

Tools for Survival in the Information Jungle

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This issue of *The Journal of Family Practice* celebrates the fifth anniversary of the "JFP Journal Club," now called "POEMs — Patient-Oriented Evidence that Matters." This month, in addition to the usual critical analyses of the 8 articles from the medical literature judged most relevant to family physicians, we also present original research on the extent and distribution of POEMs.¹ Two previous editors of the *Journal* — John Geyman, MD, and Paul Fischer, MD — provide complementary views on the importance of an evidence-based approach to clinical practice.^{2,3} Taken together, their perspectives reinforce the metaphor of primary care practice as "clinical jazz,"⁴ an intricate interplay of the science and the art of healing.

WHAT ARE POEMs?

POEMs are critical analyses of published articles that are selected by specific criteria of validity and relevance to family practice. Each month, the POEMs editorial team reviews more than 80 journals of interest to primary care physicians, identifying articles that should have a direct and immediate impact on our practices. We call these articles POEMs (Patient-Oriented Evidence that Matters) because they address common primary care problems, use valid research methods, and report outcomes that matter to patients, such as symptom improvement, morbidity, and mortality. POEMs, if valid, should cause us to seriously consider a change in the way we practice. The 8 POEMs considered the most important each month are published in the *Journal*.

GROWTH OF AN EVIDENCE-BASED ORIENTATION IN THE JOURNAL

Five years ago, Dr Paul Fischer (then *Journal* editor) and Dr Mark Ebell launched the "JFP Journal Club," the predecessor of POEMs. Initially, the Journal Club reviewed 2 articles, one from the *Journal* and one from another source, that were valid and relevant to family practice. The reviewers were drawn from a small cadre of family physicians with experience in the newly emerging field of evidence-based medicine. One year later, the Journal Club expanded to 3 articles and had begun to archive the reviews on a Web site. By May 1996, Dr Ebell was joined by David Slawson, MD, Allen Shaughnessy, PharmD, and Henry Barry, MD, who make up the current POEMs editorial staff. They broadened the Journal Club to include 8 articles, selected through a systematic search of the medical lit-

erature. In September 1998, we shed the Journal Club name in favor of POEMs — Patient-Oriented Evidence that Matters, in the belief that it more accurately describes what we are providing for practicing family physicians.

The inaugural issue of *Evidence-Based Practice (EBP)* appeared just a little more than a year ago. *EBP* is a monthly newsletter that includes the 8 POEMs from the *Journal*, another 10 to 12 critical reviews of important articles from the medical literature, validated decision rules, and summaries of relevant reviews from the Cochrane Collaboration. The newsletter also includes articles that present information that is either too preliminary to warrant a change in practice (POEs — Patient-Oriented Evidence) or is focused on intermediate outcomes (DOEs — Disease-Oriented Evidence). We call attention to these studies so changes in practice are prevented, not encouraged, by this type of early research.

In September 1998, we began to publish evidence-based clinical reviews to emphasize our mission of publishing the most important evidence for family physicians and their patients. The *Journal* is proud to be a leader among family medicine journals in producing original research that qualifies as POEMs.

POEMs AS A TEACHING TOOL

With the original development of the Journal Club, we hoped to promote a more critical appraisal of the medical literature for residents and academic faculty. According to our readers, this important function has been served.

Our own residency journal club has used the POEMs as a model to instruct first-year residents on critical appraisal of the literature. Thanks for the successful effort.

Thomas Rosenthal, MD
 Buffalo, New York

I use the POEMs all the time in our weekly journal club. The residents often pick one of the POEMs articles to test their own critique of the article. Also, I teach the residents about evidence-based medicine during their blocks and use the POEMs as examples.

Lillian Gelberg, MD
 Los Angeles, California

In the Sutter Family Practice Residency Program we often use the POEMs section to provide pointers to good articles for our required monthly journal club,

and also as examples of an academic approach to literature review.

*William Gillanders, MD
Sacramento, California*

I applaud the use of POEMS in residency teaching programs and believe that it enhances skills in critical reading of the medical literature and acquaints residents with the current resources available to them. I would like to hear more from readers about the innovative ways that POEMS are being used in residency training.

POEMS AS A PRACTICE TOOL

The POEMS have emerged as an important tool to inform clinical practice, too. The systematic search of the medical literature with explicit inclusion and exclusion criteria of validity and relevance provides a powerful way for the practicing family physician with limited time to read the literature.

The research questions being addressed are useful ones, and the POEMS address them succinctly. This is an efficient way to keep up on at least a piece of the relevant literature out there. Thank you for putting these out.

