This document provides a summary of the RAE program, its purpose, activities, workshop topics and program faculty.

**RAE Program**

**Description**

revised 05.26.2015

Karen Spear Ellinwood, PhD
Curriculum Outline for RAE Program

Contents
Program Description ........................................................................................................................................... 1
Target Audience ............................................................................................................................................... 1
Program purpose .............................................................................................................................................. 1
Alignment with relevant ACGME Competencies ......................................................................................... 2
Participant Goals and Learning Objectives ............................................................................................... 3
Program Faculty ............................................................................................................................................... 5
RAE Program participation ............................................................................................................................ 5
  Contact for Resident and Faculty Instructional Development ................................................................. 5
Office of Resident Development - Educational support for residents .................................................... 6
  Contact for Resident Development ........................................................................................................... 6
Appendix A: Examples of Workshops Topics ............................................................................................... 7
APPENDIX B: IV.A.5. ACGME Competencies ............................................................................................ 9
  IV.A.5.a) Patient Care ............................................................................................................................... 9
  IV.A.5.b) Medical Knowledge .................................................................................................................. 9
  IV.A.5.c) Practice-based Learning and Improvement .............................................................................. 9
  IV.A.5.d) Interpersonal and Communication Skills ............................................................................... 9
  IV.A.5.e) Professionalism ......................................................................................................................... 10
  IV.A.5.f) Systems-based Practice ........................................................................................................... 10
RAE Program Description

Program Description

The Residents as Educators (RAE) program is a voluntary, instructional development program that began in the 2013-14 academic year to assist residents in understanding and fulfilling their role as clinical educators.

The program assists residents as well in complying with the University of Arizona College of Medicine’s (CoM) policy on instructional development and the CoM in complying with the LCME requirement to provide residents with opportunities for educator development.

Clinical departments may request instructional development and support for residents as educators at any time by contacting Dr. Karen Spear-Ellinwood, Director, Faculty instructional development.

The RAE program was developed by Dr. Spear-Ellinwood, in response to resident feedback derived from the Residents as Educators Orientation exit surveys in 2012 and 2013, and Dr. Spear-Ellinwood’s survey (2011-12) of multiple stakeholders concerning the instructional development needs of residents, with input from Gail Pritchard, PhD, interim senior learning specialist for resident development. Since its inception the specific content of RAE Program activities has been enhanced by ongoing observations of clinical teaching in several departments at the Banner University Hospital, university and south campuses.

Target Audience

The Residents as Educators Program is open to all residents in all departments at university and south campuses.

Program purpose

The purpose is to provide flexible, responsive and evidence-based instructional development programming for residents in all departments and on all services at the university and south campuses.

Educational interventions are targeted to respond to the specific concerns and needs of each department or service within departments. Thus, in partnership with residency program directors and in consultation with clerkship directors, we will identify strengths and needs for improvement by conducting a careful review of de-identified student feedback surveys or evaluations of relevant clerkship programs, direct observations of resident teaching in a variety of clinical settings, and input from residents and residency and clerkship program directors.

UA COM policy requires residents to engage in continuing educator development each year they are in residency. While departments provide some workshops or didactic sessions to develop or enhance these skills, few programs have formalized instructional development programs designed for resident teachers. Thus, the RAE Program aims to support residency programs in
satisfying UA COM policy requirements as well as ACGME expectations for educator development\(^1\). Link to policy

This program, then, offers opportunities for residents to familiarize themselves with strategies for building on what medical students are learning in preclinical years of the undergraduate medical education program. They learn straightforward educational frameworks for teaching and giving constructive and formative feedback in clinical settings.

The RAE Program emphasizes the mutuality of teaching and the role of reflection in teaching, learning and medical practice. Therefore, resources and activities are aimed at promoting reflection on the practice of teaching and residents’ role as educators, and exploration of the connection between respectful, professional teacher-learner relations and effective learning outcomes.

Alignment with relevant ACGME Competencies

The ACGME is the accrediting institution for graduate medical education and establishes standards designed to promote residency educational missions that ensure safe patient care “in a humane environment that fosters the welfare, learning, and professionalism of residents” (Accreditation Council for Graduate Medical Education 2012, 2). Clinical Learning Environment Review (CLER) teams focus on six areas including professionalism, monitoring whether institutions are educating for professionalism and “monitor behavior on the part of residents and faculty and respond to issues concerning … the integrity in fulfilling educational and professional responsibilities, among other things” (66).

