

EBP Module 3 Course Guide

1.3 Module info



1.4 Objectives




1.5 Intro to Module

Appraising Evidence

So you have an EBP question, now what?


Now comes the interesting part of the process, developing information literacy skills, knowledge of nursing literature, and an aptitude for locating and retrieving evidence.

Studies have shown that positive changes in a nurse's information literacy skills and increased confidence in using those skills have a direct impact on appreciation and application of research, are vital for effective lifelong learning, and are a prerequisite to evidence-based practice (Shorten, Wallace, & Crookes, 2001).



1.6 Evidence in the PET process

Evidence in the PET Process




In the previous modules you were introduced to the PET process. You explored the first five steps included within the Practice Question phase. In this module you will explore the next five steps within the Evidence phase of the PET process.

1.7 Type, Level, Quality

Evidence

Phase 2 of The Johns Hopkins EBP Model is Evidence



Once you determine the type of evidence, you can evaluate the level of the evidence, and then the quality of the evidence. Hover over each graphic above for details.

1.11 Internal/External evidence

EVIDENCE:
Step 6: Conduct internal and external search for evidence

1.12 Develop search strategy/terms

Step 6: Conduct internal and external search for evidence

Search for Evidence

1.13 Search strategy

Step 6: Conduct internal and external search for evidence


Search for Evidence

1.14 Optional Drag and Drop

Search Terms From PICO

"Are there evidence based interventions that a multidisciplinary team should follow to minimize the risk of urinary tract infections (UTI) in critically ill children with urinary catheters?"

Based on the practice question above, drag and drop potential search terms (found below) to either the search term bin, or if there is no fit, place the search term in the trash bin.




Trash

F critically ill children w/urinary catheters


I evidence-based interventions

C current practices

O minimize risk of UTIs



Search Terms



Above is an opportunity to practice defining search terms by dragging related search terms to the specific PICO component. The goal of this exercise is to create accurate wording for an EBP query.

Search Terms From PICO

"Can frequent turning vs an air mattress for adult patients with broken hips prevent pressure ulcers?"

Based on the practice question above, drag and drop potential search terms (found below) to either the search term bin, or if there is no fit, place the search term in the trash bin.



Trash

F adults with broken hips

I turning

C air mattress

O prevent pressure ulcers




Search Terms



Above is an opportunity to practice defining search terms by dragging related search terms to the specific PICO component. The goal of this exercise is to create accurate wording for an EBP query.

Step 5: Conduct internal and external search for evidence

Search for Evidence



If you would like to practice defining and refining search terms, click on the buttons above. Otherwise, you may move onto the process of where and how to conduct an EBP evidence search.

1.17 How to access library resources

Step E: Conduct internal and external search for evidence **How to Search Library Resources**

As a recap, thus far you have learned the following:

- typical components of a research article
- how to scan an article for inclusion in evidence appraisal
- how to define search terms

On the screens that follow we will introduce and review the top databases to assist you in your search for the best library resources and how to access those resources. You will then have the option to watch a demonstration of a PubMed search, using an already established EBP question.

1.19 Pico/search terms

Search Terms From PICO

"What are the best interventions to prevent post-operative atelectasis in ambulatory surgical inpatients?"

P (Population): adult ambulatory surgical inpatients

I (Intervention): best practices for preventing post-op

C (Comparison): N/A

O (Outcome): decrease in incidence of post-op

From this PICO we can select our search terms. **Basic search terms** are:

- ambulatory surgical inpatients
- best practices
- decrease length of stay
- post operative atelectasis

There are two types of PICO search questions: background and foreground. Here we have a background search question, which is a general best practice question that is broad and produces a wide range of evidence for review. Above we have taken the basic search question and incorporated the PICO elements. When selecting search terms, not only should you pull the specific terms from your PICO, but you should also think about synonyms for those terms, scientific equivalents and the like.

1.20 Databases

Step E: Conduct internal and external search for evidence **How to Search Library Resources**

THE COCHRANE LIBRARY
Independent high quality evidence for health care decision making

THE JOHNS HOPKINS INSTITUTE LIBRARY

PubMed.gov
US National Library of Medicine
National Institutes of Health

Click on databases for details

National Guideline Clearinghouse

CINAHL
Cumulative Index to Nursing and Allied Health Literature

Trip

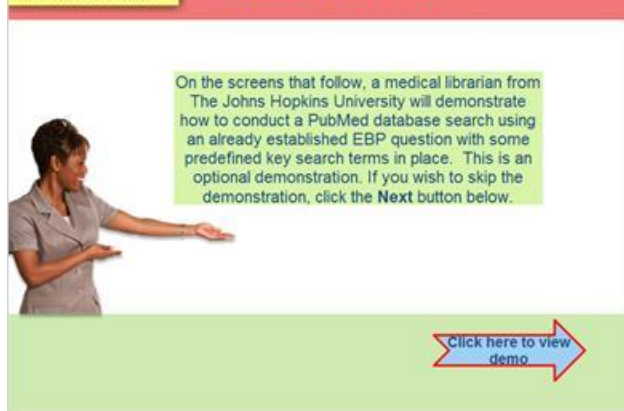
Medical library databases are a good place to begin your search. The top six are listed above. Click on each of the six databases for a brief overview, and click on the website links provided (within the overviews) for more detailed information.

Prev Next

1.21 How to access library resources

Step 6: Conduct internal and external search for evidence **Pub Med Search Demonstration**

On the screens that follow, a medical librarian from The Johns Hopkins University will demonstrate how to conduct a PubMed database search using an already established EBP question with some predefined key search terms in place. This is an optional demonstration. If you wish to skip the demonstration, click the **Next** button below.



[Click here to view demo](#)

2.1 Step 7-Evidence Appraisal


Step 7: Appraising Level and Quality of Evidence

Having gathered evidence relevant to your clinical practice issue, the focus shifts to appraising each piece of evidence. The appraisal process involves determining the type of evidence your team has gathered and appraising both the level and quality of the evidence.

The JHNEBP Model provides guidelines and tools to facilitate the appraisal process.

2.2 types of research review

Type, Level, and Quality of Evidence



Research Evidence

- Randomized Control Trial (RCT)
- Meta-Analysis of RCT's
- Quasi-Experimental Study
- Non-Experimental Study
- Qualitative Study
- Meta-synthesis
- Systematic Review

LEVEL of Evidence I-III
Quality of Evidence ABC

Non-Research Evidence

- Clinical Practice Guidelines
- Organizational
- Expert Opinion, Case Study, Literature Review

LEVEL of Evidence IV-V
Quality of Evidence ABC

Earlier in this course you were introduced to research and non-research evidence. The strongest evidence accumulates from scientific evidence, known as research, while non-research evidence is generated from organizational or individual experience such as quality improvement work, program evaluations, case studies, literature review or expert opinion(s).
