

D. Project Title: A Statewide Implementation of the Treating Tobacco in Mental Health Settings Training

1. Overall Aim and Objectives:

The primary goal of the project is to conduct a statewide implementation of a 3-day tobacco training for mental health professionals in New Jersey. We will target all 76 New Jersey Division of Mental Health and Addictions Services (DMHAS) funded outpatient programs in New Jersey to provide training in evidence based tobacco dependence treatment and motivational interviewing. These sites serve nearly 300,000 outpatients per year who are usually considered to have serious mental illness (SMI) and are treated in the public sector. Six hundred mental health professionals will be invited to attend one of the three 3-day trainings (approximately 8 staff per outpatient program). The training will be held three times during the project period in different locations to facilitate attendance (North, Central and South New Jersey). The training curricula will be developed by the RWJMS Division of Addiction Psychiatry (based on similar prior trainings) and will contain current evidence-based practice strategies. We will evaluate the training effectiveness via knowledge acquisition and surveys that assess changes in tobacco treatment practices 1 and 6 months after attending. Although we have conducted similar CE activities in the past, we have never implemented these trainings statewide to reach the entire network of community mental health providers.

2. Current Assessment of Need in Target Area

Although public health interventions have resulted in decreased smoking rates in the United States general population over the last fifty years, smokers with mental illness have not benefited as greatly from these efforts. Smoking rates in individuals with a mental illness or addiction are at least double that of the general population (1). Some estimates are that two-thirds of current cigarette smokers have a past or present mental health or substance abuse disorder and there is evidence that this group consumes a sizeable portion of the tobacco sold in the United States (1; 2). Data from New Jersey similarly indicates a 48% smoking prevalence in outpatient mental health settings, compared to 16.8% in the general population (CDC, 2012 (3). Individuals with mental illness suffer many consequences of tobacco use with 25 years of life expectancy lost, with excess mortality from cardiovascular disease (4). Despite these statistics, smokers with mental illness have less access to tobacco dependence treatment across the health care spectrum (5;6), and specifically in the behavioral health setting.

Community based smoking cessation, which is brief and often localized to primary care practices, is unlikely to meet the needs of smokers with mental illness. There is evidence that those with mental illness experience barriers in accessing health care due to disorganized lifestyles and difficulty communicating needs; this makes it likely that they face similar barriers when trying to access community based tobacco treatments. In addition, smoking cessation specialists from a public health background may have limited experience and knowledge about helping smokers with mental illness (7). Mental illness is often associated with heavy smoking, failed quit attempts, and early relapse back to smoking after a quit attempt (1; 8; 9), factors which warrant a specialized treatment approach. National treatment guidelines recommend that all smokers should be offered counseling and pharmacotherapy, and given that smokers with a mental illness tend to be heavier smokers, these recommendations should be followed more aggressively in this population, not less.

Paradoxically, although tobacco treatment has traditionally not been offered in behavioral health settings, this sector of health care is well-suited to deliver it (10) and may offer advantages compared to primary care if barriers can be overcome. Behavioral health professionals have experience and training in the treatment of other addictions and are skilled in delivering behavioral therapies and relapse prevention counseling. As tobacco dependence is a chronic, relapsing condition, behavioral health providers have many opportunities to intervene. Individual office visits are also longer than in primary care. Integrated models have been highly successful for other co-occurring addictions and would likely succeed for tobacco treatment as well. Perhaps most importantly, smokers endorse wanting their mental health center, counselor or psychiatrist to help them to quit smoking (11).

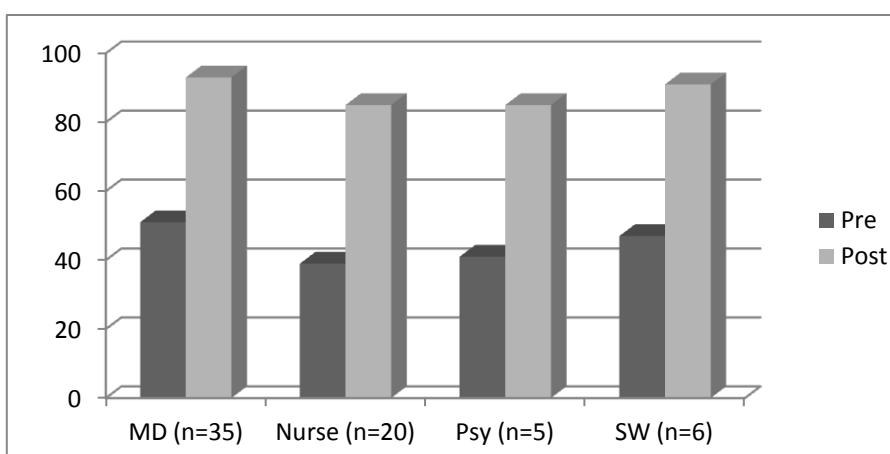
Removing barriers to accessing tobacco treatment by disseminating clinical practice guidelines and increasing treatment capacity are essential (12). Bringing services to smokers where they are is also increasingly recognized as a needed strategy to increase tobacco treatment utilization. Training and educational experiences are needed to develop the knowledge and skills for behavioral health professionals. In addition, since 2009, funding cuts have resulted in the closure of nearly all smoking cessation services in New Jersey including tobacco specialty Quit Centers, leaving even fewer options for smokers with mental illness.

