Coaching LEND Faculty in Implementing Team-Based Learning across Two States: Lessons Learned over Four Years

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Background

NH-ME LEND adopted Team-Based Learning beginning in fall 2014 to:

- Use a consistent instructional methodology and coordinate instruction across content modules among all faculty
- Actively engage a diverse group of learners
- Strengthen trainees' mastery of content, critical thinking skills, and interdisciplinary team work
- Maximize face-to-face time and the use of technology

UNH and UMaine LEND trainees and faculty engage in team-based learning during weekly seminars via video conferencing using Zoom technology

Core Elements of Team-Based Learning

"A special form of collaborative learning using a special sequence of individual work, group work, and immediate feedback to create a motivational framework in which students increasingly hold each other accountable for coming to class prepared and contributing to the discussion." - Michael Sweet (n.d.)

- Review of goals and expectations
- Forming permanent teams of 5-7 members (with members from multiple disciplines)
- Learning content through preparation outside of class
    - Readings
    - Lecture capture
    - Website reviews
- Accountability – Readiness assurance process
    - Individual Readiness Assurance Test (iRAT)
    - Team Readiness Assurance Tests (tRAT)
- Frequent and timely feedback including peer evaluation
- In-class activities
    - Small amount of time clarifying concepts from readings
    - Case-based applications (significant problem, specific decision)
    - Integrative assignment in which teams work on assignment addressing content from entire module.

Unique Obstacles to Faculty Implementing Team-Based Learning in NH-ME LEND

- TBL considered ideal in situations with high student to faculty ratio. (Fatima, et al, 2013; Clark, Nguyen; Mennenga, 2013). The NH-ME LEND has a very high teacher to student ratio.

- It can be difficult to get "buy-in" by all faculty when the number of faculty is large (Allen et al., 2013). The NH-ME LEND faculty is relatively large.

- It can be difficult to create assignments that challenge all team members of diverse teams, support active participation by all team members, while integrating content from all faculty.

- Research suggests that TBL is implemented most effectively on a single campus. In addition to having a large faculty, the faculty are from three different campuses in two states.

Steps Taken to Improve Faculty Skills in Implementing Team-Based Learning (TBL)

- TBL strongly **endorsed** by the Program Director and Management Team.
- **Rigorous evaluation** and continuous improvement process for TBL implemented.
- **Outside consultant** provided initial and follow-up training during faculty meetings on implementing TBL.
- Worked with faculty to help them move away from traditional lecture format in class to **mini-lectures and team-based activities**.
- Discussed TBL and its implementation at **faculty meetings.**
- Encouraged faculty to define **clear learning outcomes** for each content module.
- Worked with faculty on collaborating to identify "table of contents" readings and developed reading guides based on the learning outcomes to balance **quality** vs. **quantity** of preparation materials.
- Developed faculty skills in writing readiness assurance **test questions** using Bloom's Taxonomy to improve the assessment process and to ensure focus on content discussions.
- Provided instruction and feedback to faculty in an effort to increase skill and comfort levels to focus on key concepts during "**mini-lectures**" to support **case application activities.**
- Addressed in faculty team meetings the specific ways in which **team-based learning activities and case-based applications** could be used to improve the capacity of trainees to provide culturally-competent and family-centered care in an increasingly diverse society.

Faculty Satisfaction with Team-Based Learning
Faculty Agreeing or Strongly Agreeing with Team-Based Learning Items on End-of-Year Evaluations

	2016	2017	2018
Faculty had sufficient support and guidance on iRAT	60	73	70
Faculty had sufficient support and guidance on tRAT	93	93	64
iRAT contributed to trainee professional leadership goals	93	87	64
tRAT contributed to trainee professional leadership goals	73	100	80
Trainees gained advanced interdisciplinary teamwork skills as a result of TBL that better prepared them for workforce	73	93	90
TBL contributed to trainees' achieving leadership goals related to interdisciplinary teamwork	100	100	90

LEND trainees share their discussions based on case-based application activities

Recommendations for Other LEND Programs Seeking to Implement TBL

- To ensure "buy-in" provide extensive instruction on team-based learning to all faculty members prior to implementing Team-Based Learning.

- Provide ongoing support to faculty on the development of TBL materials, especially Readiness Assurance Tests.

- Provide follow-up instruction to faculty that addresses any concerns or issues they have after they have begun to implement Team-Based Learning.

- Incorporate hands-on activities into faculty instruction that provides faculty members with opportunities to write readiness assurance test questions and to identify components of case applications.

- Work with faculty to identify the key learning concepts for each module or unit.

- Work with faculty to identify the "table-of-contents" level knowledge for various units or modules.

- Provide support and feedback to faculty so that they can write readiness assurance test questions that assess both table of content knowledge and, at the same time, engage the trainees in **complex and challenging case application activities** to integrate content and foster leadership skills.

- Assess faculty satisfaction with Team-Based Learning and make adjustments to the process.