Residency program curricula must adhere to the ACGME competencies (IV.A.5) by engaging residents in activities that are “an appropriate blend of supervised patient care responsibilities, clinical teaching, and didactic educational events” aimed at achieving program learning objectives (VI.A.4.a). Residents must have adequate opportunity to develop and enhance their abilities as educators while delivering patient care and improving medical knowledge.

\(^1\) The ACGME competencies are listed and defined in the appendix.
More recently, “specialty groups [within the ACGME] developed outcomes-based milestones for resident performance within the six domains of clinical competence” (ACGME, ND). The milestones describe in more detail, and as a progression from novice to program completion, the expectations for resident and fellow performance. Each specialty’s milestones include an expectation for teaching and learning how to teach medical students. With this in mind, the RAE Program has aligned its curriculum primarily with the following ACGME competence areas:

1. Practice-based learning & Improvement;
2. Interpersonal & Communication Skills;
3. Professionalism;
4. Systems-based Practice.

The following section outlines global learning objectives for all program participants as aligned with these ACGME competence areas.

**Participant Goals and Learning Objectives**

All participants should outline a plan and describe strategies for: a) assisting students in developing a plan for improvement; b) self- and peer-assessment of teaching and assessment skills; and c) continuing instructional development. The specific learning objectives below are applicable to program participants and aligned with the ACGME competence areas.

**1) Practice-based learning & Improvement**

a) Practice and demonstrate effective strategies for teaching in clinical settings.

b) Engage in reflection on teaching, assessment and feedback to include the following:

   1. Engage in reflective feedback discussions with peers;
   2. Identify concepts of and strategies for improving time management;
   3. Describe application of strategies to particular clinical contexts.
   4. Reflect on and self-assess strengths for teaching;
   5. Identify strategies for improving teaching practices.

**2) Interpersonal & Communication Skills**

a) Describe the importance of building and how to cultivate effective teacher-learner relations with medical students. Residents will demonstrate behaviors that:

   i) Engender mutual respect

   ii) Build trust
iii) Inspire confidence

3) **Professionalism**

a) Articulate and demonstrate principles and practices of:
   
   i) Respectful relations with patients, students and health care professionals,
   
   ii) Self-managed professional learning, and
   
   iii) Patient education and relationships;

b) Offer a role model for professional clinical practice;

4) **Systems-based Practice**

a) Articulate and demonstrate principles and practices of:
   
   i) Respectful inter-professional relationships;
   
   ii) Time management;
   
   iii) Cost-effectiveness balanced with effective patient care;

b) Explain how HIPAA and FERPA may impact teaching medical students at affiliate sites.

5) **Integrate technology into teaching practice, including the following:**

   a) Identify technologies for effective teaching;

   b) Describe strategies for integrating technology in teaching at the bedside or office practice;

   c) Explain how HIPAA and FERPA may impact the use of technology in teaching at affiliate sites.
RAE Program Curriculum Outline

Program Faculty

The RAE Program faculty consists of several highly qualified, education professionals at the UA College of Medicine, identified below.

<table>
<thead>
<tr>
<th>Dr. Karen C. Spear-Ellinwood</th>
<th>T. Gail Pritchard, PhD</th>
</tr>
</thead>
<tbody>
<tr>
<td>Director, Faculty Instructional Development</td>
<td>Senior Interim Learning Specialist</td>
</tr>
<tr>
<td>Assistant Professor, Obstetrics &amp; Gynecology</td>
<td>Assistant Professor, Pediatrics; Interim Senior Learning Specialist</td>
</tr>
</tbody>
</table>

Biosketch

The RAE Program also consults with and activities may include clinical educators from within the departments for whom the activities are conducted.

RAE Program participation

If you would like the residents in your program or department to participate, we will meet with you to outline a plan for conducting an instructional development needs assessment. Following the needs assessment we will issue you a report and recommend program topics, activities and a schedule. The schedule is determined by agreement with program directors and will vary from one department to another. We recommend 1-hour sessions, conveniently integrated into the residency program didactic schedule. We also conduct 2-hour sessions or retreats of longer duration.