That treating tobacco dependence is largely ignored in the mental health treatment setting may, at least in part, represent a training or knowledge deficit. Current opportunities for training psychiatrists in tobacco dependence treatment are lacking. Only half of psychiatry residency training programs offer tobacco education (13) and continuing medical education (CE) programs on tobacco dependence for psychiatrists in practice are also limited. A survey conducted by the Association of American Medical Colleges (AAMC; 14) found that few physicians reported being “very well prepared” by prior education to help patients stop smoking and more than 30% of psychiatrists felt that continuing education on smoking cessation was unavailable. There is a need to create new curricula for mental health professionals to make trainings relevant and feasible to their needs. Intensive 5-day tobacco trainings designed to prepare participants to become certified tobacco treatment specialists do not focus on mental health treatment providers’ needs and may be prohibitively long for prescribers to attend. Although some written and online programs exist, live training offers increased opportunity for enhanced active learning by being able to practice skills, ask questions, and interact with training faculty. Live lecture format is also the preferred format for CE by professionals (15). Scheduling a live training over the weekend, as we have done in the past, can minimize time spent away from the office and cause fewer scheduling problems for participants.

We have previously evaluated outcomes from our training events with results published in peer-reviewed journals (16; 17). Evaluation has included knowledge acquisition (via a pretest/posttest), a survey of baseline attitudes and tobacco treatment practices, and feedback about the quality and usefulness of the training (via a training evaluation). At the time of registration on the first training day, each participant completes a 15-item multiple-choice pretest and survey. The test included topics from all the training modules including assessment of level of nicotine dependence, knowledge of evidence based treatments and biological links between smoking and mental illness. The 11-item survey was adapted from an instrument developed by

the Association of American Medical Colleges (AAMC) - Center for Workforce Studies that was used to assess more than 3000 physicians in a national study of physician knowledge, attitudes and practice patterns related to smoking cessation and tobacco use (17). Survey questions addressed general knowledge about 1) Tobacco use and effectiveness of interventions, 2) Physician practice patterns related to smoking cessation, 3) Perspectives on issues related to helping patients quit smoking, such as availability of resources and presence of barriers, 4) Evaluation of formal training and education, 5) Attitudes about smokers and smoking related issues, and 6) Practice characteristics. The AAMC study included 801 psychiatrists and allowed us to compare our results from local practitioners to a national sample of psychiatrists, administered within the same 3 year period.

Figure 1. Increase in Post-Test Scores Compared to Pre-tests in 66 Training Participants (who completed both tests) Shown by Discipline



Published data from 71 participants revealed that baseline knowledge of treating tobacco among mental health professionals is poor in nearly all areas; psychiatrists, for example, do not score better than other non-medical behavioral health professionals on the pre-test with a mean score of 51% correct (Figure 1). Questions with very low correct responses on the pretest included those on the evidence-based pharmacologic for tobacco dependence, the duration of nicotine withdrawal and knowledge of tobacco’s effect on drugs metabolized by the cytochrome1A2 system. Significant increases in post-test scores show good knowledge acquisition from participants in our trainings (Paired t-tests; mean raw scores increase from 6.7 to 13.6 ($t(65) = -22.8; p < 0.001; 16$).

