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## **Addressing Adolescent Depression in Schools: Evaluation of an In-service Training for School Staff in the United States**

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# Addressing Adolescent Depression in Schools: Evaluation of an In-service Training for School Staff in the United States

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## Abstract

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This study evaluated an adolescent depression in-service training for school staff in the United States. A total of 252 school staff (e.g., teachers, principals, counselors) completed assessments prior to and following the in-service and a subsample of these staff participated in focus groups following the in-service and three months later. Questionnaire and focus group data suggested that the in-service increased school staff's perceived awareness and knowledge of adolescent depression and knowledge of how to connect with depressed students, guide their learning process, and connect with students' parents. School staff viewed the in-service as a valuable tool for their school and provided suggestions for the refinement of the in-service. Finally, perceived changes in teacher behavior were reported three months later. Implications and future directions were presented.

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**Keywords:** adolescent depression, teachers, school-based program, depression awareness, training.

# Tratando la Depresión de Adolescentes en las Escuelas: Evaluación de un Programa de Formación Continuada de Personal Escolar en Estados Unidos

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## Resumen

Este estudio evaluó un programa de formación continuada del personal escolar en Estados Unidos sobre la depresión de adolescentes. Un total de 252 representantes del personal escolar (profesorado, directivos, asesores) completó las evaluaciones antes y después de la formación y una submuestra de este personal participó en grupos de discusión después de la formación y al cabo de tres meses. Los datos de los cuestionarios y los grupos de discusión sugirieron que la formación continuada incrementó la conciencia y el conocimiento de la depresión adolescente y el conocimiento sobre como conectar con estudiantes deprimidos, guiarles en su proceso de aprendizaje y conectar con sus padres. El personal escolar vio la formación como una válida herramienta para su escuela y presentaron sugerencias para su mejora. Finalmente, tres meses más tarde se percibieron cambios en el comportamiento del profesorado. Se presentan las implicaciones y las futuras líneas de trabajo.

**Palabras clave:** depresión en adolescentes, profesorado, programa basado en la escuela, concienciación sobre la depresión, formación.

Depression is common in adolescence and is linked to future depressive episodes, anxiety, early alcohol and substance initiation, and suicide attempts and completion (Fergusson & Woodward, 2002). Adolescent depression is frequently accompanied by decreased academic achievement, self-esteem, and competence, and increased interpersonal difficulties (Calear & Christensen, 2010; Fergusson & Woodward, 2002). Early detection and intervention are critical to abate adolescent depression and associated risks (Moor et al., 2007).

Schools are an ideal setting for preventing depression because they can reach a large proportion of adolescents whose depression might not be identified (Chamberlin, 2009). In addition, school-based services for depression may be more acceptable to adolescents than traditional mental health services, given the convenience of these services and the reduced stigma and cost of services in school settings (Calear & Christensen, 2010; Chamberlin, 2009). Despite the promising role of schools in addressing adolescent depression, rates of adolescent depression continue to be unabated (Herman, et al, 2004).

Schools in the United States are increasingly looking toward evidence-based interventions to address adolescent depression. While interventions have been developed for adolescents and evaluated in randomized trials (see Calear & Christensen, 2010), adopting these interventions in schools outside of the research context has proven challenging (Olin, Saka, Crowe, & Hoagwood, 2009). Evidence-based interventions may require significant operational funds and training, and availability of space and staff time, all of which may not be available in schools (Olin et al., 2009). To overcome these obstacles, recent studies have increasingly incorporated school staff as program leaders in school-based interventions. However, an Schools in the United States are increasingly looking toward evidence-based interventions to address adolescent depression. While interventions have been developed for adolescents and evaluated in randomized trials (see Calear & Christensen, 2010), adopting these interventions in schools outside of the research context has proven challenging (Olin, Saka, Crowe, & Hoagwood, 2009). Evidence-based interventions may require significant operational funds and training, and availability of space and staff time,

all of which may not be available in schools (Olin et al., 2009). To overcome these obstacles, recent studies have increasingly incorporated school staff as program leaders in school-based interventions. However, an examination of these interventions reveals that teachers are less effective at implementing them than specialized school mental health professionals or researchers (Calear & Christensen, 2010).

Less favorable outcomes of teacher-led depression interventions may be a function of limited training in depression intervention (Maag & Swearer, 2005) and limited time available for implementation of intensive interventions (Evers, Prochaska, Van Marter, Johnson, & Prochaska, 2007). Thus, efforts should focus less on training teachers to intervene clinically with their depressed students, and more on training teachers to detect adolescent depression and offer supportive strategies to students within the classroom setting (Maag & Swearer, 2005). Teachers are well-positioned to detect depression because of their regular student interactions (Puura et al., 1998), affording them the opportunity to notice student changes in mood and behavior, peer relationships, classroom participation, and school performance and attendance (Auger, 2004; Maag & Swearer, 2005).