Contact for Resident and Faculty Instructional Development

For more information or to start residents in your department in the RAE Program, please contact:

Dr. Karen C. Spear-Ellinwood
Director, Faculty Instructional Development
Assistant Professor, Obstetrics & Gynecology
kse@medadmin.arizona.edu
520.626.1743
Office of Resident Development - Educational support for residents

The Office of Resident Development provides the following individual services to assist residents in developing learning strategies and test-taking and communication skills:

- Creating a Curriculum Vitae, Personal Statement, and/or Cover Letter;
- Developing an Effective Study Schedule for STEP 3, In-Service Exams, and Specialty Boards;
- Project Development—i.e. Efficiently reading and reviewing research articles; synthesizing literature into comprehensive reviews; effective preparation for group presentations; and
- Question Bank Guided Practice.
- Strategies for Studying, Test-taking, Time Management, Organization, Communication, and Anti-Anxiety

The Office of Resident Development offers a variety of workshops at the department level to assist Residents and Fellows in developing strategies and skills to improve educational experiences. Below are examples of workshops offered:

- Anti-Anxiety Strategies;
- Communication Skills Development;
- Organization/Time Management Strategies;
- Study Strategies; and
- Test-taking Strategies.

Contact for Resident Development

T. Gail Pritchard, PhD
Senior Interim Learning Specialist
Assistant Professor, Pediatrics; Interim Senior Learning Specialist
tpritcha@medadmin.arizona.edu
Appendix A: Examples of Workshops Topics

The following is a list of workshop topics that could be included in RAE Program activities.

1. **An Introduction to Teaching**
   
   **1.1. Teacher Identity: Building confidence**
   
   1.1.1. What does good teaching look like?
   
   1.1.2. How do I know what to teach?
   
   1.1.3. Reflective Teaching: Tools for modeling Reflective Clinical Practice and Self-managed Professional Learning

2. **Teaching Essentials: B-D-A Approach, RIME, and Microskills 5 Plus 5!**
   
   2.1. Applying a BDA approach to reflective teaching: Strategies for BEFORE, DURING & AFTER patient encounters
   
   2.2. Integrating the RIME Framework in Teaching and Assessing Medical Students
   
   2.3. Microskills 5: A Learner-Centered Approach to Inquiry-based Teaching/Learning in Clinical Settings [small group teaching process]
   
   2.4. Microskills Plus 5! The Reflective Feedback Conversations – How to give constructive feedback and criticism
   
   2.5. Formative Feedback Essentials (Engaging students in “reflective feedback conversations” (Cantillon & Sargeant, 2008)).
   
   2.6. Narrative feedback to include in assessments of medical student performance

3. **Inquiry-based Teaching Strategies**
   
   3.1. Formulating and using effective questions for bedside teaching
   
   3.1.1. A taxonomy of question types
   
   3.1.1.1. Convergent v. Divergent questions
   
   3.1.1.2. Questions on a cognitive scale
   
   3.1.1.3. Question circles
   
   3.1.1.4. Cognitive dimensions (factual, procedural, conceptual, metacognitive)
   
   3.1.1.5. Psychosocial factors in guided inquiry learning
   
   3.1.1.5.1. Educational strategies for creating psychological safety
   
   3.1.1.5.2. Phrasing questions to frame the issues
   
   3.1.1.5.3. Strategic Wait Time: Getting comfortable with and using silence
3.1.1.5.4. Sequencing
3.1.1.5.5. “Rapid reward”
3.1.1.5.6. Balance
3.1.1.5.7. Life lines
3.1.1.5.8. Think, Pair, Share & Compare
3.1.1.5.9. Motivating students to engage beyond peripheral participation

4. Cultivating Effective Teacher-Learner Relations

4.1. Essential Communication Skills: Public Speaking, Presentation & Professionalism
4.2. Professionalism – Patience, Positive Attitude, Respect, Trust & Confidence: A Tall (But Necessary) Order
4.3. Accounting for Bias in Teaching
4.4. Intercultural Communication
4.5. Compassionate (Reflective) Teaching in Stressful Clinical Situations