An overwhelming majority of psychiatrists and behavioral health nurses we surveyed felt that it was in their role to help patients stop smoking, including motivating patients to stop. Most psychiatrists (87%) and nurses (86%) reported usually asking patients about smoking status. Responses were lower for assessing patients’ willingness to quit (62% of psychiatrists/ 67% of nurses), recommending nicotine replacement therapy (37% of psychiatrists/37% of nurses), or referring patients for tobacco dependence treatment (41% of psychiatrists/ 57% of nurses). More nurses than psychiatrists referred patients to a Quitline (50 vs.10%, $\chi^2 = 9.88; p = 0.007$) and provided brochures and self-help materials (60% vs. 21%, $\chi^2 = 10.34; p = 0.006$). When asked about barriers, significantly more psychiatrists than nurses reported that their *limited*

experience in intervening with smokers was a barrier (79 vs. 43%). We also compared responses from psychiatrists who participated in our trainings to the AAMC national survey. Both psychiatrists in our sample (79%; N=30) and the AAMC study (58%) reported their “experience in intervening with smokers is limited” was a barrier to helping patients try to stop smoking. Both psychiatrists in our sample (61%) and the AAMC study (56%) felt that graduate education had left them not at all prepared to treat tobacco (See Table 1).

It is particularly important to employ strategies to engage smokers with serious mental illness in treatment for tobacco dependence, and motivational interviewing (MI) is one such strategy. MI is defined as a collaborative, person-centered form of guiding to elicit and strengthen

Table 1. Percent of Psychiatrists and Nurses who Felt Prior Education Prepared Them to Treat Tobacco						
	NJ 2 DAY TRAINING				AAMC SURVEY	
	PSYCHIATRISTS		NURSES		PSYCHIATRISTS	
	Not at all N (%)	Somewhat or Very well N (%)	Not at all N (%)	Somewhat or Very well N (%)	Not at all (%)	Somewhat or Very well (%)
Graduate education	17(61)	11(39)	7(70)	3(30)	56%	43%
Post-degree continuing education/ training	9(35)	17(65)	3(21)	11(78)	33%	66%

motivation for change (18). One of our faculty, Dr Steinberg, has used motivational interviewing to successfully motivate smokers with serious mental illness to seek tobacco dependence treatment services.(19). Simple modifications to motivational interviewing can be used to make MI even more appropriate for individuals with serious mental illness. Examples of modifications include: presenting information with verbally and visually, keeping open-ended questions simple, rather than compound, liberal use of reflective listening, and using summaries to help organize patients’ statements. Our pre-tests from previous CE activities in Motivational Interviewing (MI) indicate that even practitioners reporting some previous training (e.g., from 1hr long workshops or readings) in MI have only minimal knowledge and skills.

Evaluation data is also collected from participants. Evaluation data shows that Drs Williams, Steinberg and the rest of the presenters from the Division of Addiction Psychiatry consistently get rated as 5 (highest rating on scale from 1 to 5) on demonstrating current knowledge of the topic and being an effective presenter. Similarly participants give an average rating of 4 (scale of 1 to 5, with 1 being “strongly disagree” and 5 being “strongly agree”) that the activity meets each stated learning objective of the training.

The 2 day CE training has been held fifteen times since it was started in 2006, for more than 450 participants. About 26% of the overall attendees have been psychiatrists or prescribing nurses (APRN) with the remainder being other behavioral health professionals. We have collected evaluation data on more than 90% of all participants who attended since 2006. For many past trainings, participants have paid a \$300 registration fee to cover the program costs although we have noticed that increasingly this has been a barrier to attendance. In response to decreased

registration, trainings in 2012 were offered at no fee and attendance has increased back to full capacity, underscoring the need for grant support of this educational experience.

Table 2. Portion of Evaluation Data from Nov 2011 2 Day CME Training (n=40 participants)

Participants were asked to rate several aspects of the activity on a scale of 1 to 5, with 1 being “strongly disagree” and 5 being “strongly agree.” The information below is based on feedback received from participant evaluation forms and reflects the mean score.

1. The information presented increased my awareness/understanding of the subject. (mean score= 4.8)
2. The information presented will influence how I practice. (mean score= 4.9)
3. The information presented will help me improve patient care. (mean score= 4.9)
4. The program was educationally sound and scientifically balanced. (mean score= 5)
5. The program avoided commercial bias or influence. (mean score= 4.9)
6. Overall, the program met my expectations. (mean score= 5)
7. I would recommend this program to my colleagues. (mean score= 5)

3. Technical Approach, Intervention Design and Methods

(a) Training Curriculum

We will provide a 3-day training curriculum in evidence-based tobacco dependence treatment and motivational interviewing (MI) to six hundred mental health professionals. The training curricula for these sessions has been developed by the Division of Addiction Psychiatry as continuing education (CE) events since 2006 although in the past they have been delivered as two separate events: a 2 day training on Treating Tobacco in Mental Health Settings and a 1 day training on Motivational Interviewing. The curriculum is continuously updated to include relevant research and policy changes. These events are excellent trainings to support staff that may be providing tobacco services for the first time. In addition to helping these professionals increase their clinical skills in treating tobacco, they also will enhance awareness and understanding about the effectiveness of tobacco-free policies and can have additional positive effects on the treatment environment where these providers work.

