

COVER PAGE

Date: 2-25-20

Study Protocol

: NCT03655470

Brief Title: Safety Planning in Juvenile Justice for Suicidal Youth

Official Title: Screening and Brief Intervention for Suicidality and Nonsuicidal Self-Injury Among Youth in the Juvenile Justice System

Secondary IDs: 1R34MH114307-01A1 [U.S. NIH Grant/Contract Award Number]

The proposed study will be divided into two phases. In Phase I, we will conduct an open trial with 10 adolescents which will allow us to make any modifications necessary for using the protocol in Probation. We will then randomize 60 suicidal JJ youth who screen positive for recent SI into standard care or the safety planning intervention. We will train two part-time counselors who have a master's degree in the mental health field and work in the local community mental health clinic, Gateway, in which MPI Spirito and Co-I Wolff have consulted. Counselors with community mental health experience were selected because youth in the JJS are typically served by community mental health clinics, so this choice was also made with an eye toward eventual implementation. In addition, the model proposed here – of mental health counselors embedded in Probation – is consistent with a co-responder model, found across the U.S. in which a PO works collaboratively with a mental health professional to coordinate care. Thus, if the protocol is found to be effective, there is an existing infrastructure that could aid further implementation. We will hire a bilingual counselors so they will be able to conduct the intervention and give feedback to youth and parents who are Spanish-speaking.

The counselors will cover afternoon appointments in Probation and be employed by the research grant because Probation rules prohibit audiotaping sessions with youth. By employing the mental health counselors on the grant, we will be able to rate tapes of sessions for fidelity and competency (see below). In order to conduct the study under conditions most relevant to a future implementation trial, we will also employ a training approach that has been successfully implemented by Co-I Wolff with Bachelors and Masters level staff in a psychiatric hospital<sup>86,87</sup> (see below)..

In Phase II, of the study, we will: a) conduct qualitative interviews in Probation about attitudes toward the intervention as well as barriers to a future, larger implementation trial; and b) conduct a **SIM Mapping**, described above, to outline a series of other potential “points of interception” along the JJS continuum, beyond Probation, where screening and brief intervention might be implemented in a future system-wide trial.

### **Phase I. Open trial and RCT**

**Study overview.** In this treatment development grant, 70 adolescents in Probation will be recruited to participate in the study. The first 10 will participate in an iterative development open trial. Then 60 youth will be randomized to: 1) the screening/brief intervention safety planning intervention, or 2) standard practice.

**Open Trial Design.** A total of 10 youth will be recruited for open trial in order to: a) test the protocol's applicability in Probation, and b) train the mental health counselors in the protocol. We have used this 2 phase approach extensively in prior studies. The open trial will occur in months 5 - 8 after counselor training. The protocol and procedures will be modified as necessary after the first 5 participants and then again after 10 pilots have been run through the protocol and prior to conducting the pilot RCT

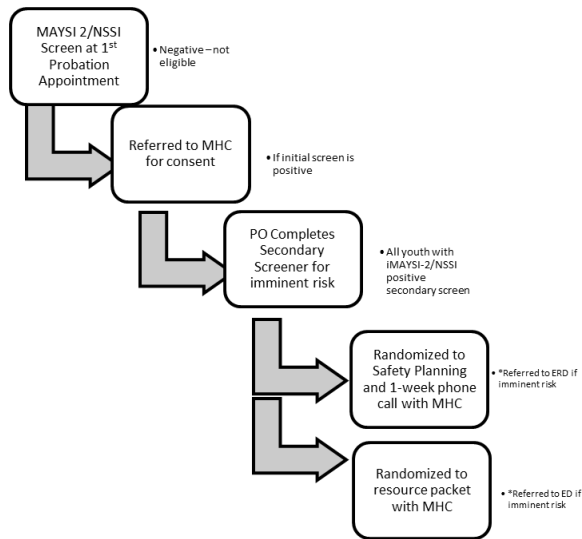
**Overview of RCT Trial Procedures.** When youth arrive for their first Probation appointment, they are asked to complete the MAYSI/NSSI assessment. Youth who flag in on the MAYSI or NSSI item on this first screen, will be referred by their PO to the mental health counselor who will approach them about participation in the study. If the parent/caregiver consents to the study, the mental health counselor will then meet with the youth, physically separate from the parent/caregiver, to describe study procedures in detail (**including the fact that only youth who are positive on the secondary screen continue in the study**) and obtain juvenile assent without parental presence (see **Human Subjects**). Consenting procedures will also include permission to access court records. All youth will then complete the complete the Self-Injurious Thoughts and Behaviors Interview 2.0 (SITBI-Short Form<sup>91</sup>, see below), to more thoroughly assess self-injurious behavior. Families will then be referred back to their PO to complete the secondary screen. If the youth screens in, he/she is then randomized to either standard practice or the safety planning intervention.

