



clinical impact[®]

*EXPLORE THE SCIENCE BEHIND
HEALTH CARE PRACTICE.*

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ORIGINS



Researchweb is a grant management and a
Research Information system

ORIGINS

- Large amounts of grant applications are reviewed and evaluated.
- A common question in application forms: What is the potential clinical impact?
- Is there a way to quantify clinical impact?

CLINICAL PRACTICE GUIDELINES!

- It has been established in studies that guidelines influence health care practice.
- Guidelines are (or should be) research based.
- Most guidelines contains citations to the research on which they build their recommendations.
- Clinical guideline citations can be used as an indicator for professional impact.

PURPOSE

- Create a database of citations in clinical guidelines and similar documents used in the medical field.
- To have data that is reliable and transparent.
- To have data that is organized and rich to allow in-depth analyses.
- To have data that is able to be integrated in Researchweb.

THE GUIDELINE DOCUMENTS

- Inclusion criteria: purpose, reference list, available, reliable source.
- Different languages, styles and file types.
- Guideline collections.
- Difference between provider and originator – a guideline can be created by one organization and published online by another, or published by several organizations.

THE GUIDELINE DOCUMENTS

- A guideline can consist of several files.
- A web page can contain several different guidelines.
- A guideline can be updated, replaced, or get an addendum.
- All citations are not equal – context matters.
- The methodology of creating guidelines can differ quite a bit.

MANAGING THE GUIDELINES

- Group guidelines into Provider Collections.
- Assign the guideline documents metadata – publishing year, originators, language, etc.
- Assign the organizations metadata – country, type (private, state agency), web page url.
- Duplicate detection and management.
- Merge and manage files that make up a single guideline.

MANAGING THE CITATIONS

- Extract the citations.
- Decide type: included studies, excluded studies, additional sources, reading lists, etc.
- Verify extracted citations to external databases.
- Add identifiers: PMID, UT, DOI, ISBN.

CURRENT NUMBERS

- Over 8000 guideline documents.
- Guidelines from Sweden, Denmark, Norway, UK, USA and from international organizations.
- Number of extracted citations are around 800k.
- Guidelines all the way back to 1989, oldest cited article from 1899.

USAGE

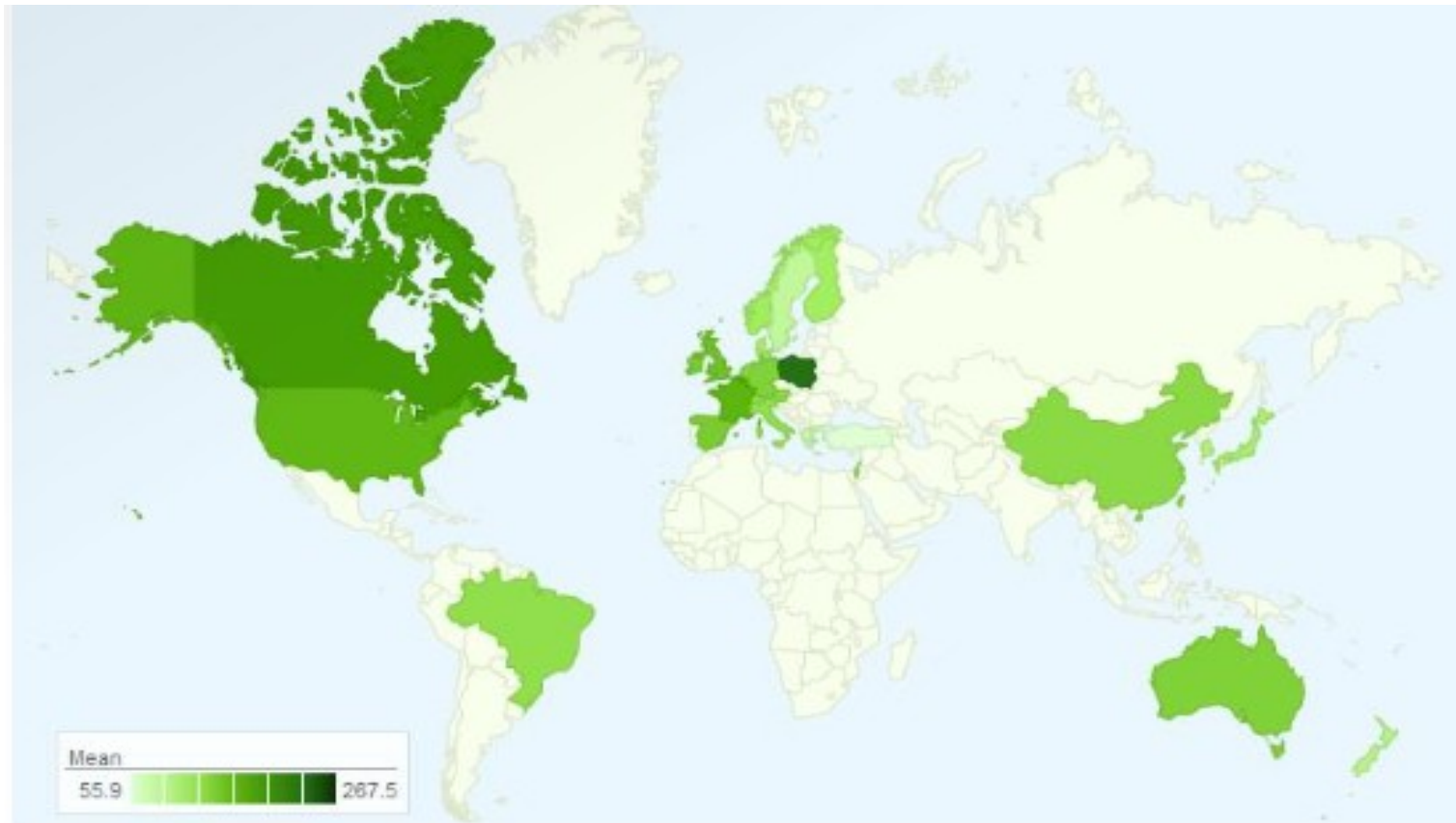
- As research data.
- Reports to research funders.
- Part of a large scale evaluation by the Swedish Research Council – Evaluation of the quality of clinical research in the county councils covered by the ALF agreement.

SOME FINDINGS

- Different types of publications are cited.
- On average 6-8 years from publication to citation.
- A single study is usually at most cited a few times in each collection, higher impact means citations in several collections.
- National guidelines more prone to cite studies from their own country.
- Local guidelines more prone to cite studies and reports that involve their local population.

CITATION IMPACT MAPS

Nelhans, G., & Eklund, J. (2016). Citation impact in clinical guidelines. Presented at the 21st Nordic Workshop on Bibliometrics and Research Policy, Copenhagen, November 3-4, 2016. <https://doi.org/10.6084/m9.figshare.4249811.v2>



IN RESEARCHWEB

- Grants: impact on researcher och research group level.
- Grants: Grant reporting and evaluation.
- Grants: comparison of expectation and outcome.
- CRIS: Evaluate projects, projects, or funding programs.