Teachers often struggle to identify depression in students (Auger, 2004; Burns et al., 1995). In a study by Auger, there was only a .22 correlation between teacher-identified depressed adolescents and self-identified depressed adolescents. Burns and colleagues found teachers recognized signs of depression in only 0.6%-16% of depressed adolescents. In a more recent study by Moor and colleagues (2007), teachers were only able to identify as depressed half of their students who had been clinically diagnosed with depression by a mental health professional. For school counselors to receive timely referrals of depressed adolescents, improving teachers' recognition of adolescent depression is paramount (Maag & Swearer, 2005).

In addition to increased detection, teachers could learn classroom strategies that are consistent with their teaching practices and that aim to enhance their interactions with depressed students (Maag & Swearer, 2005). For example, teachers could be taught about the value of establishing a personal connection with depressed adolescents (e.g., showing warmth, providing individualized attention), of enhancing

adolescents' learning of classroom curriculum (e.g., pacing assignments, using motivational techniques, praising for effort, making instructional modifications), and of connecting these students to supportive peers and other school professionals (Herman et al., 2004). Teachers would also be well-positioned to initiate parent involvement for students for whom they have concerns about depression (Auger, 2004). Training teachers to detect signs of adolescent depression and to incorporate classroom-based support strategies is more likely to sustain in schools than using specialized interventions.

Low-cost, less intense depression awareness programs for teachers need to be evaluated. School-based depression awareness programs have been widely used in the United States, but many have limited effectiveness data. Other programs, such as "Red Flags" in Ohio (Newman, Smith, Newman, & Brown, 2007), are difficult to replicate because they lack uniformity in implementation. Without uniformity, schools may adopt partial elements of programs to save costs. However, sub-optimal program levels may not address the needs of at-risk adolescents.

One promising program, "It's Time! Adults Addressing Youth and Teen Depression" (hereafter called "It's Time!"), is a school-based in-service for school staff. "It's Time!" was developed at InHealth Wisconsin, a non-profit outreach organization. Program developers facilitate the program and train other facilitators via modeling and observation, review of program content and manuals, discussion of strategies, and ongoing face-to-face, phone, and email coaching and support. "It's Time!" is implemented uniformly across schools.

Theoretically, "It's Time!" is based on the Transtheoretical Model (Prochaska, Johnson, & Lee, 2009) and Theory of Social Support (House, 1981) to create change. The Transtheoretical Model posits that change occurs when one recognizes a need for change, believes there is realistic hope that one can make the change, and has a plausible plan for change and the maintenance of it (Prochaska et al., 2009). "It's Time!" trains school staff to recognize that adolescent depression is an important issue and that prevention is possible and can be accomplished with the right tools and supports in place. In addition, "It's Time!" is based on Social Support Theory which contends that identification of

depression is more likely to occur within a supportive environment (i.e., schools) in which emotional, instrumental, and informational resources for change can be provided (House, 1981). These resources include establishing a personal connection with depressed adolescents, supporting depressed adolescents academically, and collaborating with parents and school professionals to coordinate care.

“It’s Time!” aims to increase awareness, improve intervention and support skills, and promote connections to resources in school settings (see Table 1).

Table 1  
*Description of “It’s Time!” in-service*

Topics/Activities	Format		Time (minutes)
	Video/Slides	Experiential	
		X	10
Educational Topics	X		75
Depression causes and signs			
Brain chemistry of depression			
Depression in the school setting			
What helps teens who are depressed			
Importance of awareness and treatment			
Importance of personal connections			
Things school staff can do to help			
Behavioral responses and crisis management			

Table 1 (continued)  
 Description of "It's Time!" in-service

Topics/Activities	Format		Time (minutes)
	Video/Slides	Experiential	
Hope and lessons learned			
Completion of "What do you believe" exercise		X	10
Snowball activity		X	15
Reframing activity		X	20

The in-service is a low-intensity (2-hour) and low-cost program (\$1000) that has been conducted in over 75 public and private schools in Wisconsin, as well as Oregon, Vermont, North Carolina, Illinois, Indiana, Minnesota, and Maine. An unpublished evaluation of the program conducted in five schools shows that a percentage of in-service school staff increased their (a) curiosity about students' attitudes, behaviors, and academic problems (82%), (b) strategies to create positive connections with depressed students (82%), (c) conversations with other school staff about how to better understand and connect with these students (66%), and (d) contacts with parents about how to best understand and connect with their child (44%) (InHealth Wisconsin, 2006).

