# **Educational Scholars Program of the Academic Pediatric Association**

# INSTRUCTIONS FOR EDUCATOR PORTFOLIO TEMPLATE

**Authors:** Constance Baldwin, PhD; Latha Chandran, MD, MPH; Alix Darden, PhD; Virginia Niebuhr, PhD; Elizabeth Goodman, MD; Ross Myers, MD; and the Curriculum Committee of the Academic Pediatric Association's Educational Scholars Program.

These instructions accompany our **Educator Portfolio Template**, which has been developed and tested over 15 years by the APA's Educational Scholars Program (ESP), and was published in MedEdPortal in 2007 (Maryellen Gusic, MD; Latha Chandran, MD MPH; Dorene Balmer, PhD; Donna D'Alessandro, MD; Constance Baldwin, PhD, and the Curriculum Planning Task Force of the Academic Pediatric Association's Educational Scholars Program. [https://www.mededportal.org/publication/626/).

# INTRODUCTION TO THE DEVELOPMENTAL EDUCATOR PORTFOLIO (EP)

# What is the difference between a developmental and a promotional EP?

Our EP template is designed for a *developmental portfolio* that will systematically organize a compendium of information that you can later use to create a *focused promotional EP*. A developmental portfolio is a robust summary of data about all your educational activities; it can also help you plan and reflect upon your career as an educator. A promotional EP, in contrast, is shorter and includes specific information selected to define the focus and most significant contributions of your career as an educator at a specific point in time. The precise format, length, and content of promotional EPs differs from institution to institution. A useful article on writing an EP can be found at <a href="https://www.aamc.org/professional-development/affinity-groups/gfa/faculty-vitae/educator-portfolio-tool">https://www.aamc.org/professional-development/affinity-groups/gfa/faculty-vitae/educator-portfolio-tool</a>.

An Educator Portfolio (EP) will help you document your major teaching activities and their results for three purposes:

- 1. Your developmental EP will help you gain a broad perspective on your educational activities, track your evolution as an educator over time, and plan your career strategically.
- 2. Your promotional EP is a critical tool to help you achieve promotion and advancement as an educator. All educators need to learn how to plan and "market" their work, so they can attain status and visibility among their academic peers.
- 3. For your institution, your EP, along with your CV, will be a key source of information on your career as an educator. It will document the quality of your educational contributions, so your employers can judge the institutional value of your work and its importance in the broader field of education.

# What is included in an Educator Portfolio?

Your developmental EP is a statement of your educational strengths and innovations that reflect your personal skills and accomplishments. It is organized around the following 5 domains:

- I. TEACHING
- II. ASSESSMENT OF LEARNERS
- III. CURRICULUM DEVELOPMENT
- IV. MENTORING AND ADVISING
- V. EDUCATIONAL LEADERSHIP AND ADMINISTRATION
- PLUS: PRODUCTS OF EDUCATIONAL SCHOLARSHIP

While an EP may include all of the 5 domains, you should complete **ONLY** those domains that pertain to your educational activities. Most educators modify their EP over time, adding new sections as their work evolves. This is what makes it a developmental EP.

Updated 1-3-2020

The final section of the EP, **Products of Educational Scholarship**, is relevant to all domains. As an educator primed for promotion, you should aim to add over time increasing numbers *of peer reviewed products* associated with your relevant domains of educational activity. These products (papers, presentations, workshops, published tools, etc.) are important because academic promotions committees place a high priority on scholarship. If your EP does not address educational scholarship, think about how to develop this critical part of your career in the future.

Taken as a whole, your EP should convey to reviewers the *quantity, quality, impact and scholarly nature* of your educational work. The Educator Evaluation Guidelines (see below, Useful Resources) lay out specific indicators for these key criteria for educational excellence in each domain.

Your developmental EP will be invaluable in the future. It can be used to create applications for promotion/tenure, teaching awards, teaching academic memberships, educational grants, or new jobs. To enhance its value, keep your developmental EP <u>current</u> and <u>complete</u>, so you have a trustworthy master file of all your work to choose from, when you want to create a promotional EP for a specific purpose. We recommend a yearly revision of your EP. Many important documents (e.g., learner and peer evaluations) will exist nowhere except in this personal file that describes your work.

