

TRIPping into NeLH: a one-stop search of the evidence

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A description of NeLH's pilot search engine, based on the one developed for the TRIP database.

In November 2001, the National electronic Library for Health (NeLH) <<http://www.nelh.nhs.uk>> launched a new search feature.

The search engine is not designed to help you to navigate your way around the growing NeLH site (we have indexes to help you with this), but to search several sources simultaneously for the evidence on a given topic. Commissioned in response to user demand, the search engine aims to help health professionals negotiate a path through the growing collection of evidence-based resources.

Clearly visible from the NeLH home page, the new search feature is simple to use. It was developed by Jon Brassey, probably best known for creating the TRIP Database and ATTRACT service. If you take a look at the search engine, you'll see obvious similarities with the TRIP Database, which has proved so popular with health professionals for the time and effort it takes out of searching. The TRIP Database

<<http://www.tripdatabase.com>> is a collection of the titles and hyperlinks of documents from over 70 sites of high quality clinical information. It was created in 1997 and has since expanded rapidly in both content and the number of searches. Originally designed to be purely an 'evidence-based' database, it became apparent that many clinical questions cannot be answered by this particular approach and the database was expanded to include peer-reviewed journals and 'other' publications, such as e-textbooks.

Whilst the NeLH search engine will undoubtedly help the less confident searcher, it is by no means a replacement for the more sophisticated tools residing in each individual database.

For example, it does not offer searching by MeSH terms, as does the Cochrane Library. But what it does offer is a quick and easy route through the confusing landscape of evidence-based practice and provides NeLH users with an opportunity to learn more about the different resources. Using the search engine, a health professional can search the titles of documents for a particular keyword or phrase. The search engine supports Boolean logic and right-hand truncation and also allows the user to build a search strategy by searching a retrieved set.

A key feature of the search engine is the hierarchical display of results, grouping hits into four categories: guidelines and national service frameworks; quality-assured summaries of evidence; Cochrane and other systematic reviews; and original research and study-based summaries. Following the lead of the TRIP Database, the aim is to guide users through the different types of evidence-based resource and to avoid overwhelming the busy professional.

The database itself consists of a list of titles, URLs, and a date of publication for each 'article' or document. Currently, 7916 articles are contained within a Cold Fusion database. This database actually consists of a range of separate databases, one for each source. When a search term is entered, these separate databases are searched simultaneously to enhance speed. Any matches on keyword or phrase are returned according to the hierarchy rules explained above. Every month, each source is reviewed and details from any new articles are uploaded onto the database.

The search engine does have its limitations. Currently, it does not cover all NeLH content (a full list of sources covered can be viewed at <http://www.nelh.nhs.uk/search_rationale.asp>).

Although the search engine is open to all NeLH users, access to licensed resources remains restricted to eligible users only. A small 'A' on the results page indicates those resources which are licensed, and which are 'protected' by the Athens access management system.

Testing took place over a period of 4 weeks, with significant support from colleagues in the health and information sectors. A Librarians Testing Panel was set up some time ago and this group, along with the NHS Regional Librarians Group, the NeLH External Reference Group, the NeLH Programme Board and the NeLH User Advisory Council, were consulted during the testing phases.

The testing process consisted of two phases: alpha testing and beta testing. The **alpha testing stage** lasted a fortnight. The prototype search engine was mounted on a test site, and users were invited to test it by following a guided questionnaire covering all aspects of potential search functionality. They were asked to rate the search engine in terms of look and feel and usability. Comments and suggestions were then incorporated into changes to the search engine's design and functionality before the beta testing phase. **Beta testing** lasted a fortnight, during which the search engine was 'fine tuned' in the light of further feedback. The search engine was then officially launched at the NHS Information Authority Conference on 26 November 2001.

The search engine as it stands is seen very much as a prototype. The experience of building the search engine, along with user feedback, will inform future development.