Each training day is about 7 hours long. The learning objectives for the training are as follows:

1. Define the knowledge and skills necessary for assessment and treatment of smokers with mental illness,
2. Identify the behavioral and pharmacologic treatments for smokers with mental illness, including medication interactions associated with smoking,
3. Practice motivational techniques for working with lower motivated smokers,
4. Recognize broader clinical and systems issues for addressing tobacco dependence in mental health settings, and
5. Begin to develop treatment plans for smokers with behavioral health conditions in different stages of change with regard to their desire to change their tobacco use.

The first two days include review of epidemiology and current neuroscience of smoking and mental illness comorbidity. The remainder of the first two days focuses on clinical treatment and includes nicotine dependence assessment and reviews evidence-based psychosocial and pharmacological treatments as well as treatment planning. Current research findings from studies of smokers with comorbidity are reviewed and cases and interactive learning are used to reinforce key principles. Although the curricula was tailored to incorporate current knowledge on best practices for treating smokers with mental illness, in areas where knowledge or evidence is lacking, recommendations are taken from clinical practice guidelines for treating smokers in the general population (20). The curriculum of the first 2 days consists of 11 modules (See Table 3). The last 2 modules on MI are covered in the third day.

Table 3. Modules of the Training Curriculum

1. Prevalence of Tobacco Use and Mental Illness and Co-Morbidity
2. Understanding Tobacco Addiction: Neurobiology of Tobacco Use and Mental Illness
3. Incorporating Assessment of Tobacco Dependence into Current Psychiatric Evaluations & Treatment Plans
4. Pharmacologic Treatments (Part 1) Evidence Based Pharmacotherapies
5. Reaching Smokers through Peer Led Initiatives
6. Individual and Group Treatments for Tobacco
7. Pharmacologic Treatments (Part 2)- Tailoring Pharmacology for Smokers with Mental Illness
8. Treatment Planning Discussion and Exercises: Working with Lower Motivated Smokers and Complex Cases/Choosing Pharmacotherapy
9. Master Settlement Agreement, Tobacco Taxes and Tobacco Control Strategies
10. Other Considerations: Tobacco Smoke Interactions and Symptom Monitoring
11. Mental Health Systems Change – Promoting & Creating a Tobacco Free Environment
12. Principles of Motivational Interviewing
13. Using Motivational Interviewing in Tobacco Dependence Treatment

Training Day 3 is dedicated to training a multidisciplinary group of mental health professionals in motivational interviewing (MI). The RWJMS Division of Addiction Psychiatry has successfully implemented CE Learning Activities in MI since 2009. MI skills will increase the likelihood that patients with low or wavering motivation to engage in healthy behaviors (e.g., quit smoking, medication adherence, maintain a healthy diet) by increasing motivation for change and resolving ambivalence. Most training examples focus on tobacco cessation, however, motivational interviewing has strong empirical support for a wide variety of behavior change targets and practitioners working with any behavior change target will benefit.

The one day session on Motivational Interviewing is designed to help the participant understand its benefits and applications, based on current research, literature and Clinical Practice Guidelines. Correct and incorrect use of MI will be examined, along with indications and contraindications. The learning format will include lectures, group discussions, and practical exercises. While motivational interviewing is difficult to learn without extensive training and ongoing supervision (21), further study is warranted to determine if mental health counselors trained in the “spirit” of motivational interviewing can also be more effective in motivating smokers to quit than those not trained. The “spirit” of MI includes evoking motivation from within your patients, respecting their autonomy, and working collaboratively with them. This contrasts with a more directive, hierarchical strategy commonly employed with this population. The training combines lectures with clinical case discussions, group learning, and supervised skill practice of “micro-skills”.