EPs are not used for promotion at every institution, and they are still a "work in progress" at a national level (ref 2)), so we continue to make periodic improvements in this developmental EP template.

We welcome your suggestions for improvement: contact Ross Myers, MD: Ross.Myers@UHhospitals.org

# **USEFUL RESOURCES**

The **Educator Evaluation Guidelines** offer a detailed list of evaluation criteria that can help you document a scholarly approach to education (quantity, quality, impact) and describe your products of educational scholarship. The Guidelines were originally designed for EP evaluators, but are equally useful for EP writers. We recommend that you refer to the Educator Evaluation Guidelines as you write your narrative comments for each domain of educational activity included in your developmental EP.

An additional resource that will provide a useful structure for describing your work are **Glassick's Six Standards of Excellence in Scholarly Work** (ref 6). Glassick's criteria are widely used by educators to evaluate or demonstrate quality.

- 1. Clear goals: stated purpose, realistic objectives, important questions
- 2. Adequate preparation: understanding of literature, appropriate skills, needed resources
- 3. Appropriate methods: choice of methods that match goals, effective use and flexible application of methods
- 4. Significant results: goals are achieved, results are important, field is advanced
- 5. Effective presentation: presentation well organized, forums appropriate, message clear and sound
- 6. **Reflective critique:** work critically evaluated, supported with good evidence, evaluation used to improve future studies

# The following websites include ideas, examples, and references for EP writers:

- https://meded.ucsf.edu/faculty-educators/educators-portfolio
- https://www.aamc.org/professional-development/affinity-groups/gfa/faculty-vitae/educator-portfolio-tool
- <a href="http://www.ucdenver.edu/academics/colleges/medicalschool/facultyAffairs/Documents/DossierBuildingG">http://www.ucdenver.edu/academics/colleges/medicalschool/facultyAffairs/Documents/DossierBuildingG</a> uide2014.pdf
- https://www.augusta.edu/mcg/pandt/documents/eptemplate.pdf
- http://edo.med.miami.edu/the-educators-portfolio/subsect-portfolio-guidelines

# **GUIDELINES FOR WRITING EACH COMPONENT OF YOUR PORTFOLIO**

# **EDUCATIONAL PHILOSOPHY STATEMENT**

In ½ to 1 page, describe your approach to education and the principles that underlie your teaching. For example, you might discuss your personal theory of learning, characteristics of a good teacher and a good learner, your view of the roles and responsibilities of students and teachers, the aims of instruction and how these might change under different conditions, or environmental factors that promote or impede learning. This statement should spring from careful reflection on your educational strengths and practice. Illustrate your principles with examples from your own teaching, to show how they are related and have evolved over time. Some reflection questions to help you plan your educational philosophy statement can be found at <a href="https://www.aamc.org/professional-development/affinity-groups/gfa/faculty-vitae/educator-portfolio-tool">https://www.aamc.org/professional-development/affinity-groups/gfa/faculty-vitae/educator-portfolio-tool</a>. Examples of educational philosophy statements can be found on some of the websites listed above.

Writing an educational philosophy statement can be challenging for early career educators. Expect to revisit this statement and revise it in the future, as you add to your EP.

# PERSONAL GOALS AS AN EDUCATOR

This list might include both aspirations for achievement and plans for learning and growth, ideally linked together. Keep the list brief and focused. Consider discussing your goals with your mentor(s), and plan to revise your goals periodically as you update your EP.

As you develop your EP over the years, your philosophy statement and personal goals offer a good opportunity to reflect on the distribution, quality and quantity of your educational activities and contributions. This reflection might include examining your philosophy in relation to the evidence of your educational efforts, and considering ways to enhance your scholarly productivity and impact.

# DOMAINS OF AN EDUCATOR PORTFOLIO

### **SECTION I: TEACHING**

**Description of Teaching Activities:** The grid gives you a place to list all your important teaching activities: not only lectures, but also teaching that encourages active learning, e.g. interactive lectures, clinical precepting, small group sessions, journal clubs, and workshops. (Mentoring and advising go in Section IV.) You can include learners across the training continuum, from students to faculty and community educators.