Follow-up assessments will also be completed at 1- and 3-months post-baseline to gather data on youth outcomes related to treatment, self-harm, and recidivism. No juvenile will ever be sanctioned by the court for not agreeing or being unable to participate in the research study (see **Human Subjects/Letter of Support**).

**Current standard practice.** The MAYSI-2 provides two cut-off scores: caution (2 items endorsed) and warning (3 or more items endorsed). (Note: a screening item from the SITBI – “Have you ever had thoughts of purposely hurting yourself without wanting to die, e.g. cutting, burning? If yes, how many separate times in your life?” – has also just been added as part of standard practice). If a teen has a positive screen for suicide risk, the PO completes a “secondary screener” built into the MAYSI- 2 to determine whether there is concern of current and/or imminent risk. If a teen endorses NSSI more than once in the prior year, then the PO asks about frequency and severity. If there is ongoing concern of risk for self-injurious behavior, then the PO arranges for a crisis evaluation in the Emergency Department (ED). If the teen is not judged to be at imminent risk, the PO makes a referral back to the current treatment provider or to a community mental health clinic. In either case, the parents and youth receive a packet with mental health resources.

In the experimental condition, if a teen screens positive on the secondary screener, and is randomized to

*the safety planning intervention, the PO will refer the case to the mental health counselor. The mental health counselor will conduct the safety planning intervention (described below) and then make a decision whether*



*the teen remains at imminent risk, and needs to be referred for an ED evaluation. If there is no imminent risk, the PO and mental health counselor together facilitate a referral back to the current treatment provider or to a community mental health clinic. The mental health counselor will also conduct a follow-up phone call one week after the safety plan to answer any questions about the safety plan and promote linkage to treatment as needed.*

**Participants.** Youth offenders, ages 12-17 will be eligible for enrollment with the following criteria: 1) Legal guardian available to consent for juvenile's participation, 2) Juvenile and parents are English or Spanish speaking; and 3) Juvenile flags in on the MAYSI-2 or NSSI item. *In order to maximize the ecological validity of this pilot trial, there will not be any exclusion criteria.* **Racial and Ethnic Minority**

**Considerations.** Consistent with 2016 RIFC statistics, ethnic representation will be approximately 18% Hispanic and racial

representation will be about 22% Africa American or Black (and other) and 72% White. **Estimated Sample Size and Retention Rates.** In 2016, the RIFC handled offenses for 2,634 juveniles of whom 764 (29%) were female and 2,581 (98%) who were in the 12-17 year old age range. The Juvenile Intake Department, for example, screens more than 904 juveniles per year and, of those youth who are screened, approximately 10% (N=89) flag for recent SI. In 2015, the detention center admitted 470 youth. *Probation had a caseload of 375 in 2015. Of these youth, it is estimated that 20% of youth screen positive for current risk of self-injurious behavior (N=75). Even with a conservative acceptance rate of 60%, we would be able to recruit about 45 youth per year and meet our 20 month projected enrollment goal of 60 participants, i.e. about 3 per month (3 x 20 = 60). Using a conservative follow-up rate of 80% (see **Retention**) of the 60 enrolled and retained participants, approximately 48 are expected to complete the 3-month follow-up.* This approach is feasible given our excellent working relationship with the JJS, including the RIFC, and prior experience recruiting from the juvenile intake department (see RIFC Chief Judge and Probation Letters of Support). MPI Kemp collaborated on a 24-month longitudinal epidemiological study of first-time CINI offenders at the RIFC and we successfully recruited the entire sample of 400 first-time offending CINI youth (DA034538). MPI Kemp is also currently recruiting at the RIFC juvenile intake department for a baseline sample of suicidal CINI youth for her NIMH K23 Mentored Career Award. MPI Spirito also successfully established a referral system from RIFC to his NIAAA (AA017659) and NIDA (DA0029871) trials for youth with substance use-related court involvement.