*Paul Hartlaub, MD
Wisconsin*

This is the section of the *Journal* I turn to first, and I often incorporate the recommendations into my practice. The format is concise and the information is timely and practical.

*Michael Potter, MD
San Francisco, California*

There are precious few journal features worth reading. POEMS are one of them. The topics are important to clinical practice, the summary succinctly describes what was done, and the results and recommendations help sort out how much to believe. A good example is the recent POEM review of the study about quality of life in patients with type 2 diabetes indicating that tighter control was associated with improved quality of life

*John Brill, MD
Milwaukee, Wisconsin*

Rather than regularly reading 80 or more medical journals each month, readers of POEMS can focus on those articles that meet criteria of relevance and validity for their practice. How valid are the POEMS editors' selections and critiques and how reproducible are the products of their search? Efforts are currently under way to test the reproducibility of the selection and review criteria used in bringing the POEMS to the *Journal's* readership. We will report on the results of these studies in an upcoming issue.

THE CHALLENGES OF INTEGRATING POEMS INTO PRACTICE

Family physicians have a tremendous need for clinical information and very little time in which to seek it. Medical information, therefore, must be easily accessible, as well as valid and relevant.

Family physicians require ease of access to clinical information, both when they are hunting for specific answers and when they are foraging in the information jungle.⁵ We forage through the literature to stay informed of new developments that emerge from clinical research. We also hunt through the literature in search of specific answers to questions that arise in the course of patient care. The foraging needs of practicing family physicians are served well by POEMS and the *EBP* newsletter. These sources provide valid and relevant information from more journals than any single physician could regularly review. For example, very few family physicians routinely read *Neurology*, but all regular readers of POEMS now know that riboflavin is effective in preventing migraine headaches in selected patients.⁶

The relative limitation of the POEMS feature is in supporting the physician who is hunting for a specific bit of information under the time pressure of patient care.

Changing physician practice behavior requires not only providing information that is valid, useful, and easy to read; it also requires that this information is available at the time the physician is making a clinical decision (ie, at the point of care). Therefore, while POEMS are a good first step toward higher-quality care, the greatest hurdle still remains — incorporating POEMS into everyday clinical practice.

*James Gill, MD
Wilmington, Delaware*

The biggest barrier to using evidence-based medicine in daily practice is in making the information instantaneously available when you need it, whether that be at the nurses' station in the hospital or the exam room in your office. I am looking forward to the day when I will have some type of hand-held device in my lab coat pocket that I can use to look up a POEM when I need it. I understand that something like that is in the works.

*Michael Parchman, MD
San Antonio, Texas*

The published POEMS have been archived and are available on their own Web site with a powerful search engine to facilitate finding the relevant material (www.infopoems.com). The entire database can also be downloaded to be available without accessing the Internet. To further enhance the availability of POEMS and other important critical analyses of medical information, the POEMS editors have developed InfoRetriever for Windows 95, Windows 98, and Windows NT. This software includes the full content of

the POEMs published in the *Journal* and *EBP*, plus many other important tools for the practice of evidence-based medicine, all fully indexed. A version for Windows CE hand-held computers is under development, and is planned for release in June 1999. More information is available on the Web site.

SURVIVING AND THRIVING IN THE JUNGLE

To prevail in the medical information jungle, practicing family physicians will need tools for both hunting and foraging that will reduce work and provide the most relevant and valid information available at the critical point of care. We will continue to develop and refine those features of the *Journal* that provide the very best evidence that matters to practicing family physicians and their patients. We

always appreciate feedback from our colleagues who struggle with the immense challenges of the information jungle to provide the best possible care for their patients.

REFERENCES

1. Ebell MH, Barry HC, Slawson DC, Shaughnessy AF. Finding POEMs in the medical literature. *J Fam Pract* 1999; 48:350-5.
2. Geyman JP. POEMs as a paradigm shift in teaching, learning, and clinical practice. *J Fam Pract* 1999; 48:343-4.
3. Fischer PM. Evidentiary medicine lacks humility. *J Fam Pract* 1999; 48:345-6.
4. Shaughnessy AF, Slawson DC, Becker L. Clinical jazz: harmonizing clinical experience and evidence-based medicine. *J Fam Pract* 1998; 47:425-8.
5. Shaughnessy AF, Slawson DC, Bennett JH. Becoming an information master: a guidebook to the medical information jungle. *J Fam Pract* 1994; 39:489-99.
6. Mattimoe D, Newton W. High-dose riboflavin for migraine prophylaxis. *J Fam Pract* 1998; 47:11.