Teaching Activity EXAMPLE	
Teaching Activity (title or topic)	Workshop on Career Advancement
Dates Taught	2007-2009
Teaching Strategy and Context	Part of Faculty Development Program series
Where Taught	Institution
Total Teaching Hours/Year	4 workshops/yr @ 3 hr each =12 hrs /yr
Type of Learner	Faculty affiliated with med school
Number of Learners/Year	70 faculty
Evaluation process	Created an evaluation sheet for qualitative and quantitative feedback
	from participants
Evaluation Summary	High ratings averaging 4.5 out of 5; numerous positive written
	comments*

<sup>\*</sup>Specific evaluation data could be included in an Appendix to EP.

**Note on the grid format used above:** Some may prefer to convert the horizontal tables in the template to vertical tables. This would save space and may facilitate reviewers' summarization of numerical data. Below

Updated 1-3-2020

you can see what the teaching grid would look like in vertical format. You can easily do the same conversion for other horizontal tables.

Teaching Activity (title or topic)	Dates Taught	Teaching Strategy and Context	Where Taught	Total Teaching Hours/Year	Type of Learner	Number of Learners/ Year	Evaluation process	Evaluation Summary

**Teaching Evaluations**: Teaching evaluation data can be difficult to obtain. Make an effort to gain access to evaluation summaries for the courses you teach. Ideally, one should provide information on your teaching evaluations for each course/setting in which you teach (referring to the Activity Numbers from the Teaching Activities Grid). If available, provide data on how your teaching evaluations compare to those of your peers (e.g. personal mean score vs mean scores of other departmental faculty).

You need not depend exclusively on institutional evaluations of your teaching. You can invite peers or educational experts to review your work, and/or collect formative feedback from learners (verbal or written).

**Teaching Awards:** In addition to including information in the grid below, you could use an appendix to provide data such as reviewer comments on your portfolio of work.

Teaching Awards EXAMPLE				
Name	Date Received	Sponsoring organization	Level of award	Criterion for award
Aesculapius Teaching award	2005	School of Medicine, Stony Brook University Medical Center	Institutional	Given yearly to two or three outstanding educators in the SOM based on educator portfolio and supporting letters

**Narrative overview of Teaching Domain (1-2 paragraphs).** You may wish to choose 1-2 focal activities in this domain for more detailed comment. Include description of the importance, creativity, innovation, and impact of these activities (identify by Activity Number from the Teaching Activities Grid). Include comparative data (internal and external benchmark data) if available.

We recommend that you refer to the **Educator Evaluation Guidelines**, Teaching domain (Items 1-7) for guidance in writing this section. How well does your documentation allow evaluation of the quantity, quality and impact of your work? Glassick's six criteria may also be useful. How well have you established your scholarly approach and products of scholarship? You may also wish to share your reflections on teaching activities: e.g. has your evaluation of them led to change in your educational practice?

# **SECTION II: ASSESSMENT OF LEARNERS**

**Description and Evaluation of Activities:** The grid in this section focuses on learner assessment methods you have developed or employed. If appropriate, you can cross-reference to your teaching activities grid, but many educators evaluate learners in settings where they do not teach (e.g. development of Objective Structured Clinical Evaluations for a clerkship). If you use the same assessment method in multiple settings, indicate those settings under "Context of Assessment," rather they repeating them in separate grids. You will get more promotion "credits" for developing and validating a new assessment method than using one developed elsewhere.

# **Learner Assessment Grid EXAMPLE**

Updated 1-3-2020

Assessment Method	Direct observation and one-on-one feedback
Context of Assessment	Student evaluation in outpatient clinic
Assessment Role	Implementation
Number and types of	2 students, 1x/ mo= 24 students/yr
learners assessed per year	
Miller's Triangle Level *	Does
Evidence of teaching	With feedback, most students achieve competence in history and physical
effectiveness	examination skills at the level expected for a third year medical student.

