Reference Management

Tracy Kent, Digital Assets Programme Advisor, University of Birmingham (t.k.kent@bham.ac.uk)

Freely Opening up references: keeping up to date with what's on the market

Reference software packages tend to either be free and/or open-source, or are commercially available. In these straitened economic times open source is an approach that most information professionals cannot afford to ignore. It is unfortunate in most organisations that the implementation and adoption of open source – especially for referencing – is not well understood, with barriers and benefits still to be addressed.

SourceForge.net provides several downloadable software packages which are all available as open source packages. Open-source means software that is liberally licensed to grant the right of users to study, change, and improve the design through the availability of its source code. Although costs may still be attached for the provision of maintenance, it provides libraries with opportunities for working with their users to provide a product that can be customised for their needs. Packages worth trying out include:
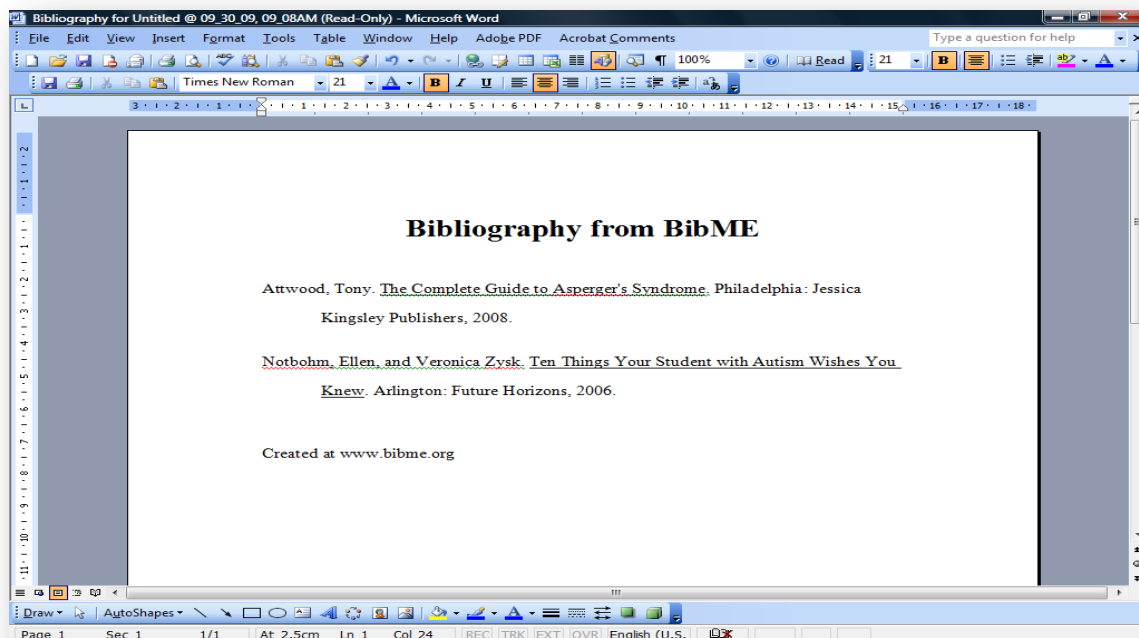
Refbase (http://www.refbase.net) is a Web-based bibliographic manager which can import and export references in various formats (including BibTeX, Endnote, MODS XML, and Open Office). It can make formatted lists of citations, and offers searching features and rich metadata. The database can inform you automatically about any newly added record. For each record that has been added to the database, an announcement email is sent to a mailing list (or any other email address) containing the main record data as well as a direct link to the details page of that particular record entry. This enables users to keep track of new database entries easily.

Wikindx http://wikindx.sourceforge.net/ is a single or multi-user Virtual Research Environment storing searchable references, notes and citations and integrated with a WYSIWYG word processor for the authoring of publication-ready articles, automatically formatted to a chosen citation style. It can also support non-English multi-byte character sets.

As well as open source, there are packages that are simply freely available. These include

Aigaion http://www.aigaion.nl/ allows users to classify publications in a self-chosen (overlapping) topic structure. References can be categorised and there are numerous ways to browse references held (publication type, or title, etc). Plus, users can browse references under a variety of topics for ease of retrieval. Each item provides citation details and is hyperlinked to its complete bibliographic details. Clicking on an item in the topic list displays full bibliographic details. The full-text document(s) can be attached to the bibliographic entries, either through uploading or by providing the URI. Aigaion supports formatted export to text, html or rtf in common citation styles.

BibME (www.bibme.org) pulls references from a variety of sources to automatically complete bibliographic entries. As you input data, BibME searches for resources from sources such as CiteULike, Amazon and Yahoo News. Selecting the source they want to cite it is entered into a bibliography. The package recognises several output styles and the details can be exported to a word-processing package. BibME can also deal with less traditional sources such as interviews or TV shows. A user who registers for a free account can tag bibliographies for future use. The screen shot below shows a bibliography created from the BibME account.

Mendeley (www.mendeley.com) markets itself "the iTunes for research papers" allowing

users to drag and drop research papers into the site as Mendeley looks up Cross-Ref DOIs, arXiv IDs and PubMed document details automatically. You can also manually add documents or import existing EndNote XML, RIS, or BibTex files. The Mendeley bibliography can be accessed from any computer with an online account. It is probably the fastest growing social bookmarking tool around with over 4 million papers listed in it to date. Screen shot shows import file to import to Mendeley from Wikipedia with items selected which can now be tagged and annotated.

Zotero (http://www.zotero.org/) created by staff at the George Mason University, allows you to store, organise, annotate and cite reference sources without leaving the browser. On sites such as PubMed, Google Scholar, Amazon.com and Wikipedia, Zotero detects when a reference is being viewed and can save the full reference information to a local file. Users can add notes, tags, and their own metadata through the in-browser interface. Selections of the local reference library data can later be exported as formatted bibliographies. All entries including bibliographic information and user-created rich-text memos of the selected articles can be summarized into an HTML report. There is a Firefox browser extension which allows imports into Zotero (see CiteULike above). The iTunes-type interface helps to give a nicer feel to this package. The browser integration means more seamlessness between information sources and the reference management system. The libraries can be saved and organised with the tagging functionality. This package would appeal to students and young people alike.

Decisions on which package to use, as outlined above, are often based on finance, traditions and perceived use/need for the software. If finance is less of an issue, then the added features of the commercial packages would be worth considering. The commercial packages tend to aimed more at the academic market but share a number of features with the free packages outlined above including search capabilities, import features (from variety of external databases and internet sites) and the ability to create bibliographies in a range of styles. There strength, however, lies in the database integrity features such as authority lists, spell checkers and duplicate detection, which helps to keep references accurate and consistent. This is particularly useful for research groups and maybe the feature which moves you away from the free packages.

Commercial packages

The three main reference management software packages are Endnote (www.endnote.com) now in its thirteen version and available for Macs and PC's with a desktop option as well. Reference Manager (www.refman.com) is particularly useful for dealing with database integrity (with features such as periodical abbreviations lists and find & replace options) and Refworks (www.refworks.com) is well liked because it is purely web-based and has a number of options for getting references out of the system.

Any reference management software package, whether open source, free or commercially available, is only ever as good as the material within it. With these freely available packages which your users may make use of without recourse to the library then support for them will prove a challenge. If you have any innovative ways of supporting these sorts of packages do let me know and your hints and tips can be passed on.