**Experimental protocol: Safety Planning.** This brief intervention, consists of an in-person and follow-up phone call that are based on cognitive behavioral principles designed to help identify a concrete list of coping strategies and social supports that youth can utilize preceding or during a crisis to lower imminent risk of NSSI or suicidal behavior. Specifically, the Safety Plan will help the youth and caregiver identify: environmental risk factors including access to means and triggers; individualized warning signs; specific coping skills; peer and family social supports to help distract from negative thoughts; adult contacts for help; and reasons for living<sup>92</sup>. The Safety Plan is also reviewed with parents and any barriers to the plan are discussed. For example, logistical barriers related to locking up medication may be problem solved or the family may discuss supportive ways the parent can respond if the teen reaches out for help. *In youth who also report NSSI, the safety plan format is suitable to address both suicidal and nonsuicidal behavior.* (Note: in a recent study, on which MPI Spirito was an author, NSSI was found to be a stronger predictor of future suicidal behavior than even a prior suicide attempt<sup>45</sup>). Safety planning has been determined to be a best practice by the Suicide Prevention Resource Center/American Foundation for Suicide Prevention Best Practices Registry for Suicide Prevention ([www.sprc.org](http://www.sprc.org)). The plan helps youth and parents identify possible triggers to including suicidal and self-injurious thoughts, feelings, and behaviors; develop a plan to remove lethal means; determine distress tolerance/emotion regulation skills that may be helpful; identify accessible social supports to target hopelessness/sense of isolation; reinforce the commitment to seek treatment; and reviews how and where to access emergency care. (See **Appendix 1** for safety plan worksheet).

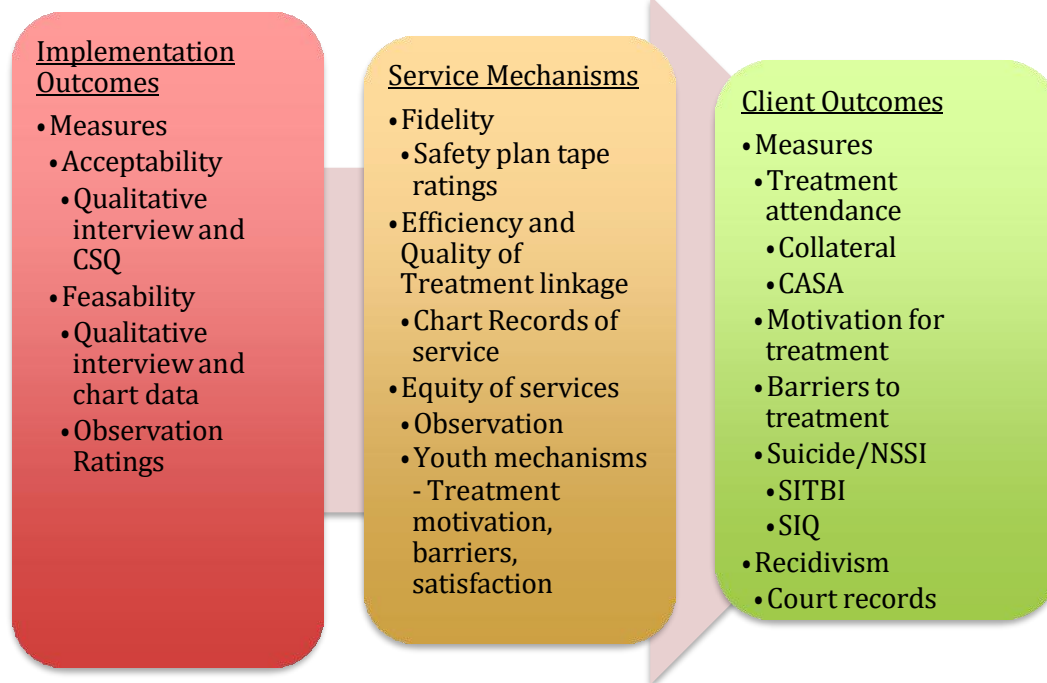
If a juvenile flags in and is in the experimental condition, the safety planning will occur in three stages: 1) the juvenile will meet with a trained mental health counselor to create the safety plan; 2) the juvenile and counselor will meet with the PO and caregiver to share the safety plan and discuss strategies and challenges to implementing the safety plan<sup>92</sup>; and 3) the PO will then contact the current mental health provider or appropriate community mental health clinic to facilitate an outpatient appointment, if the youth is not at immediate risk. In cases where substance use is an issue, the JJS staff member will ask permission of the youth to relay this to the community mental health clinic or current provider.