5. Time Management

5.1. Part 1: Academic Medicine is Smart Medicine™: But how do I balance Clinical & Teaching Practice?
5.2. Part 2: Teaching Fatigue: How to Manage It or How to Muster Enthusiastic Teaching Mojo?
5.3. Part 3: Strategies for Teaching Challenging Students

6. Teaching with Technology

6.1. Using audience response software to promote reflective practice
6.2. Using case-based learning to prepare students for performing procedures or conducting patient interviews
6.3. Using technology as a formative feedback tool
6.4. Reflective electronic journaling for clinical educators and students
APPENDIX B: IV.A.5. ACGME Competencies

IV.A.5.a) Patient Care

Residents must be able to provide patient care that is compassionate, appropriate, and effective for the treatment of health problems and the promotion of health. Residents: [As further specified by the Review Committee].

IV.A.5.b) Medical Knowledge

Residents must demonstrate knowledge of established and evolving biomedical, clinical, epidemiological and social behavioral sciences, as well as the application of this knowledge to patient care. Residents: [As further specified by the Review Committee].

IV.A.5.c) Practice-based Learning and Improvement

Residents must demonstrate the ability to investigate and evaluate their care of patients, to appraise and assimilate scientific evidence, and to continuously improve patient care based on constant self-evaluation and life-long learning. Residents are expected to develop skills and habits to be able to meet the following goals:

IV.A.5.c).(1) identify strengths, deficiencies, and limits in one’s knowledge and expertise;
IV.A.5.c).(2) set learning and improvement goals;
IV.A.5.c).(3) identify and perform appropriate learning activities;
IV.A.5.c).(4) systematically analyze practice using quality improvement methods, and implement changes with the goal of practice improvement;
IV.A.5.c).(5) incorporate formative evaluation feedback into daily practice;
IV.A.5.c).(6) locate, appraise, and assimilate evidence from scientific studies related to their patients’ health problems;
IV.A.5.c).(7) use information technology to optimize learning; and,
IV.A.5.c).(8) participate in the education of patients, families, students, residents and other health professionals.

IV.A.5.d) Interpersonal and Communication Skills

Residents must demonstrate interpersonal and communication skills that result in the effective exchange of information and collaboration with patients, their families, and health professionals.
Residents are expected to:

IV.A.5.d).(1) communicate effectively with patients, families, and the public, as appropriate, across a broad range of socioeconomic and cultural backgrounds;

IV.A.5.d).(2) communicate effectively with physicians, other health professionals, and health related agencies; IV.A.5.d).(3) work effectively as a member or leader of a health care team or other professional group;

IV.A.5.d).(4) act in a consultative role to other physicians and health professionals; and,

IV.A.5.d).(5) maintain comprehensive, timely, and legible medical records, if applicable.

[As further specified by the Review Committee]

**IV.A.5.e) Professionalism**

Residents must demonstrate a commitment to carrying out professional responsibilities and an adherence to ethical principles. Residents are expected to demonstrate:

IV.A.5.e).(1) compassion, integrity, and respect for others;

IV.A.5.e).(2) responsiveness to patient needs that supersedes self-interest;

IV.A.5.e).(3) respect for patient privacy and autonomy;

IV.A.5.e).(4) accountability to patients, society and the profession; and,

IV.A.5.e).(5) sensitivity and responsiveness to a diverse patient population, including but not limited to diversity in gender, age, culture, race, religion, disabilities, and sexual orientation.

[As further specified by the Review Committee]

**IV.A.5.f) Systems-based Practice**

Residents must demonstrate an awareness of and responsiveness to the larger context and system of health care, as well as the ability to call effectively on other resources in the system to provide optimal health care. Residents are expected to:

IV.A.5.f).(1) work effectively in various health care delivery settings and systems relevant to their clinical specialty;

IV.A.5.f).(2) coordinate patient care within the health care system relevant to their clinical specialty;
IV.A.5.f).(3) incorporate considerations of cost awareness and risk-benefit analysis in patient and/or population-based care as appropriate;

IV.A.5.f).(4) advocate for quality patient care and optimal patient care systems;

IV.A.5.f).(5) work in interprofessional teams to enhance patient safety and improve patient care quality; and,

IV.A.5.f).(6) participate in identifying system errors and implementing potential systems solutions.

[As further specified by the Review Committee]

---