This study is the first external evaluation conducted of the "It's Time!" program. The evaluation was exploratory because program developers were interested in expanding the scope of the intervention based on consumer feedback. Thus, this study examined whether staff participating in the "It's Time!" in-service would (a) perceive increased knowledge of depression from pre to post-test, (b) perceive increased knowledge of strategies to use with their students, and (c) value the use of the program in schools. Finally, staff perceptions of increased use of supportive strategies with students with depression over a three-month time period were explored. Possibilities for program expansion were also explored during focus groups.



## **Method**

### **Participants**

Five high schools and one middle school in southeastern and south central Wisconsin were recruited by the program developers to participate in “It’s Time!”. Schools received the in-service free of cost for agreeing to participate in the evaluation. The in-service was offered at the beginning of the academic year as part of mandated professional development training for school staff. Participation in the study was voluntary and all procedures were conducted in accordance with the institutional review board of the evaluators’ university. The in-service and evaluation were conducted at each participating school.

Four of the schools were located in the suburbs of two adjoining cities and the remaining two were urban within one of the cities. Based on school records, more than half of students in the urban schools in this study were African American and more than half of students were eligible for free or reduced lunch. Over three quarters of suburban students were non-Hispanic White and no more than one-fifth of students was eligible for free or reduced lunch. The suburban schools were significantly larger and accounted for 94% of school staff. One of the urban schools was a charter school for children who had a history of being bullied.

Of 252 school staff participating in this study, 85% were teachers, 5% were school counselors, 3% were special education teachers, and the remaining 6% were other personnel and administrators. More than half (62%) of the school staff were female and 95% were non-Hispanic White. All invited school staff participated in the in-service and evaluation.

### **Design and Procedure**

A multi-time point design was utilized to evaluate school staff’s perceived knowledge of depression and use of supportive strategies with their depressed students. Pre- and post-questionnaires were administered and a first round of focus groups took place on the same

day of the in-service (post) and again three months later (follow-up).

The evaluation team consisted of a faculty member and five graduate students from a local university. Before the in-service began, the evaluation team handed out packets with the instruments to the entire school staff at the end of their mandated school orientation. After reading a consent form and agreeing to participate in the evaluation, further instructions for participation in the study were given. Individuals who participated in the focus groups were nominated by the principal at each participating school and had different levels of experience with a student with depression.

### **In-service Description**

The in-service was conducted by InHealth staff and consisted of a 75-minute video presentation, supplemental materials, and two interactive activities. These components were scripted in a manual and presented sequentially over two hours.

**Video presentation.** The video presentation consisted of 15 real stories of local students, parents, and teachers/other adults and informational slides. Student stories told of their experiences with depression, typical and atypical symptoms, and ways that teachers offered effective support. Parents discussed their experience of dealing with their children's depression and teachers provided examples of ways in which they identified and supported their students with depression. The informational slides were alternated with the video stories to maintain participants' interest and to reinforce the content of the stories.

**Supplemental materials.** Immediately following the video presentation, school staff were provided two handouts intended to reinforce knowledge of depression and to increase staff's sense of competence in addressing adolescent depression. The "Reframing" handout included examples of situations in which adults can effectively interact with students by altering their perspectives and behaviors. The "Talking with Parents" handout provided strategies to reach out to parents of students experiencing depression.

**Interactive activities.** Next, groups of 10-20 persons each were formed for two interactive activities which were designed to engage

actively school staff through experiential learning (Bonwell & Eison, 1991). At the beginning of the in-service, school staff engaged in the Snowball activity by discussing myths, facts, and how their personal beliefs about adolescent depression were formed from prior life experiences. Staff wrote these beliefs anonymously on a piece of paper, crumpled the paper into a ball, and tossed it into a box. At the end of the in-service, facilitators created an imaginary physical space in the room designated to represent different beliefs of adolescent depression. School staff retrieved one of the ‘snowballs’ from the box and physically moved to the sign (“strongly agree,” “agree,” “disagree,” and “strongly disagree”) that was consistent with the beliefs on their snowball. They then discussed why the person who completed that snowball might have held that belief and how that person’s beliefs might have changed after the in-service.

In the Script Rewrite activity, a handout with five scripted scenarios involving interactions with depressed adolescents was distributed to school staff to help them develop a plausible plan for supporting students. School staff role-played the scenarios for 30 minutes. Next, they were asked to read the “Reframing” handout described above and revise and role-play the new interactions.

## **Measures**

All measures were developed by the authors with expert input and pilot tested at a school similar to those in the study receiving the in-service but not participating in this study.