\*Miller's Triangle, shown below, is a commonly used framework for learner assessment (ref 11). Other frameworks for assessment may be used, if preferred. Not all learning is amenable to the kind of concrete evaluation implied by Miller's framework. Evaluations that are restricted to observable or measurable behaviors may overlook important aspects of physician performance that are best evaluated qualitatively. For example, developing professional skills such as taking responsibility, empowering team members, or being sensitive to patient's cultural values are important but not easy to document by observation.

# Miller's Triangle



Does: Chart audit, portfolio, direct observation (masked/unmasked), also patient outcomes

Shows how: High fidelity simulation, OSCE

**Knows how**: Case Presentations, Low fidelity simulations

**Knows**: Multiple-choice question examination

Miller, GE. Acad Med, 65(supp); Sept 1990

Narrative overview of Learner Assessment Domain (1-2 paragraphs). You may wish to choose 1-2 focal activities in this domain for more detailed comment. Include description of the importance, creativity, innovation, and impact of these activities.

We recommend that you refer to the **Educator Evaluation Guidelines**, Learner Assessment domain (Items 8-10) for guidance in writing this section. How well does your documentation allow evaluation of the quantity, quality and impact of your work? Glassick's six criteria may also help you assess how well you have established your scholarly approach and described products of scholarship. You may wish to share your reflections on the results of your learner assessments: e.g., have they changed the way you teach?

### SECTION III: CURRICULUM DEVELOPMENT

**Description of Activities:** Curriculum development varies in scope from creation of a series of 3-4 instructional sessions to development of a residency rotation to creation of an entire program (clerkship, multi-year faculty development program). This section has two parts: description of the curriculum in context in grid format, and evaluation of its quality using the GNOME Framework (described below). We suggest that you include all your curriculum development activities in the grid, but we recommend that you focus your qualitative evaluation on 1-2 focal examples of your best work in this area.

Curriculum Development EXAMPLE			
Curriculum topic and type	Seminar series (4x1.5 hr) on academic writing		
Type and # of learners/yr	10 gen pediatrics and adolescent med fellows per year		
Is it implemented?	Yes, every other year		
Where has it been	Department		
implemented?			

Updated 1-3-2020

Your degree of	Developer of curriculum and instructor
responsibility (leader or	
contributor)	
Curriculum description	Published online

**Evaluation of Activities:** The EP template uses the GNOME Framework to structure an assessment of curriculum quality. This framework, which was developed by Kenneth Roberts (ref 12), is a simplified version of Kern's Curriculum Development for Medical Education: A Six Step Approach (ref 13) The GNOME includes five curricular elements: G = Goals, N = Needs, O = Objectives, M = Methods, E = Evaluation. One can assess indicators of quality for each element, as described below.

- o Goals and Objectives: The goals are appropriate in scope, objectives are specific and measurable
- Needs assessment of learners: Curricular design uses learner needs assessment to choose and refine goals and objectives and instructional methods, uses learner assessment data to refine needs assessment
- Teaching /Learning Methods: Curricular design includes variety of methods that address educational
  qualstant and appear of the second se
- o **Learner Assessment and Feedback**: Curricular design includes valid reliable feasible and appropriate learner assessment methods. Incorporates formative feedback in design
- Curriculum/Program Evaluation: Curriculum is evaluated periodically using valid reliable, feasible
  and appropriate evaluation tools and modified based on the results of such evaluation

Curriculum Design: Assessment of Quality EXAMPLE		
GNOME* Elements	Evidence of Quality	
Goals/objectives	I have written educational goals and objectives for the fellowship in area of scientific communications, based on my extensive practice as a writing instructor for faculty and fellows. Selected objectives were basis of seminar curriculum.	
Learner needs assessment	Fellows participated in selection of focal goals; I selected objectives based on my knowledge of fellows writing needs (personal mentoring of Gen Peds fellows and junior faculty). Discussion by fellows helped to guide focus of each seminar.	
Teaching/learning methods	Methods include didactic presentation, extensive use of authentic examples with interactive discussion, practice with feedback, and distribution of individual practice materials for post-seminar reinforcement.	
Learner evaluation and feedback	All fellows receive mentoring on their written products (abstracts, papers, grant proposals), with extensive feedback from 2-3 or more faculty on evolving documents. Final evaluation is the peer review system itself. An objective system for analyzing learners' written products in relation to specific seminar objectives is under development.	
Curriculum/program evaluation	Seminar evaluations, as well as learner comments during and after the class, are carefully reviewed with every iteration to improve the seminar.	

