CAPS3 – Finding the Evidence: Open Book Assignment

Work with a partner or small group on the following exercise. Student librarians are here to help; please do ask them to help you!

EXAMPLE Clinical Questions (to be replaced by faculty)

- a) What is the evidence for Vitamin D supplementation in the treatment of depression
- b) What is the evidence for using sumatriptan or naproxen in acute migraines in adolescents

PICO & Evidence Based Medicine

- 1. Write out each of your clinical questions in PICO format using the provided worksheets.
- 2. Brainstorm a few terms (2-3) that you could use to find articles on each major concept identified while writing your PICO:
- 3. What types of studies would be best for answering your question? (e.g. Randomized Controlled Trial, Systematic Review, Comparative Study, etc.):
- 4. What concepts in your PICO would be best found using filters/limits (e.g. age group, etc.) after your search?
- HINT: see video 2 at http://guides.library.ubc.ca/content.php?pid=438673&sid=3591399

5. Go to PUBMED & sign-on with your NCBI account. (Create an account as needed.) It is recommended that you go to pubmed through the UBC Library site.

Advanced Searching With MeSH (http://www.ncbi.nlm.nih.gov/mesh)

- 6. Find each major concept in your PICO, find an appropriate Medical Subject Headings (MeSH) and then conduct a Pubmed search to see how many articles are indexed with that MeSH:
 - a. The definition as defined in the scope note:
 - b. The year it was added (if available):
 - c. Any pharmacy-specific subheadings:
 - d. Where it is in the "MeSH Tree"? Should you go 'up' the tree?:
 - e. How many articles in Pubmed are indexed with this MeSH?
- 7. Using Advanced search, combine your individual MeSH searches using Boolean AND/OR to find articles related to your PICO. How many results do you have?

HINT: see video 3 at http://guides.library.ubc.ca/content.php?pid=438673&sid=3591399

- 8. Use the "Article types" filter to find out how many of your results are:
 - a. Systematic Reviews:
 - b. Randomized Controlled Trials:
 - c. Clinical Trials:
 - d. Comparative Study:
- 9. Use the **"Publication Dates"** filter to limit to publications from particular date ranges. How many articles were published in:
 - a. The last 5 years:
 - b. The last 2 years:
- 10. Use the "Text availability" filter to find out how many articles are available with free full text (remember that as a UBC student you have access to many articles that are not free as well. Only use this filter to see articles that are free to the world):
- 11. Choose one of the articles and add this article to favourites. Click on the title to see the record for the article:
 - a. What MeSH terms were used to index the article?

- b. Are there any MeSH terms here that are relevant to your topic that you didn't find earlier or that would help you further focus your search?
- c. Can you get the full text of the article from UBC Library using the yellow **"UBC eLink"** button?

- 12. Try re-running your search using subheadings, for example, by searching for a disease MeSH with "drug therapy" as a subheading or a drug term MeSH with "therapeutic use" as a subheading. How many results do you have now? How do the new results differ from the ones you had before?
- 13. Try re-running your search using "Restrict to MeSH Major Topic" for the MeSH term of one of your major concepts. How many results to you have now? How do the new results differ from the ones you had before?

- 14. Try re-running your search using both subheadings AND "Restrict to MeSH Major Topic." How many results do you have now? How do the new results differ from the ones you had before?
- 15. Save this search to your NCBI account.

Pubmed Basic Searching

- 16. Go to Pubmed and conduct a basic search. Scroll down the page and find the **Search Details** box. Click the "see more..." link:
 - a. What terms (MeSH and Keywords) did Pubmed "robot" use to find articles?
 - b. Can you think of a better way to find articles on this topic? Try editing right in the box.
- 17. Try doing a basic search for "Advil pain".
 - a. Look at the Search Details box. Did the Pubmed 'robot' find the MeSH term for the active ingredient in Advil? How many results did Pubmed find?
 - b. Do a search for "ibuprofen pain." How many results did Pubmed find?
- 18. Some very new articles do not yet have MESH. How can you find those articles for this topic?
- 19. Go into your account and:
 - a. Find your favorites folder:
 - b. Find your saved search:

Need more help? Email the student librarians at wd.ref@ubc.ca