How to Formulate Your Clinical Question and Effectively Find the Answer

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By the end of this session you will be able to…

- Differentiate foreground questions from background questions

- Re-write a clinical question using the PICO format

- Demonstrate use of advanced search options (such as MeSH and limits in Pubmed) to conduct more effective and efficient searches

- Classify web-based resources specific to pediatrics available to you through your institution and the world-wide web

In the next hour we will

- Take a short test of knowledge
- Review background vs. foreground questions
- Review the PICO format for framing your clinical question
- Discuss specific search strategies that will help you to get the best evidence available
- Provide the opportunity to practice
- Provide a toolkit of resources and references

Question #1

What are the three phases of illness associated with pertussis infection?

This is an example of a

  A. Foreground question

  B. Background question

Question #2

In children with cellulitis, do antibiotics in addition to surgical incision/drainage decrease recurrence rates of infection?

This is an example of a

    A. Foreground question
    B. Background question

Question #3

What are the three phases of illness associated with pertussis infection?

What resource is best for finding the answer to this question?

A. Infectious Disease Textbook

B. PubMed Clinical Queries

C. Cochrane Database of Systematic Reviews

Question #4

What type of clinical question can you use the PICO format for?

A. Foreground question

B. Background question

PICO

P = population

I = intervention

C = comparison

O = outcome

Foreground Question Search Using PubMed

- Incorporate the features of PubMed to make your search more efficient & effective:

  - Limits

  - MeSH

  - Clinical Queries

Limits in PubMed

- Allows you to set boundaries related to article type, language, population demographics, year of publication and availability

- Recommend entering limits at the beginning of your search

Using MeSH

MeSH = Medical Subject Heading

- Every article in PubMed is cataloged by keywords

- Sometimes the term you use may not match the cataloging system

- Recommend using MeSH to identify the correct search term to yield the most comprehensive results

Clinical Queries

- Particularly useful for PICO structured foreground questions
- Allows you to focus in on randomized controlled trials and systematic reviews related to etiology, diagnosis, therapy, and prognosis

Small Group Activity

- Break up into small groups (2-3 people per group)
- Review your case file
- Complete the Search Tracker
- Report out to the large group

Activity Time: 20 minutes