The Safety Plan intervention, *which consists of the one module from Co-I Wolff's COPES program described above*, incorporate the SITBI responses, which covers both suicidal and nonsuicidal ideation and behavior, to ensure all areas are covered in the Safety Planning process. For example, the SITBI will identify suicide means youth have thought about using. Youth make a list of dangerous items to remove from their surroundings (e.g., alcohol, knives, razors, medications) in order to reduce access to means, identify their warning signs and vulnerabilities that indicate they may become unsafe, generate helpful coping strategies, and identify people that can help them manage negative feelings.

*The safety plan intervention concludes with a section emphasizing completing referrals for outpatient care for those youth. Youth will also complete the 8-item Motivation for Youth's Treatment Scale (MYTS<sup>93</sup>) to facilitate discussion between the counselor and the youth about the youth's current motivation for treatment. At the same time, the caregiver will complete the Barriers to Treatment Participation Scale (BTPS<sup>94</sup>) that will inform the mental health counselor about potential barriers (identified as "often a problem" or "always a problem") and promote discussion during the safety planning with the youth and caregiver about those potentials barriers and generate ideas on how to overcome them.*

**Brief Intervention Follow-up Phone Call.** One week after the in-person safety planning, the mental health counselor will contact the teen's parent/caregiver to review elements of the safety plan and problem-solve barriers to using the safety plan and engaging in treatment. If the family has not made contact with a treatment provider, the mental health counselor will further assist the family in setting up an appointment. Co-I

Weinstock's research with recently incarcerated and suicidal individuals has shown that telephone follow-up intervention is feasible, acceptable, and powerful in building trust and reducing risk among these populations.



**Baseline and Follow-up Assessment.** In order to pilot test a procedure with the greatest potential to be implemented in a large effectiveness trial in the future, we collect all baseline data from information collected routinely and recorded in court records, with the exception of administering the SITBI. Therefore, potential participants will not be paid for the completion of the baseline measures. The consent form will specify that, as part of participating in the study, the MPIs will be allowed to use the baseline data from the RIFC chart.

The follow-up assessment battery was also designed to reduce participant burden and will be scheduled at 1 and 3 months post-intervention. The 3-month follow-up period will allow us to assess a high-risk period for self-injury as well as the typical period of time that adolescents remain in outpatient psychotherapy. Follow up interviews will be conducted in-person and last approximately 1 hour. Juveniles and a caregiver will each be compensated \$30 for the time to complete the 1 and 3-month assessment.

**Protection against Attrition.** We do not anticipate a great deal of attrition at the 1 and 3-month follow-up assessment, based on our prior success in following participants in our other treatment studies. Nonetheless, after the baseline assessment, participants will be educated on the importance of completing the follow-up assessments; provided the date and time of the follow-up appointments, and provided a study contact number to call if contact information changes. Detailed tracking information will be recorded. Our retention strategies will include phone, texting, email, and postal mail contact (e.g., personalized holiday, thank you, and birthday cards). In addition, names of two friends or family members will be requested in the event that research staff is

unable to reach the participant using the above information. Participants will be asked to sign a letter addressed to each of their locators that explains that they are participating in a research project. Locators will be contacted only if all efforts to reach the patient have failed. Weekly case review meetings will review no-shows, non-verified and non-confirmed cases and activities necessary to ensure successful completion of the follow-up assessments<sup>97</sup>. We have used these procedures with success in other projects. Participants will be contacted 1 week prior to each follow-up appointment. The phone-based follow-ups will assist with retention. In MPI Spirito's NIAAA-funded study with CINI youth, retention rates were 94% at 3 months and 84% at 6 months.