Narrative overview of Curriculum Development Domain (1-2 paragraphs). You may wish to choose 1-2 focal activities in this domain for more detailed comment. Include description of the importance, creativity, innovation, and impact of these activities.

We recommend that you refer to the **Educator Evaluation Guidelines**, Curriculum Development domain (Items 11-13) for guidance in writing this section. How well does your documentation allow evaluation of the quantity, quality and impact of your work? Glassick's six criteria may help you assess how well you have established your scholarly approach and described products of scholarship. Curricula that have been formally evaluated are particularly well suited to publication in MedEdPortal.

### **SECTION IV: MENTORING AND ADVISING**

**Description and Evaluation of Activities:** This section of the EP is most suitable for inclusion in portfolios of more mature educators, since it takes time for mentees to accrue significant reportable outcomes. However, it is important for early career educators to keep track of their mentees after they move on to other positions, so their outcome data are available later.

Educators who are program directors typically have a large number of learners whom they advise or mentor. These educators should probably include this domain in their developmental EP, and list under outcomes the placement of mentees in training programs or early jobs. That data can be updated later. A developmental EP does not need to include letters from mentees, but these letters can be a very valuable addition to a promotional EP. Collecting these letters for future use is highly recommended. Some educational scholars append a Mentoring Philosophy Statement to this section.

Narrative overview of Mentoring and Advising Domain (1-2 paragraphs). We recommend that you refer to the Educator Evaluation Guidelines, Mentoring and Advising domain (Items 14-16), for guidance in writing this section. How well does your documentation allow evaluation of the quantity, quality and impact of your work? Glassick's six criteria may also be useful to help you describe how you assess the progress of your mentees using a scholarly approach.

# SECTION V: EDUCATIONAL LEADERSHIP AND ADMINISTRATION

**Description of educational leadership and administrative activities.** Examples of past or present leadership roles in education include fellowship/residency/clerkship director or associate director, site director, continuity clinic director, leader of an education subcommittee/curriculum committee, project director on a training grant, or director of a faculty development program. Use the grid to document your depth of involvement and your role in such programs.

A developmental EP does not need to include stakeholder testimonials, but these letters can be an extremely valuable addition to a promotional EP. *Collecting these documents for future use is highly recommended*.

Leadership/Administration EXAMPLE			
Committee or Leadership Role	Level	Dates	Evidence of Quality
Associate Program Director, Pediatric Residency Program, XXX Medical Center	Departmental	Two years (1998-2000)	Improved recruitment, higher test scores, strong
Residency Program Director, Pediatric Residency Program, XXX Medical Center	Departmental	Three years (2001-2004)	accreditation outcomes
Chair, Resident Education Committee	Departmental	2001- present	Developed improved evaluation process for program
Chair, Medical School Teaching Award Selection Committee	Institutional	Two years, 2005, 2006	Developed improved criteria for selection and revamped application
APA Education Committee	National	Six years	Participated in two successful committee projects, one as leader

**Description of other leadership activities.** Other relevant activities for this section are participation in invited roles at national meetings (e.g. reviewer or moderator), or invited reviews for peer reviewed journals. Engagement in professional development activities are also important.

# **Professional Development Activity EXAMPLE**

Updated 1-3-2020

Professional	Educational Scholars Program
<b>Development Activity</b>	
Dates	May 2006-May 2009
Sponsoring	Academic Pediatric Association
Organization/Institution	
Type of Program	Three year educational professional development program culminating in a
	Certification of Excellence in Educational Scholarship
Program description	3 years of didactic and experiential learning activities, including a mentored
	scholarly project producing a peer reviewed product
Professional value or	Peer reviewed outcomes of project included 2 national presentations, a
outcomes	workshop, and an article in a professional journal

Narrative overview of Educational Leadership and Administrative Domain (1-2 paragraphs). You may wish to choose 1-2 focal activities in this domain for more detailed comment. Describe the importance, creativity, innovation, and/or impact of these activities.