**Effectiveness pre- and post-in-service questionnaires.** School staff completed a 10-minute questionnaire prior to the video presentation, which consisted of six open-ended items that assessed need for the in-service and baseline knowledge of depression and strategies with depressed adolescents. An open-ended questionnaire was developed to assess participants’ own pre-existing (pre) and acquired (post) knowledge of depression and strategies. This format contrasts with a forced-choice or Likert questionnaire that might alert participants to desired responses (Maag et al., 1988). The questionnaire was rooted in DSM-IV-TR depression symptomology (American Psychiatric Association, 2000) and in program evaluation literature (Owen &

Rogers, 1999). The questionnaire included an open-ended item measuring staff's baseline awareness and knowledge of adolescent depression (i.e., "What indicators get you to suspect that a student might be depressed?"). Three additional items evaluated existing use of strategies with depressed students: "What specific strategies have worked for you to (a) connect with adolescents who might be depressed, (b) guide the learning process of adolescents who might be depressed?, and (c) talk to parents of adolescents who might be depressed?"

Assessing perceived changes in knowledge about depression at the end of the in-service, four items paralleling the baseline knowledge and the existing use of strategies from the pre-in-service questionnaire items were administered: "Now that you have seen the program, what indicators of depression were new or clarified for you that you will look for in adolescents who might be depressed?," "What new strategies will you plan to use to (a) connect with adolescents who might be depressed?, (b) guide learning in the classroom for adolescents who might be depressed?, and (c) talk to parents of adolescents who might be depressed?"

**Focus groups.** Each of the six schools agreed to participate in focus groups following the completion of the in-service and post-questionnaires. Facilitated by members of the evaluation team, the focus groups were semi-structured (see Table 2) and consisted of 4 to 7 individuals each (41 total), with a range of sex, age, and teaching/work experience.

Focus group questions were designed to evaluate school staff's acceptability of the in-service, particularly the in-service's strengths and limitations, and recommendations for improvement and further development. The focus groups were audio-recorded and lasted 60 to 90 minutes. Three months after the initial focus groups, two schools participated in follow-up focus groups. These focus groups consisted of both school staff who had and had not participated in the initial focus groups to obtain a range of responses. The follow-up focus groups consisted of six questions designed to assess staff-reported perceived changes over time in their recognition of depression and strategies with depressed adolescents.

Table 2

*Focus Group Questions at Post- In-service and Three-Month Follow-Up*

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POST-IN-SERVICE QUESTIONS

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1. What did you think about the in-service overall?
2. What did you think about the content of the video?
3. What did you think about the interactive activities?
4. What, if anything, did you learn from the in-service?
5. How do you think this invoice could be used in your school?
6. Were there any specific experiences that you would have liked to see discussed in the in-service?

THREE-MONTH FOLLOW-UP QUESTIONS

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1. Since the last focus group, what are you doing differently with students who might be depressed?
  2. What kind of strategies would you like to learn about regarding your students with depression?
  3. What cultural aspects, if any, would you like to see added to the in-service?
  4. What kinds of follow-up in-service programs do you need?
  5. What would you think of a web-based training program for teachers and other school staff about youth depression?
-

## **Integrity of Methods**

**Pre-in-service and post-in-service questionnaires.** Open-ended responses from the questionnaires were entered into tables and coded in teams of 2-3 trained members from the evaluation team. To establish reliability, data were also coded individually by the two authors of this study. Based on content analysis methodology outlined by [Krippendorff \(2004\)](#), the open-ended responses were broken down into recording/coding units by making categorical distinctions, which are codes that are distinguished to be separate based on specific description. Thus, the coders analyzed the content specifically for each question, identifying when a new coding unit arose and tallying the number of participants who mentioned the same coding units. The two coders reached consensus if the coding units were coded in separate ways.

**Focus groups.** After the data had been transcribed, the focus groups were coded in three separate phases based on focus group methodology outlined by [Krueger and Casey \(2000\)](#) and [Morgan \(1997\)](#). In the first phase, data were coded in order to reflect the main ideas of each paragraph. After the main ideas had been coded, these were placed into larger categories that captured emerging themes. Lastly, these categories were placed into three larger categories: Strengths of the In-service, Areas for Improvement and Suggestions for the In-service.

To ensure rigor, credibility checks were utilized. First, triangulation consisted of comparing the focus group data with the other measures from this study, as well as other outside reports of school staff's experiences with depression. This was achieved by extracting the main themes from the content codes and the focus groups to determine if there were aspects that were convergent or divergent. Second, coded information was reviewed by an auditor who was not involved in the data collection or analysis to determine applicability of codes.

## **Results**

### **Questionnaires**

**Awareness and perceived knowledge of adolescent depression.** Prior to the in-service, school staff identified common indicators of

depression among adolescents. These indicators and the percentages of staff endorsing these indicators include: withdrawal from others and activities (22%), change in behavior (17%), drop in grades (16%), change in mood and affect (13%), and change in eating and sleeping habits (9%), among others. A few of these indicators were new for a number of school staff after the in-service, particularly withdrawal (17%), behavior changes (14%), and changes in eating and sleeping habits (6%). Atypical signs of depression emerged for a percentage of school staff (25%) that were not reported prior to the in-service. These signs include sensitivity to noise, physical pain, masking (expressions of happiness), and anxiety.