**Training in Assessment.** Training in the follow-up assessment protocol will occur during the first 3 months. Similar to the other JJS-involved protocols for MPI Spirito's other NIH-funded RCT projects, a primary bachelor's level research assistant (RA) will be trained to administer and score the assessment protocol for 1 and 3-month follow-ups. Under MPI Kemp's oversight, the RA will receive training on working in the JJS and on how to appropriately respond to logistical questions that participants' may have.

**Procedures for MH Deterioration/Safety Concerns.** It is possible that some participants will report symptoms that may warrant additional mental health care. POs routinely refer to community mental health clinics, as part of standard procedure, youth with any other emotional/behavioral problems in addition to self-injury. Our research team has conducted a number of studies involving assessment of self-injury (e.g. MH095786, MH090147, MH082211) and, as such, has developed procedures for managing self-injury when necessary at follow-up interviews (detailed in Human Subjects and **Appendix 2**).

**Phase I Measures (see Appendix 3).** The selection of measures was designed to be realistic for the JJS with an emphasis on eventual implementation in a larger effectiveness trial. The measures below will be collected electronically or by paper and pencil, if necessary, when there is limited internet access in Probation or on home visits.

#### **Background variables (obtained at baseline only).**

Standard demographic variables including age, sex, race, ethnicity, and education will be recorded from court records. (note: at the follow-up, youth will be asked questions about their gender identity because it is not currently asked in Probation). Legal history will also be obtained (available to study staff) as will item-level responses for the MAYSI-2 and NSSI screening data. The collection of data from legal records and existing JJS procedures is an additional strength of this service-based application as it improves feasibility and the potential for scalability.

#### **Youth level outcomes**

Feasibility of a future larger trial, will be defined as the percent of at-risk youth who enroll in the research project. Feasibility of conducting safety planning in Probation will be assessed by the percentage who receive the brief intervention, including linkage to treatment and the follow-up phone call, in total and in part.

Acceptability will be assessed by post-intervention ratings on the Client Satisfaction Questionnaire [CSQ-8;120], a well-established 8-item self-report instrument on a 4-point scale used to assess patients' satisfaction with psychiatric treatment. A score above 24 is the benchmark based on previous research. An "exit interview" will also be conducted at the one month follow-up about the intervention protocol that they received<sup>98-100</sup>.

The Self-Injurious Thoughts and Behaviors Interview 2.0 (SITBI 2.0) Short Form<sup>91</sup> is a structured interview designed to assess the presence, frequency, and characteristics of a broad array of self-injurious thoughts and behaviors. The SITBI has good reliability and validity. The SITBI will be completed at baseline and 1 and 3-month follow-up to assess suicidal ideation, attempts, and NSSI. Suicidal events will be operationalized as a composite score of suicide attempts and emergency interventions for acute suicidality assessed by the CASA (see below). Recidivism (collateral data from RIFC database) including new arrests, description of related charges (e.g., substance-related, property) and time detained/incarcerated (all tracked by the RIFC database) will be available.

#### **Youth level mechanisms**

Treatment Attendance (self-report, parent/caregiver report, and collateral information). The Child and Adolescent Services Assessment [CASA<sup>101</sup>] is a self-and parent-report instrument designed to assess at follow-up the use of mental health services for youth across 31 settings including inpatient, outpatient, and informal services. The measure has acceptable psychometric properties. Collateral<sup>102</sup> information on treatment attendance (attendance at first treatment appointment and total number of treatment sessions attended) will also be collected by contacting each juveniles' treatment provider at the 3-month follow-up. A release of information is requested at baseline, for both primary care physicians (PCP) and their MH provider/agency, as part of the court intake process when treatment referrals are made. The Motivation for Youth's Treatment Scale<sup>93</sup>, an 8-item measure, will be used to assess the youth's motivation to engage in treatment at baseline and at follow-up. The total scale and two subscales (Problem Recognition and the Treatment Readiness) produce alpha coefficients of above .80. The baseline MYTS will be completed at the end of the safety planning intervention to screen and address youth and caregiver motivation for treatment. The Barriers to