(b) Training Logistics

The faculty for the 3 day training includes 1 physician, 2 doctoral level psychologists, and at least 2 Masters level counselors who are also Certified Tobacco Treatment Specialists. Each of the didactic presentations of the trainings is followed by a question and answer session and several sessions involve interactive learning through case studies, small group problem solving and skills practice sessions. The training will be held three times during the project in different locations to facilitate attendance (North, Central and South New Jersey). Each participant will receive a training manual that corresponded with the presentations. We also distribute

extensive supplementary learning materials via a flash drive to all participants. CE credits for physicians and all other relevant professional disciplines (nursing, counselors, SW, etc) will be offered to participants.

We have been successful in generating audiences for prior training events and do not anticipate any difficulty for this education activity. We will enhance attendance by holding the event three times in a two year period in different geographic locations to reduce travel burden for participants. The University can provide at least one training space in central NJ at no cost (in-kind). Our partnerships with state and county providers will ensure that we can use their space for events in North and South Jersey at low cost rental fees which is preferable since having trainings at hotels or conference facilities would be cost-prohibitive and our partner spaces often have free parking as well. Methods that we have used previously to publicize these activities to prospective participants will be employed again and include: an online recruitment/registration website, email blasts on various listserves and email groups, printed brochure distribution and mailings to local providers and online advertising with relevant professional organizations such as the New Jersey Psychiatric Association. In addition we have often disseminated letters of support from our training partners endorsing these opportunities.

(c) Training Partners

All of our trainings are done in conjunction with the **UMDNJ-Center for Continuing and Outreach Education** which is accredited by the Accreditation Council for Continuing Medical Education to provide continuing medical education for physicians. The UMDNJ-Center for Continuing and Outreach Education reviews all our training materials in detail and assigns the appropriate number of *AMA PRA Category 1 Credits*[™] to each educational activity. In order to reach the broadest audience of behavioral health providers, we also partner with the Behavioral Research and Training Institute of **UMDNJ- University Behavioral Health Care** in order to provide approved credits for Certified Counselors, Nurses, Psychologists and Social Workers.

Our strong collaborations with other partners and stakeholders in NJ will assist in publicizing the trainings and gathering support for attendance. These collaborations will ensure that we are able to reach the target audience. The **NJ Division of Mental Health and Addiction Services (NJDMHAS)**, an office within the Department of Human Services is the state mental health authority that oversees the public system of adult mental health and addiction services and has been a particularly strong partner in addressing tobacco. The SMHA operates three regionally based, adult psychiatric hospitals, one adult forensic hospital, and contracts with approximately 120 not for profit community provider agencies. In New Jersey, the administration and organization of the mental health system is centralized, rather than county or locally based. NJDMHAS has been very supportive of addressing tobacco in its publicly funded treatment centers but has lacked the resources for a statewide training initiative for outpatient mental health providers.

Since 2009, all of the NJ State Psychiatric Hospitals have completely tobacco-free grounds reflecting a national trend. These sites also provided tobacco dependence treatment programming that was specially tailored to individuals with serious mental illness through the Learning about Healthy Living manual, which was developed in collaboration with the PI (22). NJDMHAS leadership developed policies for these settings that required trainings for staff on

smoking cessation treatments, and required assessment of all tobacco users. Specific policies detailed that tobacco dependence be included in the treatment plan as a focus of care. The RWJMS Division of Addiction Psychiatry was integral to this initiative and provided the trainings and technical support to inpatient and state government staff over a 4 year implementation. NJDMHAS has also had several other collaborations with Dr Williams including working on policies to enable residential addictions treatment facilities to be tobacco-free. Lynn Kovitch, Assistant Commissioner, has pledged her support to the initiative (see attached letter) and will promote the trainings widely through communication systems in NJDMHAS. Dr Williams was responsible for conducting extensive trainings on tobacco dependence treatment to *inpatient* staff at the state hospitals from 2007-2009 but resources were not available at the time to provide trainings for staff who treat outpatients, making this current proposal complementary to past tobacco-focused initiatives. We have already trained about 100 prescribers (Psychiatrists and Advanced Practice Nurses) and 175 non-prescribing clinicians in NJ since 2006 but there is an ongoing need for tobacco education due to few other tobacco training resources and high rates of staff turnover in these settings.

