

## Appendix B Proposal Cover Page

1. **Date Submitted:** May 1, 2009
2. **Project Title:** Efficiently and Effectively Teaching Mental Status Exams to Medical Students
3. **Project Theme:** Promote innovative teaching techniques that may lead to continuous improvement in learning outcomes.

**4. Applicant/Project Director Name:**

Name Brenda J. Talley, M.D.  
Department/Title: Psychiatry/ Assistant Professor  
Address: 7703 Floyd Curl Drive San Antonio, Texas  
Campus Phone: 567-0085 Email: talley@uthscsa.edu Fax: 567-3483

**5. Name and Title of Co-Project Directors:**

Name John H. Littlefield, Ph.D.  
Department/Title: Director of Academic Center for Excellence in Teaching  
Address: 7703 Floyd Curl Drive, San Antonio, Texas  
Campus Phone: 567-2283 Email: LITTLEFIELD@UTHSCSA.EDU Fax: \_\_\_\_\_

Name \_\_\_\_\_  
Department/Title: \_\_\_\_\_  
Address: \_\_\_\_\_  
Campus Phone: \_\_\_\_\_ Email: \_\_\_\_\_ Fax: \_\_\_\_\_

**6. Name of Administrative Staff Contact:**

Name Amy Permann  
Department/Title: Psychiatry/Academic Coordinator  
Address: 7703 Floyd Curl Drive, San Antonio, Texas  
Campus Phone: 567-0085 Email: Permann@uthscsa.edu Fax: \_\_\_\_\_

7. **Requested dollar amount (up to \$5,000 is available):** \$5,000

## Appendix C Proposal Narrative Outline

To insure that the proposal narrative includes important information to adequately determine its feasibility and impact potential, applicants should follow the content outline below in preparing their Scholarship of Teaching Grants (STG) proposals. *(Maximum Score 75 Points)*

Proposal Elements
<p><b>1. Project Title (5 points)</b></p> <ul style="list-style-type: none"> <li>▪ What is the project idea?</li> </ul>
<p><b>2. Description of the problem or Statement of need (15 points)</b></p> <ul style="list-style-type: none"> <li>▪ Why should this project be implemented?</li> <li>▪ Decide if you want to put your project forward as a model.</li> <li>▪ What is the problem, need or deficiency that will be addressed by this project?</li> <li>▪ Why is it important to address this problem?</li> <li>▪ Find data the best support your project.</li> <li>▪ Give the reader hope and avoid overstatement and emotional appeals.</li> </ul>
<p><b>3. Design of the project (20 points)</b></p> <ul style="list-style-type: none"> <li>▪ What will be developed or implemented?, and, importantly</li> <li>▪ Why is this approach innovative and likely to enhance students' learning or the quality of their educational experience?</li> <li>▪ What tasks will be performed?</li> <li>▪ How it will be done?</li> <li>▪ Who will do the work?</li> </ul>
<p><b>4. Potential impact (15 points)</b></p> <ul style="list-style-type: none"> <li>▪ What objective(s) do you hope to achieve by implementing this project?</li> </ul>
<p><b>5. Evaluation Plan (10 points)</b></p> <ul style="list-style-type: none"> <li>▪ Describe how you will evaluate whether or not the project objectives were achieved.</li> </ul>
<p><b>6. Plan for Continuation/Budget Plan/Cost Sharing (15 points)</b></p> <ul style="list-style-type: none"> <li>▪ What will be done to continue the project beyond the initial funding period?</li> <li>▪ Develop a detailed budget and provide budget justification. Specify and describe any cost sharing arrangement.</li> </ul>

## Appendix C-1: Proposal Narrative Worksheet

### Title: Efficiently and Effectively Teaching Mental Status Exams to Medical Students

#### *Description of the problem*

Conducting a mental status exam (MSE) is an important clinical competency for medical students to achieve, but teaching over 200 second-year students (MS II) how to interview and write-up a MSE is a labor-intensive faculty activity in an era when availability of clinical faculty time is a very limited resource. In the past, we taught MSE during the Psychopathology Course by having clinical faculty supervise groups of 5-6 MS IIs who conducted six face-to-face interviews with actual patients. Students wrote a MSE based on each interview and submitted it to the instructor. This *old* instructional approach produced good student performance on MSE-related exam questions (mean = 85.2% and s.d. = 11.3) and positive course ratings by students. However, it required approximately 1,248 hours of clinical faculty time annually. Class size was increasing each year so the faculty recruitment problem would become even more acute.