We recommend that you refer to the **Educator Evaluation Guidelines**, Educational Leadership and Administrative domain (Items 17-19) for guidance in writing this section. How well does your documentation allow evaluation of the quantity, quality and impact of your work? Glassick's six criteria may help you assess how well you have established a scholarly approach to leadership and developed products of scholarship related to your leadership roles.

### SECTION VI: PRODUCTS OF EDUCATIONAL SCHOLARSHIP

Section VI provides data that is *vitally* important to promotion as an educator. Although you have included relevant information about your scholarly work under each domain, this section allows you to organize information on all products of *educational* scholarship, so they are easily accessible for peer review. Include papers, presentations, workshops, electronic publications, tools published in MedEdPORTAL or elsewhere, and other scholarly products. Peer reviewed products will have the most impact on reviewers.

Do not include here information on clinical or basic science research, which is covered well in your CV. This section is intended to supplement your CV, but **be sure that your CV also accurately and completely describes your educational activities and achievements.** 

In the PUBLICATIONS RELATED TO EDUCATION section of the EP template are table cells for Journal Impact Factors (JIF) and Altmetrics. A JIF refers to the average number of times a paper has been cited in a given journal in the past two years; however, this is only a proxy for the "impact" of the journal, not an individual article. To locate JIFs, your institution needs a subscription to the Journal Citation Reports. Journal quartile information, also found in JCR, which helps to put a JIF in context. Altmetrics, also called article-level metrics, can be useful to provide a more holistic picture of one's impact and reach, as well as provide current information while waiting for citation counts to slowly build. Altmetrics can include measures such as: views and downloads, social media mentions, highly cited papers, and geographic reach of a scholarly product (paper, presentation, video, data sets, etc.). You can find altmetric measures at <a href="https://www.dimensions.ai/">https://www.dimensions.ai/</a> or by installing the Altmetric.com Bookmarklet <a href="https://www.altmetric.com/products/free-tools/bookmarklet/">https://www.altmetric.com/products/free-tools/bookmarklet/</a>. Some individual journals (MedEdPORTAL, PLoS journals) may also provide this information on their website for your journal article, or have similar information about article-level metrics on their websites.

# References and Resources

### Career challenges for educators

- 1. Beasley BW, Wright SM, Cofransesco J Jr, Babbott SF, Thomas PA, Bass EB. Promotion criteria for clinician educators in the United Stated and Canada--A survey of promotion committee chairpersons. *JAMA*. 1997; 278(9):723-8.
- 2. Hoffman LA, Lufler RS, Brown KM, DeVeau K, DeVaul N, Fatica LM, Mussell J, Byram JN, Dunham SM, Wilson AB. A review of U.S. Medical schools' promotion standards for educational excellence. *Teach Learn Med.* 2019, Nov 20:1-10. doi: 10.1080/10401334.2019.1686983. <a href="https://www.ncbi.nlm.nih.gov/pubmed/31746230">https://www.ncbi.nlm.nih.gov/pubmed/31746230</a> (Links to an external site.).
- 3. Thomas PA, Diener-West M, Canto MI, Martin DR, Post WS, Streiff MB. Results of an academic promotion and career path survey of faculty at the Johns Hopkins University School of Medicine. *Acad Med*, 2004; 79:258-264.
- 4. Simpson D, Hafler J, Brown D, Wilkerson, Documentation systems for educators seeking academic promotion in US Medical Schools. *Acad Med.* 2004; 79:783-790.

