Project Title: A Curriculum Designed for Significant Learning

Name and Institution: Brenda Roman, MD; Wright State University Boonshoft School of Medicine

Collaborators: Dean Parmelee, MD; Bruce Binder, MD, PhD; Nicole Borges, PhD; members of the Wright Curriculum Steering Committee at WSU-BSOM; and L. Dee Fink, PhD, Professional and International Consultant in Higher Education

Background, Challenge or Opportunity: On the 100th anniversary of the Flexner report, a new study of physician education called for major curriculum reform emphasizing an integrated model of basic and clinical sciences for medical school education (Cooke, Irby and O’Brien, 2010). While medical educators recognize the need for curriculum reform, the institutional process is not necessarily rooted in evidence. Education models generally utilize the “top-down” approach of defining educational objectives, followed by a focus on student outcomes, but without ensuring that the teaching/learning activities allow the students to meet the goals. In recent years, L. Dee Fink’s (2003) “taxonomy of significant learning” has informed higher education curriculum planning. While the Boonshoft School of Medicine (BSOM) has utilized Fink’s concepts, including backward design to develop individual courses, utilizing his model as a framework for reforming a medical school curriculum is novel.

Purpose/Objectives: The purpose of this project is twofold: 1) use the taxonomy of significant learning as the framework in constructing the educational objectives; and 2) using the concept of backwards design, construct the milestones for each of the educational phases, followed by the identification of the assessment activities, and finally delineate the teaching and learning activities.

Methods/Approach: The Wright Curriculum Steering Committee re-framed our educational objectives using L. Dee Fink’s taxonomy of significant learning. In doing so, we discovered that his descriptions of significant learning aligned with the six ACGME core competencies. After these educational objectives were completed, work began on drafting the milestones for each of our educational phases (Foundations of Clinical Practice, Doctoring and Advanced Doctoring), which will soon be completed. To determine how to measure each of our milestones, an assessment committee was formed, with a charge to explore the literature for best practices in assessment and give recommendations to the steering committee in the summer of 2013. Concurrently, the Steering Committee will draft guiding principles for use by subcommittees to identify teaching and learning activities in order to achieve the milestones.

Outcomes and Evaluation: While this project is still in the early stages, Dr. Fink presented a draft of our educational objectives at an international meeting, and they were well received. Short-term evaluation will include having committee members participate in focus groups to identify the strengths and weaknesses of applying the taxonomy of significant learning to medical education curriculum reform. After the new curriculum is underway in 2015, each year for several years, committee members will convene to determine if the application of the taxonomy of significant learning used to develop the BSOM curriculum was successful in achieving the goals. Information to assist in the process will come from course evaluations, student and faculty focus groups, and course reviews conducted by curriculum committees.
A Curriculum Designed for Significant Learning
Brenda Roman, M.D.

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Members of the Wright Curriculum Steering Committee at WSU-BSOM and L. Dee Fink, Ph.D., Professional and International Consultant in Higher Education

Background
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- In recent years, L. Dee Fink’s (2003) “Taxonomy of Significant Learning” has informed higher education curriculum planning. While the Boonshoft School of Medicine (BSOM) has utilized Fink’s concepts, including backward design to develop individual courses, utilizing his model as a framework for reforming a medical school curriculum is novel.

Purpose
The purpose of this project is two-fold:
1. Use the “Taxonomy of Significant Learning” as the framework in constructing the educational objectives.
2. Use the concept of backward design to construct the milestones for each of the educational phases, followed by the identification of the assessment activities, and finally delineate the teaching and learning activities.

Approach
- The Wright Curriculum Steering Committee re-framed the educational objectives using L. Dee Fink’s “Taxonomy of Significant Learning.” In doing so, we discovered that his descriptions of significant learning aligned with the six ACGME core competencies. After these educational objectives were completed, work began on drafting the milestones for each of our educational phases (Foundations of Clinical Practice, Doctoring, and Advanced Doctoring), which will soon be completed.
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Next Steps
- Steering Committee to meet biweekly in order to focus greater effort on this process; develop guidelines for Task Forces regarding teaching/learning methods
- Review report from the Assessment Committee
- Identify members of each content task force; reports expected back to the Steering Committee within six months
- Pilot project of Early Clinical Experiences
- Pilot project of integrated neurology/internal medicine clerkship

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