In 2007 we devised a *new* instructional approach that substituted videos of a Psychiatrist interviewing an actual patient for three of the six face-to-face actual patient interviews. Students viewed the videos online via the BlackBoard course management system (CMS), wrote a MSE, and then submitted it to the course director via the CMS. All MSEs were checked for completion. A random sample of submitted MSEs were reviewed for construction. A *gold standard* MSE was released to students for review and correction after each assigned MSE was submitted. The sequence alternated between face-to-face and video interviews so each student completed six MSE, three with actual patients and three with video interviews. The didactic portions of the course (54 hours) remained essentially the same. In 2008 class size increased from 206 to 214 and we evaluated the course by comparing student outcomes with the 2006 course: mean scores on MSE-related exam questions improved 5 points (mean = 90.2% and s.d. = 9.4) and course ratings remained positive. However the total clinical faculty time required

was 586 hours, a 53% decrease from 1248 hours in 2006. Now that the initial transition to the *new* instructional approach is complete, there are several enhancements that would greatly improve the course.

### ***Design of the project***

We plan to improve the instructional approach for teaching MSE in two areas: (1.) Increase the number of patient-interview videos available for teaching, and (2.) Provide feedback to students regarding their submitted MSE. We currently have a total of three patient-interview videos. Some videos are over 20 years old so hair and clothing styles have changed. Student “sharing” of MSE write-ups has surfaced as an issue and will likely be significantly reduced with a larger inventory of videos. Furthermore, a variety of interviews representing major psychopathology categories will advance student’s educational goals. Finally, we plan to develop a “co-op” nationally of patient-interview videos. Through networking with psychiatry educators nationally, a large pool of video interviews could be accumulated. Each video in the pool will be accompanied by a *gold standard* MSE and three multiple-choice test questions linked to the patient’s problems. Co-operative individual educator efforts can benefit students at medical schools throughout the country.

Secondly, we would like to provide individualized, standardized, structured feedback to students regarding their MSE. Formative feedback can improve learning processes and outcomes, if delivered correctly.<sup>1</sup> At present this has been logistically difficult due to over 200 students submitting three MSEs to one course director during the course. One possible solution would be to hire Psychiatry residents to review submitted student MSEs and provide direct written feedback via the CMS. The UTHSCSA Internal Medicine Residency Program successfully hired residents to provide feedback to Interns on how to write Patient Discharge Summaries and we propose to hire Psychiatry residents to provide feedback to MS II on how to

---

<sup>1</sup> Shute, V. Focus on Formative Feedback. *Review of Educ. Research*, 2008, V. 78(1), p.153-189.

write MSE.<sup>2</sup> Residents that participate will satisfactorily complete a training exercise to learn the characteristics of formative feedback and essential elements of an exemplary MSE. They will receive \$5 for each student MSE they critique. We expect a Resident can complete 8-10 MSE per hour and have budgeted \$2,300 for this activity. During academic year 2009-10, every MS II will receive formative feedback on two randomly selected MSEs from the three required during the course (i.e., 460 MS II MSEs will be critiqued). We have budgeted \$450 for programmer time (\$45 per hour) in order to make changes in the BlackBoard CMS to accommodate Resident feedback to MS IIs regarding their MSE write-up.

Increasing the number of available patient-interview videos is a two part task: (1.) Developing nine patient-interview videos at UTHSCSA, and (2.) Creating a 'co-op' of psychiatry educators who contribute to a national pool of patient-interview videos. Will Underwood, Producer II in Video Production, estimates a cost of \$250 for each video recording therefore nine videos will cost \$2,250. Dr. Talley or one of her faculty/resident colleagues will conduct each interview with actual patients.

Efforts to create a co-op of psychiatry educators began in September, 2008 when Dr. Talley attended the annual meeting of the Association of Academic Psychiatrists. She presented a workshop describing this project and recruited Psychiatry educators who were teaching MSE at their home campuses.<sup>3</sup> These recruitment efforts will continue by Dr. Talley's attendance at the annual meeting of the Association of Directors of Medical Student Education in Psychiatry in June, 2009. She will present a workshop on the mental status exam. This forum will present an excellent opportunity to continue recruitment of fellow psychiatric educators into a national co-op that shares patient-interview videos.