Treatment Participation Scale<sup>94</sup>, a 44-item measure, will be completed at baseline and 3-month follow-up by caregivers to assess barriers that parents/caregivers experienced since intervention and the role those barriers may play in treatment engagement. Alpha coefficients range from 0.61 to 0.80. Treatment Satisfaction information will be gathered as part of the follow-up qualitative interview. Youth and caregivers will be interviewed about their satisfaction with the suicide intervention as well as treatment referral in the community at the 3-month follow-up.

*Performance of CT Strategies (PCTS)<sup>103</sup> will be used to assess safety planning skills because it is more ecologically valid than a self-report measure. Raters will assess the extent to which participants demonstrated, through their performance of, their reports of the use of, and their stated intentions to continue the use of, safety planning skills based on a prompt to discuss what behaviors they did and continue to do to keep themselves safe. For example, "Did the youth understand and utilize restriction to means; individualized warning signs; specific coping skills; peer and family social supports to help distract from negative thoughts; adult contacts for help; and reasons for living". Each of the areas will be rated on a 0 to 6 Likert-type scale. Ratings of 4 or higher are considered indicative of independent use of the domain assessed by each item (i.e., clear report of the patient's making use of this domain). Three raters, blind to condition, will rate session tapes. Meetings of the entire rating group and pairs of raters will occur periodically to minimize rater drift.*

*We will also specifically ask teens and parents regarding the teen's access to potential means, including firearms, medications (over-the-counter and prescribed), and alcohol.*

### **Service-level measures**

Efficiency and quality of treatment linkage. Data regarding treatment coordination and referral for mental health services will be collected from the RIFC and Probation database regarding Probation staff coordination and collaboration with treatment providers in the community upon referral. **Equity** will be measured by examining differences by sex/ racial/ethnic subgroups in the numbers of at-risk youth who receive the intervention, treatment linkage, and fidelity/quality of the safety intervention.

### **Phase I: Data Analysis Plan**

Prior to conducting analyses for the project aims, a series of routine procedures will be conducted to ensure the data accuracy/adequacy. All forms will be checked for missing data and all data will be double entered and backed-up daily. Descriptive statistics will be examined for distributional properties of the variables (e.g., normality, internal consistency). The data will be transformed to achieve normality if needed.

We will conduct analyses in an intent-to-treat (as randomized) manner, and examine as primary analyses unadjusted and secondarily adjusted for selected covariates identified above. Masking integrity will be reviewed. ANCOVA (outcome regressed on baseline) methods will be used, and linear mixed effect models will be used to account for non-independence of repeatedly observed outcomes.

We will examine attrition by comparing follow-up assessment completers and non-completers on socio-demographic and baseline data to determine if they differ systematically. Consistent with an intent-to-treat model, we will include all randomized participants in the analyses. Attrition/Missing Data. It is anticipated that less than 20% of subjects will not have follow-up data. We will test for differential attrition across the experimental condition and the baseline comparison. The analyses described below can account for attrition at the follow-up points. We will employ multiple imputation as our primary approach to missing data [138] and will conduct a sensitivity analysis treating all participants lost to follow-up as treatment failures at the point of loss, i.e. assuming no change on their self-injury-related mechanisms or outcomes. If our primary conclusions are similar with and without extreme missing data assumptions, confidence in the findings will be higher.

**Primary Aim.** Our primary aim is to examine feasibility and acceptability of the safety planning intervention to inform next-step study design. **Feasibility** of a larger future trial will be evaluated based on: a) enrollment rates for the research project (target = 70%), and feasibility of the intervention, b) the percentage of participants who complete the entire intervention protocol (target = 70%). We will also determine the appropriateness of our assessment battery for a larger, future trial, by examining whether the range of responses to instruments indicate sufficient variability and change over time. **Acceptability** will be demonstrated by study withdrawal (< 20%) and > 80% of the responses on a consumer satisfaction scale rated as highly satisfactory. We will use logistic regression to model binary outcomes of enrollment, completion of the protocol, and withdrawal as a function of treatment assignment. We will use ordinal logistic regression for the satisfaction scale analysis.