We also have strong partnerships with provider agencies through the **NJ Association of State Mental Health and Addictions Agencies (NJAMHAA)** that will also help to promote this training opportunity in the NJ provider community. NJAMHAA is comprised of the leading mental healthcare and addiction treatment providers who treat New Jersey residents with mental illness, addictions or co-occurring disorders, as well as the families of these individuals. This membership represents organizations in every county and almost every community statewide - nearly 98 percent of the behavioral healthcare market in New Jersey. Debra Wentz, CEO of NJAMHAA has pledged support for this initiative. Since a media campaign often accompanies a tobacco control initiative and we will also use our communication networks including local listserves, regional meetings and other publicity efforts to alert the behavioral health community.

4. Evaluation

In 2011, we added measures to our usual evaluation of the tobacco dependence trainings. In addition to knowledge acquisition and baseline surveys, we were interested evaluating the effectiveness of the 2-day CE training on changing practice patterns for treating tobacco among mental health staff. This study is currently underway in a sample of about 50 prescribers and non-prescribers who work in our own university behavioral health programs. From these subjects who attended training in March 2012 (and who are blinded to study purpose), we are conducting extensive clinical chart reviews of their patients to document evidence of tobacco dependence treatment. We will compare these charts with the charts from the same providers' patients in the months before the training to assess changes.

Although we understand that evidence of practice change is considered a better evaluation measure of training effectiveness than knowledge acquisition, chart review would not be feasible for the current proposed training initiative due to the large (600) number of trainees who are located throughout the state at many different clinical sites. Instead, we will **rely on the participants' self-report of implementation of a comprehensive set of clinical activities and policies consistent with tobacco dependence treatment best practices (assessed before and after training)**. We have previously developed instruments to assess baseline tobacco

treatment practices and tobacco use policies in behavioral health settings, and we have experience in collecting data via online surveys (20). We will conduct a survey at baseline (prior to attending training) to assess baseline practices at both the individual provider and agency level. The survey will be repeated at 1 and 6 months after the completion of training to assess changes in both individual providers and at the agency level. We will diligently follow-up with participants to urge completion of post-activity surveys seeking to receive responses from at least 70% of training participants. We will also collect the standard measures of change in knowledge and competence (via pre- and post- tests) and post-activity evaluation surveys of attitudes and beliefs regarding educational effectiveness, presence of bias and fair balance. In addition to the online surveys, we will ask all participants to submit the current tobacco use and/or tobacco treatment policy for their agency to assess institutional policies and practices. By collecting the actual policy documents from the mental health agencies we will have an unbiased record of the written policies related to tobacco use in New Jersey's mental health agencies. We will train a research assistant to code the written policy documents for relevant tobacco use information.

By matching individual participants' data to their agency policies, we can determine how well policies are being implemented at pre- and post-training. These data will be important for instigating change throughout New Jersey's mental health system because we can provide feedback to agencies regarding areas for improvement and praise examples of excellence.

We anticipate that the rich datasets resulting from our evaluation strategy will result in a peer reviewed scientific manuscript which will have the potential to influence other systems nationally. The dataset will also result in a report we can provide to the state of New Jersey to guide the implementation of strategies to better address tobacco within the mental health systems of New Jersey. Changing the behavior of mental health professionals to treat tobacco is the ultimate goal of this training initiative. Our plan is to: 1. Deliver an evidence-based educational experience, and 2. Document the participant's (or team's or agency's) planned behavior change for addressing tobacco, based on the learned information. We will provide them with feedback to compare their performance to national benchmarks and/or the performance of peers. These trainings can be a model for other states that are looking to develop strategies for addressing tobacco within their mental health systems.

5. References

1. Lasser K, Boyd JW, Woolhandler S, Himmelstein DU, McCormick D, Bor DH. Smoking and mental illness: A population-based prevalence study. *JAMA* 2000; 284(20): 2606-2610.
2. Grant BF, Hasin DS, Chou SP, Stinson FS, Dawson DA. Nicotine dependence and psychiatric disorders in the United States: results from the national epidemiologic survey on alcohol and related conditions. *Arch Gen Psychiatry*. 2004 Nov; 61(11): 1107-15.
3. Centers for Disease Control and Prevention (CDC). Behavioral Risk Factor Surveillance System Survey Data. Atlanta, Georgia: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, 2003 – 2011.
4. National Association of State Mental Health Program Directors (NASMHPD) Medical Directors Council. *Morbidity and Mortality in People with Serious Mental Illness*. Alexandria, VA; 2006.
5. Peterson AL, Hryshko-Mullen AS, Cortez Y. Assessment and diagnosis of nicotine dependence in mental health settings. *Am J Addict*. 2003;12(3):192-7.