## Educational scholarship defined

- 4. Boyer EL. Scholarship Reconsidered: Priorities of the Professoriate. Princeton, NJ: Carnegie Foundation for the Advancement of Teaching, 1990.
- 5. Glassick CE, Huber MT, Maeroff G. Scholarship Assessed. San Francisco, CA: Jossey- Bass, 1997.
- 6. Glassick CE. Boyer's expanded definition of scholarship, the standards for assessing scholarship and the elusiveness of the scholarship of teaching. *Acad Med.* 2000;75:877-880.
- 7. Fincher RE, Simpson DE, Mennin SP, et al. Scholarship in teaching: An imperative for the 21st Century. *Acad Med.* 2000; 75:887-894.
- 8. Beattie DS. Expanding the view of scholarship. Introduction. Acad Med. 2000 Spe;75(9);871-876.
- 9. Simpson D, Fincher RE, Hafler JP, et al. Advancing educators and education by defining the components and evidence associated with educational scholarship. *Med Educ*. 2007; 41(10):1002-1009 Epub 2007.
- 10. Simpson D, Fincher RE, Hafler JP, et al. Advancing Educators and Education: Defining the Components and Evidence of Educational Scholarship. Available at:https://tinyurl.com/s86s2g. (Links to an external site.)

### Publications describing "best practices" in the domains of educator activity

- 11. Miller, GE. The assessment of clinical skills/competency/performance. Acad Med. 1990; 65(9): S63-67.
- 12. Roberts, KB, DeWitt TG, Goldberg RL et al. A Program to Develop Residents as Teachers. Arch Pediatr Adolesc Med. 1994; 148(4):405-410.
- 13. Kern, DE, Thomas, PA, Hughes, MT. *Curriculum Development for Medical Education: A Six-Step Approach*, 2<sup>nd</sup> Baltimore, MD: Johns Hopkins University Press, 2009.
- 14. Kirkpatrick DL and Kirkpatrick JD. *Evaluating Training Programs: The Four Levels* (3rd ed). San Francisco, CA: Berrett-Koehler Publishers, 2006.
- 15. Downing SM, Validity: On the meaningful interpretation of assessment data, Med Education, 2003; 37:830-837.
- 16. Downing, SM. Reliability: On the reproducibility of assessment data. Med Education, 2004; 38: 1006-1012.
- 17. Downing, SM and Haladyna, TM. Validity threats: Overcoming interference with proposed interpretations of assessment data. *Med Education*, 2004; 38:327-333.

### Publications specifically on educator portfolios

- 18. Gusic ME, Chandran L, Balmer DF, D'Alessandro DM, Baldwin CD. <u>Educator Portfolio Template of the Pediatric Academic Societies' Educational Scholars Program. (Links to an external site.)</u> Approved by *MedEdPORTAL*; 2007.
- 19. Baldwin CD, Gusic ME, Chandran L. Leadership Lesson: <u>The Educator Portfolio: A Tool for Career Development</u> (Links to an external site.). AAMC *Faculty Vitae*, September 23, 2010.
- 20. Chandran L, Gusic M, Baldwin CD, Turner T, Zenni E, Lane L, Balmer D, Bar-on M, Rauch DA, Indyk D, Gruppen LD. Evaluating the performance of medical educators: A novel analysis tool to demonstrate the quality and impact of educational activities. *Acad Med.* 2009; 84:58-66.

Updated 1-3-2020

- 21. Baldwin CD, Chandran, L, Gusic, ME. Guidelines for Evaluating the Educational Performance of Medical School Faculty: Priming a National Conversation. *Teaching and Learning in Medicine*, 2011; 23:3, 285-297.
- 22. Baldwin C, Chandran, L, and Gusic, M. <u>Educator Evaluation Guidelines. (Links to an external site.)</u>

  MedEdPORTAL, 2012; 8:9072. <a href="https://doi.org/10.15766/mep\_2374-8265.9072">https://doi.org/10.15766/mep\_2374-8265.9072</a> (Links to an external site.)
- 23. Gusic M, Amiel J, Baldwin C, Chandran L, Fincher R, Mavis B, et al. <u>Using the AAMC Toolbox for Evaluating Educators: You be the Judge! (Links to an external site.)</u> *MedEdPORTAL*; 2013.
- 24. Gusic ME, Baldwin CD, Chandran L, Rose S, Simpson D, Strobel HW, Timm, C and Fincher, RME. Evaluating Educators Using a Novel Toolbox: Applying Rigorous Criteria Flexibly Across Institutions. *Academic Medicine*, 2017; 89(7): 1006-11.