With respect to youth level clinical outcomes, the goal is to obtain a reasonably precise estimate of the standard deviation for the outcome variables, and pre-post correlations of outcome variables, which are essential statistics for powering a definitive trial. Following Leon et al (2011)<sup>104</sup> and Kraemer et al (2006)<sup>105</sup>, our goal is not to obtain a preliminary estimate of the treatment effect size, but as per Teare and colleagues (2014)<sup>106</sup>, the size of the pilot we propose is sufficient to obtain sufficiently precise estimates of key variance and covariance parameters necessary to design a definitive trial. Our approach will be to conduct an analysis consistent with the testing of the hypothesis that JJS youth enrolled in the experimental condition have less self-injurious ideation and behavior at 1 and 3 month follow-up relative to youth enrolled in standard practice. We will also examine mechanisms including treatment attendance, safety skill acquisition, motivation for



treatment, and treatment barrier reduction. The main outcomes are suicidal ideation and suicide attempts/NSSI on the SITBI.

We will use generalized linear mixed models<sup>107,108</sup> to test hypotheses that participants randomized to the safety plan condition will have significantly improved outcomes compared with those who receive standard practice. This approach accommodates varying numbers of observations across individuals (allowing the inclusion of all randomized participants) while controlling for within-subject correlation. Scores from continuous measures are the dependent variables and treatment condition is the primary independent variable. Analyses will also be conducted co-varying baseline SITBI scores. These hypotheses will be evaluated by regressing the outcome variables as observed on the 1 and 3-month follow-ups on treatment condition, and a time by treatment condition interaction in a general linear mixed effect modeling framework. Main inferences will be based on post-hoc omnibus tests of treatment group effects pooled over time points, and secondary inferences will be drawn from the time-specific outcomes.

The current study also seeks to illuminate factors that may better guide treatment decision making by identifying those who are most likely to benefit from the proposed interventions. Specifically, in exploratory analyses, we will examine sex, race, and ethnicity to address the barrier of racial disparities.

**Power:** We will recruit 70 participants in the RCT which should be sufficient to make judgments regarding feasibility and acceptability. We do not have pilot data available for calculating effect sizes to present here because R34 applications do not require pilot data but are used to collect pilot data regarding feasibility and acceptability. Two-way comparisons across treatment groups result in 80% power to detect effect sizes amounting to standardized mean differences (Cohen's d) of 1.0 or higher as statistically significant under a two-sample t-test analytic framework. With repeated measures for outcomes, under assumptions of reasonable reliability for the outcomes ( $r = .8$ ) and high autocorrelation for repeated measures ( $r = .64$ ), we will be able to detect smaller differences ( $d = .62$ ) in pairwise comparisons (where  $.62 = (16*(1-.8^2)/15)^{0.5}$ , following Lehr [137]). A medium ES when power is set at .8, is typically considered a clinically relevant finding. Thus, if high levels of feasibility and acceptability are found, this would suggest that the protocol should be tested in a larger trial. For power of .8 and a clinically relevant ES, i.e., a medium ES ( $d = .5$ ), a sample of 64 per group would be required in a future R01.

**Aim 2: Service level mechanisms** will be examined as potential mediators of intervention effects. Success of treatment linkage, including barriers to outpatient treatment, and the equity of intervention fidelity and treatment linkage across sex, race, and ethnicity will be compared following the analytic approach summarized in Aim 1.

### **PHASE II: SIM and stakeholder interviews**

In Phase II, in months 24-34, we will contract with National Center for Mental Health and Juvenile Justice (NCMHJJ) to conduct the SIM Mapping, which will identify key administrator and front line stakeholders (including families of JJ involved youth) at each of the intercepts. We will then conduct qualitative interviews with these stakeholders and administer a measure on attitudes towards suicide screening and intervention at each point of intercept. The goal of this aim is to better understand the behavioral and attitudinal factors of JJS staff and administrators as well as the needs of youth that would influence implementation of a suicide screening and brief intervention protocol across the entire JJS, not just Probation where the RCT takes place.