6. Montoya ID, Herbeck DM, Svikis DS, Pincus HA. Identification and treatment of patients with nicotine problems in routine clinical psychiatry practice. *Am J Addict.* 2005;14(5):441-54.
7. Pbert L, Jolicoeur D, Reed G, Gammon WL. An evaluation of tobacco treatment specialist counseling performance using standardized patient interviews. *Nicotine Tob Res.* 2007 Jan;9(1):119
8. Pratt LA, Brody DJ. *Depression and Smoking in the U.S. Household Population Aged 20 and over, 2005–2008. NCHS Data Brief. Vol 34.* Hyattsville, MD: National Center for Health Statistics; 2010.
9. Hagman BT, Delnevo CD, Hrywna M, Williams JM. Tobacco Use Among Those With Serious Psychological Distress: Findings from the National Survey of Drug Use and Health, 2002. *Addict Behav* 2008 Apr;33(4):582-92.
10. Williams JM, Zimmermann MH, Steinberg ML, Gandhi KK, Delnevo C, Steinberg MB, Foulds J. A comprehensive model for mental health tobacco recovery in New Jersey. *Adm Policy Mental Health,* Sep;38(5):368-83, 2011.
11. Williams JM, Dwyer M, Verna M, Zimmermann MH, Gandhi KK, Galazyn M, Szkodny N, Molnar, Kley R, Steinberg ML. Evaluation of the CHOICES program of peer-to-peer tobacco education and advocacy. *Community Ment Health,* J Jun;47(3):243-51, 2011.
12. Orleans CT, Phillips T. Innovations in Building Consumer Demand for Tobacco Cessation Products and Services: 6 Core Strategies for Increasing the Use of Evidence-Based Tobacco Cessation Treatments. National Tobacco Cessation Collaborative, September 2007. Washington, DC
13. Prochaska JJ, Fromont SC, Louie AK, Jacobs MH, Hall SM. Training in tobacco treatments in psychiatry: a national survey of psychiatry residency training directors. *Acad Psychiatry.* 2006 Sep-Oct;30(5):372-
14. Association of American Medical Colleges. Physician Behavior and Practice Patterns Related to Smoking Cessation, Full Report. May 2007. Accessed online at <http://www.aamc.org/workforce/smoking-cessation-summary.pdf>
15. Stancic N, Mullen PD, Prokhorov AV, Frankowski RF, McAlister AL. Continuing medical education: what delivery format do physicians prefer? *J Contin Educ Health Prof.* 2003 Summer;23(3)
16. Williams JM, Steinberg ML, Hanos Zimmermann M, Gandhi KK, Lucas GE, Gonsalves DA, Pearlstein I, McCabe P, Galazyn M and Salsberg E. Training Psychiatrists and Advanced Practice Nurses to Treat Tobacco Dependence. *Journal of the American Psychiatric Nurses Association* 2009; 159(1): 50-58
17. Williams JM, Foulds J, Dwyer M, Order-Connors B, Springer M, Gadde P, Ziedonis DM. The integration of tobacco dependence treatment into residential addictions treatment in New Jersey. *J Subst Abuse Treat,* 28: 331– 340, 2005.
18. Miller WR, Rollnick S. Ten Things that Motivational Interviewing Is Not. *Behavioural and Cognitive Psychotherapy* 2009, 37, 129–140
19. Steinberg ML, Ziedonis DM, Krejci JA, Brandon TH. Motivational Interviewing With Personalized Feedback: A Brief Intervention for Motivating Smokers with Schizophrenia to Seek Treatment for Tobacco Dependence. *J Consult Clin Psychol* 2004; 72(4):723-8.
20. Fiore MC, Jaén CR, Baker TB, et al. Treating Tobacco Use and Dependence: 2008 Update. Rockville, MD: U.S. Department of Health and Human Services. Public Health Service.
21. Miller WR, & Mount KA. A small study of training in motivational interviewing: Does one workshop change clinician and client behavior? *Behavioural and Cognitive Psychotherapy* 2001; 29, 457–471.
22. Williams JM, Ziedonis DM, Vreeland B, Speelman-Edwards N, Zechner MR, Williams MT, Rahim R, Karimi L, Molnar M, and Eilers R. A Wellness Approach to Addressing Tobacco in Mental Health Settings: Learning about Healthy Living. *American Journal of Psychiatric Rehabilitation* 2009; 12:352-369.