**Strategies to connect with depressed adolescents.** Over half of school staff (51%) reported that establishing a positive teacher-student relationship was an important tool to connect with adolescents on the pre-in-service questionnaire. The relationship would be formed by spending more individualized time with students, regularly monitoring students' feelings and school activities, and offering encouragement, trust, consistency, respect, and active listening. School staff also reported connecting with adolescents by seeking involvement from others, with 18% of school staff involving other school staff and other students, and 8% contacting parents. On the post- in-service questionnaire, 55% of school staff endorsed the importance of the teacher-student relationship. As part of this relationship, school staff indicated that genuine interest and the use of soft questions (e.g., "How are you doing today?") were important strategies. Soft questions were contrasted with questions that convey critical comments (e.g., "Why are you always late to class?"). Twenty-four percent of school staff also endorsed educating students about depression via self-disclosure and examples. For some, writing a note to a student as an invitation to talk would prove helpful; for others, it would be handing out an index card for students to write the name of a school staff member in whom they can confide. In addition, a few school staff (11%) indicated that they would allow accommodations for students.

**Strategies to guide the learning process of depressed students.** Prior to and following the in-service, 26% of school staff and 40% of school staff, respectively, reported that curriculum accommodations

were important in guiding the learning process of students experiencing depression. The primary accommodations reported were providing additional assistance on assignments, breaking down assignments into smaller steps, offering alternate assignments, and extending deadlines. Other accommodations included forming small groups, allowing short breaks, and creating structured activities. Prior to the in-service, 36% of school staff endorsed forming a one-to-one relationship with the student to guide their learning process. This relationship was characterized by using self-disclosure, dedicating individual time to student, and motivating students through their interactions. After the in-service, 14% of school staff endorsed the use of this strategy. A number of school staff reported strategies not mentioned prior to the in-service. Promoting a quieter environment in the classroom (12%), using supportive and soft questions (17%) and using an index card to connect adolescents to supportive adults (8%), as described above were also important.

**Strategies to talk to parents of depressed students.** On the pre- in-service questionnaire, 58% of school staff reported that they communicate with parents about their concerns when they suspect a student is depressed. At the end of the in-service, 67% of school staff reported that they would talk with the parents of depressed students' about their concerns. At both time points, school staff reported that contact with parents needs to focus on asking about and describing specific behaviors and signs of depression, discussing emotional and academic changes in the student, and creating an open dialogue in which parents feel comfortable asking questions. Teachers would approach parents about these topics with calm, honesty, active listening, and empathy. After the in-service, school staff who endorsed talking to parents added that they would ask parents more questions about their children's functioning and avoid placing blame on the family. Existing strategies were also reinforced by the in-service. These include holding parent-teacher conferences (18% pre-, 6% post-), providing parents with resources to help adolescents (7% pre-, 8% post-), maintain regular contact (6% pre-, 4% post-), and involve other school professionals (2% pre-, 4% post-).



## **Focus Group Themes**

**Areas of strength of in-service.** A first area of strength identified by school staff was the *format of the in-service*. School staff indicated that the student stories were real, genuine, and heartfelt, instilled hope, and the most helpful aspect of the presentation. One focus group participant indicated, “I thought it was really good, coming from their hearts. I was really impressed, it was better than the [other programs] we have.” Staff reported that it was also helpful that the stories were local. Staff noted that the parent stories provided powerful and refreshing perspectives about students’ depression. Staff stated that the video was applicable to a wide audience of parents, students, and teachers. The video was described as “up-to-date,” “well-edited,” and appropriate in length.

A second area of strength identified by school staff was the *presentation of the in-service*. Many school staff reported that the presentation was “informative,” and “effective at raising awareness about depression and increasing compassion towards students.” School staff expressed that the in-service facilitators were excellent, dynamic, and interesting. Importantly, school staff commented on the importance of the training at the beginning of the school year “because it raised awareness into the upcoming year.”

The *content of the in-service* was a third strength identified by school staff. Many of the school staff mentioned that the statistics about depression and recovery were powerful:

When [the facilitator] presented the statistics that, yes, people can get help and you can make a difference, it’s like, okay, maybe I can do something in my little way in the classroom just to help that person and to have them connect with me. So I felt it empowered me that, yes I can make a difference.

Similarly, school staff indicated that the video challenged their stereotypes of depressed students and emphasized that depression can affect any individual. A number of school staff also mentioned that the physiological aspects of the presentation were informative and that the diagrams were helpful in explaining how depression manifests in the brain. One focus group member commented that the presentation about

the brain helped her to understand how powerful these physiological influences are and how early they can predispose adolescents for depression.