The goals of this phase are to conduct a SIM to provide a conceptual framework to outline a series of "points of interception" along the JJS continuum in the state where screening and brief intervention may be implemented. We will apply this model to identify the strengths and gaps of the current JJS in possible screening and intervention for SI and NSSI among JJ youth. *The SIM is a facilitated, interactive process to determine the flow of youth from the community through each intercept of the JJS and back to the community. During the process, the participants are introduced to evidence-based practices and emerging best practices from around the country. As the local systems are mapped, the group also identifies what practices they believe can be implemented, gaps in services, and potential local resources.*

A core element of our SIM will be to conduct qualitative interviews with important stakeholders including JJS staff ( $n = 5$  at each JJS intercept;  $N=25$ ); treatment providers in the RIFC Mental Health Clinic ( $n = 5$ ) and the local community mental health clinic ( $n = 5$ ) to assess ways to enhance the hand off to mental health care; JJ involved youth ( $n=10$ ); and parents/guardians of JJ youth ( $n=10$ ). Key stakeholder interviews will be conducted to capture a narrative history focused on CMIR implementation-level goals: 1) acceptability of screening and intervention in the JJS stakeholder's respective setting by staff, youth, and caregivers, and 2) barriers and facilitators of timely and efficient suicide screening and intervention.

Stakeholders (i.e., JJS staff, behavioral health providers, youth, and caregivers) will be interviewed individually in by the research team and supervised by MPI Kemp. For JJS staff, interview questions will include system readiness and acceptability (e.g., What factors impact staff and administration investment? What are the most desirable ways to incorporate screening and brief intervention into the court system?) Answers to these questions will directly inform future D&I efforts across the JJS. Youth and caregivers will be interviewed about the acceptability of a brief intervention in the JJS, provide feedback about the perceived helpfulness of such an intervention, the timeliness and efficiency of the intervention, and discuss concerns of



the court's role in facilitating and monitoring treatment. Once each pool of stakeholders is identified, specific individuals to interview will be chosen at random. Interviews will be audio recorded, coded, and themes will be extracted and summarized using standard content analysis procedures.

**Stakeholder compensation.** JJS staff and administrators are unable to receive compensation for participation in a research study. Therefore, a one-time donation of \$300 will be made to the different points of interception to help support their MH and substance use screening efforts. The qualitative interview will take the treatment providers, adolescents, and the parent/caregiver 30-minutes each to complete. Treatment providers, juveniles, and a caregiver will each be paid \$30 for completing the qualitative interview.

Acceptability will be assessed using qualitative interviews with JJ staff related to their perceived roles in screening and using the brief suicide/NSSI intervention. In addition, the Attitudes toward Suicide Interventions (ATSI) assesses attitudes towards and level and self-efficacy in relation to suicide screening and intervention. The ATSI is a 39-item measure modified from the Attitudes toward Mental Health Screening scale<sup>109</sup>. The ATSI will measure knowledge about suicide and self-injury, attitudes, skills and confidence in suicide screening at each stakeholder interview.

### **Phase II: Data Analysis**

**Aim 3: Identify organizational/ system-level factors, provider-level factors, and youth/family factors that promote or hinder uptake of a screening/brief intervention within the JJS.** Stakeholder interviews will be audiotaped, transcribed, and entered into NVivo, a qualitative data management program. MPI Kemp, who has received extensive training in qualitative methods, will develop the coding process, in collaboration with MPI Spirito and Co-I Wolff, for qualitative information related to the systems-building and implementation process as well as emergent content that arises as part of the coding process (e.g., via verifying the coding scheme, training coders, coding data). The coherence between qualitative coding schemes and established quantitative measure subscales will allow for triangulation of the rich data captured by this process. We will examine: 1a) interest in and acceptability of screening and intervention in the JJS stakeholder's respective, and 1b) barriers and facilitators of timely/efficient screening and brief intervention.