E. Detailed Work Plan and Deliverables Schedule

Objective	Project Activities	Start Date	End Date		Measure of Accomplishment	Person Responsible
<u>Objective 1</u> To deliver an evidence-based educational experience to 600 mental health practitioners	Implement a three day “live” training three times for 200 NJ mental health practitioners per event	Jun 2013 Oct 2013 Mar 2014	June 2013 Oct 2013 Mar 2014		Potential training participants identified	Entire Project Team
	Schedule monthly planning meetings to discuss overall activity including curriculum, logistics and evaluation process	Jan 2013	Dec 2014		Conduct initial activity planning meeting and schedule monthly meetings	Entire Project Team
	Secure three activity venues (North, Central & South NJ); caterer	Jan 2013	May 2013		Set training dates & locations	Nancy Szkodny
	Develop training agendas and curricula for each presenter; Reviewed and revise quarterly to incorporate current knowledge on best practices for treating smokers with mental illness	Jan 2013	Feb 2013		Develop training and educational experience	Entire Project Team
	Order supplies, flash drives, promo items	Feb 2013	Dec 2013		Organize supply inventory	Nancy Szkodny
	Complete CE/ CE certification applications for the program from the UMDNJ-CCOE and UBHC. Must be updated annually	Feb 2013 Jan 2014	Mar 2013 Jan 2014		Applications completed and written contracts in place	
	Develop & disseminate advertising materials Advertise CE via listserves, site visits, society networking, etc	Mar 2013	Mar 2014		Publicize activity	PI & Activity Faculty
	Open and update registration website	Mar 2013	Mar 2014		Direct CCOE office to begin registrations	Nancy Szkodny
<u>Objective 2:</u> Develop a peer-reviewed resource manual	Prepare a resource manual to correspond with training program Update at least annually.	Feb 2013 Jan 2014	Mar 2013 Jan 2014		Complete resource manual	Entire Project Team
	Submit resource manual for peer review	Mar 2013	Mar 2013		Peer review process	Nancy Szkodny
	Final resource manual to printer	May 2013	Jun 2013		Print resource manual	
<u>Objective 3:</u> Assess	Develop pre test and post test items	Mar 2013	Mar 2013			PI & Activity Faculty

participant's baseline knowledge and training effectiveness	Develop an evaluation form of the training experience	Mar 2013			Complete evaluation form	Nancy Szkodny Patricia Dooley, MA Jose Cruz, MA, LPC
	Photocopy evaluation forms, pre & post test, additional handouts, etc for activity	Apr 2013	Mar 2014		Prepare handout materials for participants	Student Assistant
<u>Objective 4:</u> Obtain IRB approval to collect data	Write IRB application for evaluation study	Mar 2013	Jun 2013		Complete IRB application	Jill Williams, MD
	Complete continuing review at least annually	Mar 2014	Mar 2014			
<u>Objective 5:</u> Document participant's current behavior for addressing tobacco	Develop other baseline assessments of participants including survey on tobacco treatment attitudes and current practices	Mar 2013			Complete activity instruments	PI & Activity Faculty
	Contact registrants to secure current tobacco use and/or tobacco treatment policy at their agency prior to each training event	Apr 2013 Sept 2013 Apr 2014			Collect tobacco policies	Patricia Dooley, MA Jose Cruz, MA, LPC
	Develop database and coding for baseline evaluation items	Mar 2013	June 2013		Complete instrument for coding date gleaned from tobacco policies	Jill Williams, MD Marc Steinberg, PhD
	Score baseline evaluation items and enter into database	July 2013	Apr 2014		Enter preliminary data	Nancy Szkodny & Student Assistant
<u>Objective 6:</u> Conduct survey 1 and 6 months after the completion of training to assess changes	Conduct one month online survey to assess changes in both individual providers and at the agency level. Ensure responses by trainees by reminders and phone calls	Jul 2013 Nov 2013 Apr 2014	Jul 2013 Nov 2013 Apr 2014		Collect and enter one month survey data	Patricia Dooley, MA Jose Cruz, MA, LPC
	Conduct six-month online survey to assess changes in both individual providers and at the agency level. Ensure responses by trainees by reminders and phone calls	Dec 2013 Apr 2014 Sep 2014	Dec 2013 Apr 2014 Sep 2014		Collect and enter 6 month survey data	
<u>Objective 7:</u> Evaluate and publish outcomes	Analyze data	Sep 2014	Oct 2014		Complete analysis of data	PI & Activity Faculty
	Prepare manuscript for publication	Nov 2014	Dec 2014		Publish findings	