.

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