The final strength identified by school staff was the in-service's *applicability to teachers*. Participants expressed learning (a) the value of establishing a personal connection with students, (b) the importance of supporting the student rather than understanding the causes of depression, and (c) the use of simple communication strategies. School staff commented on the utility of using a 3X5 index card for students to identify an adult in school with whom they would feel comfortable talking about their depression. One member described what was helpful for her:

It made me think about the times when I've tried to be firm and what a tremendous impact of what we say has on these kids for a long time and so it made me think really carefully about using gentle words.

Areas for improvement of the in-service. A first area of improvement identified by school staff participating in the focus group referred to *tools for addressing students' depression*. Although an overwhelming majority of staff reported increased awareness of depression among their students, many indicated not having enough knowledge of how to proceed in supporting their students. Some participants stated that they would have liked more practical information about how to (a) carry out curriculum modifications, (b) engage in communication with students and parents about depression, and (c) provide resources and improve access to community services for their students.

A second area for improvement identified by school staff pertained to *issues of diversity*. Some focus group participants reported that the video was not sufficiently representative of racial minority students or students of different sexual orientations, academic abilities, and lifestyles (e.g. gothic). A teacher from an urban school noted:

...I liked that [the video] was local. I noticed however, that for some people it may seem really racially or ethnically diverse; for us it was not diverse at all. And that's Wisconsin and that's [our

town] in particular, so segregated here. You might want to have different videos for different audiences that have more people who look like them. And as was discussed there are a lot of cultural issues that come up [with] depression, and we need to make sure that those cultural issues are addressed differently for different audiences.

A third area for improvement was the *role of the teacher in addressing students' depression*. Several teachers struggled with integrating their role as a teacher with that of counseling. One member mentioned that teachers should work within a larger team of professionals, and not be expected to provide counseling. Teachers at one school expressed concern about mandatory reporting if they asked students too many questions about their lives. The *length of the in-service* was identified by school staff as a fourth area for improvement. In particular, some staff indicated that the informational slides of the video portion were too long and wished more time had been allocated to the interactive activities.

Finally, school staff indicated that the *interactive activities* could be improved. School staff indicated that the skit rewrite activity was more helpful than the snowball activity because it provided a positive and alternative way of thinking and interacting with adolescents. They wished there was more time for this activity and that the groups were broken down even further to allow for more discussion. Many liked the snowball activity because they liked learning about other people's perspectives; however, some found the activity difficult to understand.

**Recommendations for the in-service.** A first recommendation made by school staff was that the *in-service be adapted to students*. Focus group participants stated that the video-stories could effectively be shown to students with some modifications. Suggested modifications included (a) simplified and shorter presentation of statistics; (b) reduced information about biology; (c) decreased focus on parents; (d) increased focus on peer support; (e) increased explanation of treatment; (f) decreased number of interactive activities; and (g) addition of a facilitator training program for teachers, peers, and counselors. They also stated that the in-service presentation be conducted in smaller groups to allow for more

meaningful discussion. The following comment was indicative of adaptations for adolescents suggested by participants:

I think I would have [peers], maybe not a parent because they really can't empathize with a parent... They could talk about how it impacted their family but they'd have to hear it from a person of their age group.

A second recommendation for improving the in-service is that it be *adapted for parents*. Participants indicated that parents with children of all ages might benefit from watching the video if it was shown during PTA meetings or made available to parents online. Staff thought that the video for parents could be accompanied by a list of resources to get their children in services. Finally, it was suggested that a separate video be made for teachers on how to approach and collaborate with parents about their children. A focus group member discussed showing the video to parents:

Our video policy is that when we have certain things that are questionable, that we offer a previewing. I wonder whether you said this is something we'd like to show students and those parents who are most concerned might [come].

*Incorporating diversity* into the in-service was a third recommendation made by school staff. A common suggestion from school staff participating in the focus group was to increase representation of different minorities in the in-service. A few from the urban schools mentioned that an in-service specific to urban African American adolescents could include the following: (a) how to talk to young African American males about depression, (b) using a community effort to address this population, and (c) workshops led by an African American speaker from the community to talk about his or her own depression. They suggested that this approach could be adapted to other groups of adolescents, such as sexual minorities.

Fourth, school staff recommended *additional training opportunities*. School staff overwhelmingly requested a follow-up in-service consisting of practical and experiential activities. This training could be achieved

by including (a) role-plays of teachers responding to students, (b) reenactments of effective classroom strategies, (c) teacher-created vignettes about students with depression for group discussion, and (d) legal guidelines for student disclosure and mandatory reporting.

A fifth recommendation made by school staff pertained to *suggested content areas*. One participant suggested that it would be helpful to talk about the different types of therapy that are available for depression. School staff from one particular school mentioned that it would be helpful to have a segment on post-partum depression, since they had many pregnant students. They also shared that it would be important to include more information about physical pain and somatic symptoms that often accompany depression and how those may affect students. The last suggestion made was to provide more information about how students feel about taking medications in school. The following is a specific suggestion made by a focus group member:

We now have a sense of diagnosing the problem; now [we're] searching for the "What next? How do you seek this help?" Especially with people with limited income and limited education, how do you seek help, what is a reasonable thing.