---

<sup>2</sup> Littlefield, J., DaRosa, D. and Wathen, P. Integrating meaningful learning activities relevant to practice-based learning and improvement and systems-based practice into a busy residency program. Small Group Discussion at the Annual Meeting of the Assoc. of Am. Med. Colleges, San Antonio, TX, November, 2008.

<sup>3</sup> Talley, B. and Littlefield, J. Innovative approaches to teaching the mental status examination. Workshop presentation at the annual meeting of the Association for Academic Psychiatry, Santa Fe, NM, Sept., 2008.

## Potential impact

The proposed project has two objectives:

1. Increase the number of patient-interview videos available to teach MSE to MS II
2. Provide formative feedback to MS II regarding their submitted MSE.

By increasing the number of available patient-interview videos from three to twelve, we can give students experience with a wider variety of patient problems and reduce the “sharing” of MSE write ups across different small groups. In future years, the national co-op will produce even more videos for educational use. If recruiting clinical faculty becomes even more difficult, we may experiment with decreasing the number of face-to-face interviews from three to two. Additionally, providing formative feedback is a very powerful instructional method, but it is important to deliver it correctly. We plan to share the Resident feedback training exercise developed in this project with other Psychiatry educators by making presentations at national meetings.

## Evaluation Plan

Table 1 – Project Objectives, Proposed Activities, Evaluation Measures, and Approximate Dates

<i>Objective</i>	<i>Proposed Activities</i>	<i>Evaluation Measure</i>	<i>Approximate Dates</i>
1. Increase the number of patient-interview videos available to teach MSE to MS II	1.1. Plan and record 9 videos of patients at University Hospital.	1.1. Monitor adherence to timeline of recording at least one video interview monthly	1.1. Academic Year 09-10
	1.2. Recruit Psychiatry Educators at other schools to contribute patient-interview videos	1.2. Monitor adherence to timeline of recruiting other medical schools to contribute at least 10 patient-interview videos	1.2. Fall, 2009
	1.3. Begin using a different video for each group of MSII in the Psycho-pathology Course	1.3. Analyze student course ratings and performance on MSE final exam items. Compare to performance in past years.	1.3. January-April, 2010

2. Provide formative feedback to MS IIs regarding their submitted MSE.	2.1. Train Psychiatry Residents to provide feedback for MSE write-ups with practice exercise.  2.2. Residents critique MSE and provide feedback to MS IIs.	2.1. Document satisfactory completion of training prior to providing feedback.  2.2. Randomly sample 10% of feedback e-mails for completeness; analyze feedback longitudinally as MS IIs progress through successive patient video interviews.	2.1. December, 2009  2.2. January-April, 2010

*Plan for continuation*

If the national co-op venture is successful, there will be numerous patient-interview videos available therefore additional funds for producing videos will not be necessary and objective 1 will have been achieved. Regarding objective 2, as noted in the Description of the Problem, this instructional approach to teaching MSE reduced clinical faculty time commitments by 53% (660 hours of faculty time). If the project successfully achieves its objective of providing feedback to MS IIs, the Psychiatry Department will fund approximately \$2,300 in Resident time commitments in the future.

## Appendix D Proposal Budget Worksheet

Name of Project: Efficiently and Effectively Teaching Mental Status Exams to Medical Students

Name of Applicant/Project Director: Brenda Talley, M.D.

Date Submitted: May 1, 2009

Budget Category: Non-Personnel	Budget Justification	STG	Cost Sharing *	Amount
Project Supplies				
Purchased Services (i.e. Academic Technology Services)	1. Produce patient-interview videos 2. BlackBoard programming	\$ 2,250 \$ 450		\$2,700
Transportation/Travel	1. Travel to Psychiatry Educator Conf.		\$3,000	\$3,000
Printing and Duplication				
Publications and Periodicals				
Equipment				
Other:	1. Stipends for Psychiatry Residents	\$ 2,300		\$2,300
Other:				
Miscellaneous/Contingency				
<b>TOTAL BUDGET --- Project Request</b>		<b>\$5,000</b>	<b>\$3,000</b>	<b>\$8,000</b>

Cost Sharing \* ---- identify other cash or in-kind funding resources available to implement to the proposed project