A sixth recommendation pertained to the *timing of the in-service*. In order to enhance learning, many school staff suggested dividing the in-service into sections over a few days or follow-up sessions, rather than one day. Many also thought it would be helpful to conduct the program shortly after school has started so they can use the information with specific students in mind. Additionally, they stated that it would be helpful to show the video to teachers and students but within a close timeframe so the teachers could provide a context and support to students. The timing of the in-service is crucial as noted by a focus group member:

I would want to [get a follow-up training], not right away, like maybe a month, six weeks, give you time to observe the kids out there and get frustrated enough that you want to know where to go and then answer questions for you.

A final recommendation referred to *supporting materials*. School staff indicated that it would be helpful to have a handout of the presentation at the beginning of the in-service so they could follow the presentation and keep for future reference. They also shared that it would be helpful to have a handout of mental health resources, particularly for uninsured students.

### **Follow-up Focus Groups**

Addressing what has changed for the schools and for them personally since the initial focus groups three months prior, school staff from two of the high schools (one urban, one suburban) reported changes in their interactions with students. One teacher mentioned that she is “not more lenient, but gives depressed students different assignments.” Another teacher mentioned that she shares her own experience of depression when she is talking with her students. As one teacher reported:

One of the things the video did was... made me rethink my way, because I tend to be really strict about accepting late work and so really recognizing what the students are going through and thinking about depression and the impact on grades and how to handle that in the classroom, it kind of turned me around a little bit and I was thinking okay this is something that I need to be a little bit more conscious of, and not just being hard line about it.

One school has since implemented check-ins about their students with depression with the other teachers at staff meetings allowing for better coordination of student services. Another school has since invited speakers to talk about depression to school staff. School staff from both schools said that these conversations were rare prior to the in-service and that the in-service brought it to the forefront for all school staff. School staff reported additional areas in which they desired increased knowledge and skills. Regarding resources and strategies, staff from one school indicated that they wanted to learn more about empathy to help them interact with students. They also expressed a desire to learn more about substance abuse and self-injurious behaviors in their students since these are increasingly common among their students.

Finally, staff wanted to learn more about outside resources. Others expressed interest in learning about student pressures and stress-reduction techniques school staff can use with their students who are beginning to show signs of depression. Other staff stated interest in strategies to engage parents in regular conversations about the emotional health of their children. A focus group member mentioned:

One of the things that I thought was still lacking was a very direct process of what to do with a student who is making comments about being suicidal. There is somebody who's coming to train us on that because it was something that I still felt like I didn't absolutely know what to do.

### **Discussion**

The current study was an exploratory evaluation of the “It’s Time! Adults Addressing Youth and Teen Depression” in-service for school staff in a middle school and high schools in two Midwestern U.S. cities. Benefits of the in-service is that (a) it targets school staff as natural change agents in the students’ natural environment, (b) the information is disseminated to staff via varied instructional methods to enhance learning of knowledge and skills, (c) the content of the in-service is manualized to ensure integrity of implementation by facilitators, (c) the in-service can be implemented in a brief period of time and at a relatively low cost, and (d) the materials were developed locally, thereby increasing acceptability among school staff.

Our first area of examination was whether school staff who participated in the in-service would report increased perceived knowledge of adolescent depression after the in-service. Findings suggest the in-service increased staff’s reported knowledge of common signs of depression, and introduced new signs of depression that were not mentioned by staff prior to the in-service, including student masking (i.e., expressions of happiness), sensitivity to noise in the classroom, physical pain, and anxiety. Whether perceived knowledge translates into actual use of strategies with students with depression should be the next step in the in-service’s evaluation.



With respect to our second area of examination that school staff would perceive learning new strategies in dealing with adolescent depression, a comparison of the pre- and the post-questionnaires showed that the staff reported learning new strategies to connect with depressed adolescents and guide their learning process. It appears that for some staff, the strategies were not new but were reinforced by the in-service. In addition, strategies reported on the post-questionnaire that had not been previously mentioned by staff on the pre-questionnaire included using supportive, empathic questions to connect with students, providing a quieter classroom environment, and providing an index card to students to identify a teacher or school staff they trusted and could turn to about their depression. Finally, strategies to connect with parents of depressed adolescents were new for some school staff but no strategies were reported that had not been previously mentioned by other school staff.

The third area of examination was whether school staff who participated in the in-service would perceive the in-service as an acceptable and feasible tool to dealing with depression. Qualitative data from focus groups immediately following the in-service and three months later suggested that the in-service was valued by school staff because it used real, local stories of students and teachers to educate staff about adolescent depression. Many school staff considered the in-service to be the best training they had received on adolescent depression. Others suggested that the in-service could be made available to adolescents and their parents. Staff from the urban schools expressed a need for more cultural diversity in the stories and more inclusion of contextual factors affecting many urban adolescents. School staff would have liked follow-up sessions to reinforce their new strategies with adolescents and parents.

Three months later, focus group participants provided preliminary evidence of sustained perceived knowledge and the emergence of behavior change during the three-month period following the in-service.

Specifically, many teachers noted positive changes in their behavior with students to connect on a personal level and to facilitate their learning process. Individual staff also reported feeling more empathy and caring for their students, which positively influenced how they



supported their students' learning in the classroom. One school had also changed their procedures for addressing adolescent depression. As a result of the in-service, this school initiated regular staff meetings to coordinate services for students with depression.

The findings of this preliminary evaluation are consistent with other depression awareness programs, such as the Adolescent Depression Awareness Program (ADAP) (Swartz et al., 2010) and the "Red Flags" Program (Newman et al., 2007), which have been widely used in Maryland and Ohio, respectively. In all of these programs (including "It's Time!"), a school-based curriculum using multiple teaching modalities (e.g., videos, interactive activities, discussion) was used to raise awareness of adolescent depression. Like "It's Time!," these programs show promise in increasing awareness of adolescent depression and of mobilizing supportive strategies when a student is depressed. Although ADAP is designed for students, teachers, and parents, published evaluation data appears to be available for the student curriculum only, thus limiting the generalizations that can be made to the teacher program. Furthermore, "Red Flags" does not have uniform implementation of instructional materials, making it difficult to replicate in other studies.

## **Limitations**

This study was limited to measuring *perceived* awareness and knowledge and the findings cannot confirm that these perceptions or self-reports translate into actual changes in these domains or that they lead to improved services for adolescents (Moor et al., 2007). While initial evidence from the follow-up focus groups points to the in-service's potential for increasing coordination among staff regarding students with depression and enhancing staff interactions with these students, a systematic evaluation of school staff behavior (e.g., student-reported staff interactions with students, referral rates, school-wide initiatives) and adolescent outcomes (e.g., reduction in school absences, enhanced academic skills and performance, reported somatic complaints) is warranted.

Second, the use of questionnaires and focus groups allowed for an

exploration of potential program impact and acceptability, and the multi-time design allowed for an exploration of perceived knowledge and change over time. However, the exploratory nature of this evaluation and the non-experimental design (e.g., lack of comparison group) precluded complex comparisons and statistical quantification of the in-service's effectiveness. A longitudinal, experimental design with more time points and randomization of schools to comparison and intervention conditions is needed to test the efficacy of the in-service.

A third limitation of this study is the generalizability of findings to other school settings. Since data collection took place in public schools, it may be difficult to generalize the findings to private schools. However, a major strength of our sampling is the inclusion of both urban and suburban schools from small and large metropolitan cities in the Midwest.

### **Implications and Recommendations**

Schools can play a critical role in the identification of students with depression and in the prevention of risk and promotion of student well-being (Calear & Christensen, 2010). "It's Time!" holds promise of improving recognition of depression by targeting school staff who already have regular contact with depressed students. The in-service targets strategies that are accessible to and readily implemented by school staff, including connecting with students on a personal level, providing classroom accommodations, and reaching out to other professional staff to support students (Maag & Swearer, 2005). Promoting these types of skills increases the acceptability and sustainability of these types of programs in schools (Herman et al., 2004).

This study points to the importance of collaboration between educational psychologists and educators in detecting student depression. Because educational psychologists rely on teacher referrals of students with depression, working closely with teachers is instrumental (Maag et al., 1988). Educational psychologists could do this by (a) training school staff in the recognition of depression, (b) laying out clear guidelines for referrals, (c) visiting classrooms to assist in the identification and

monitoring of adolescents, and (d) serving as liaison between teachers and parents and between school, family, and community resources (Maag et al., 1988; Maag & Swearer, 2005). Additionally, psychologists can be actively involved in the implementation, evaluation and sustainability of programs (Pfeiffer & Reddy, 1998), such as “It’s Time!”

Proponents of school-based mental health services have a unique opportunity to shape public policy (Herman et al., 2004). Drawing attention to the role of schools in preventing depression and other risks for adolescents (e.g., pregnancy) in a manner that is cost-effective and sustainable can lead to increased funding of school training programs and nation-wide wrap-around services in schools, such as school health centers (Chamberlin, 2009).

The debilitating nature of depression in adolescents calls for specific, cost-effective programs to be implemented within the schools. By training school staff to become familiar with adolescent depression, schools have the potential to promote students’ mental health and their associated educational outcomes (Herman et al., 2004).

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