eResearch Tools to Support the Collaborative Authoring and Management of Electronic Scholarly Editions

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AustESE
Australian Electronic Scholarly Editing
The University of Queensland is proud to be in partnership with the National eResearch Collaboration Tools and Resources (NeCTAR) project to create a unique opportunity to develop eResearch Tools that support the Collaborative Authoring and Management of Electronic Scholarly Editions. This project will benefit the Australian research community by providing an online research and publishing platform that contributes to the preservation and understanding of literary, classical, theological and philosophical texts that have shaped our cultural heritage.
Objectives

• To develop interoperable services to support the production of electronic scholarly editions by distributed collaborators in a Web 2.0 environment.

• To provide the Australian scholarly editing community with an integrated workbench that provides access to web-based scholarly editing tools.
Scholarly Editions

• Provide accurate reading texts of works of literary, historical, theological or philosophical significance

• They contain:
  – historical and textual essays,
  – explanatory notes,
  – appendixes e.g. glossary
  – a scholarly apparatus that provides access to alternative readings in other versions of the work
Prometheus Unbound

ACT III, SCENE III

And best; and all round are mossy seats,
And the rough walls are clothed with long soft grass;
A simple dwelling, which shall be our own;
Where we will sit and talk of time and change,
As the world ebbs and flows, ourselves unchanged.
What can hide man from mutability?
And if ye sigh, then I will smile; and thou,
Ione, shall chant fragments of sea-music,
Until I weep, when ye shall smile away
The tears she brought, which yet were sweet to shed.
We will entwine birds and flowers and beams
[E.3.21]*

Which twinkle on the fountain's brim, and make
[E.3.20]*

Strange combinations out of common things,
Like human bales in their brief innocence;
And we will search, with looks and words of love,
For hidden thoughts, each lovelier than the last,
Our unexhausted spirits; and like lutes
Touched by the skill of the enamoured wind,
Weave harmonies divine, yet ever new,
From difference sweet where discord cannot be;

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Variorum Edition

From: Lawrence Zillman (1959) Shelley S Prometheus Unbound A Variorum Edition,
http://www.archive.org/stream/shelleyspromethe012636mbp#page/n261/mode/2up
Commentary or Annotated Edition

From: John Newman (1843) *Commentary on the Four Gospels*,
http://www.archive.org/stream/commentgospelp101newmuoft#page/n41/mode/2up
transferred to the stream which flowed perhaps two
hundred yards from the house. ¶ Our
appearance upon the verandah in front of the habitation
drew together quite a crowd of the natives, who now
stood looking on & conversing in the most animated manner with one another,
like a group of gossiping idlers gathered about the
door of a village tavern when the equipage of some
distinguished traveler is brought round previous to his
departure. As soon as I clasped my arms about the
neck of the devoted fellow, & he jogged off with me,
the crowd composed chiefly of young girls & striping boys
followed after, shouting & capping in infinite glee &
accompanied us to the banks of the stream. ¶ On
gaining it, Kori Kori wading up to his hips in the
water, carried me half across & deposited me on
a smooth black rock which rose a few
inches above the surface. The amphibius rabbit at
our heels plunged in after us & climbing to the

1. quite a crowd of the natives, who now stood looking
2. quite a crowd [...], who now stood looking

Narrative

"Of the natives" does not appear in print, and the reason for
the cut is not entirely clear given that the grammar of the resultant
"crowd who" is questionable, and that removing "of the natives"
breaks the parallelism with "group of gossiping idlers." HM may
have cut this phrase in fair copy before submitting to Murray to
westerrnize the scene. Or, an editor may have made the cut thinking
"of the natives" was somehow an unneeded modifier of "crowd."
AustESE Workbench Architecture
Tools to import transcriptions and facsimile images from a variety of formats including TEI/XML, and tools to edit/correct transcriptions.
Tools to support automatic or manual mapping and overlay of transcriptions and images.
Collation & Textual Analysis

Tools to assist editors to collate texts and to produce apparatus for scholarly editions. These tools will also provide visualisations of variants and relationships between texts.

HRIT Server MVD-based collation (table view)
observations, and writing up the log, and so forth. Butterworth's misfortune in
having his certificate sus- pended was nothing to a loss that I sustained over
the affair. What with the excitement of the moment, and the pain of seeing my poor
schoolmate suffering the horrible fate he had brought upon himself, I do not think
I entirely forgot that my whole fortune was in the pockets of the undress uniform I
threw off when I left the mast to swim for the ship. Before leaving London, I had been foolish enough to put all my
money into Bank of England notes of high value. I did this because I wasn't sure
but I might leave the vessel at some intermediate port, and go rampanting
heaven knows where. The world seemed too small for me in those days. However, though I feel most
regret over the loss of the sword the Emperor gave me, I certainly feel most
inconvenience over the loss of the money. Candidly, I returned to the
Aurungzebe poorer by about £12,000 than when I left her, two hours and a half
before."

"You were like Francis I. after the battle of Pavia," I observed in my pedantically
pedantic way—"all was lost, save honour." This is the remark to which I promised,
a right enough on paper, but it seemed, as I uttered it, to be not only miserably
out of place, but one of those lapses which you can't tamper with afterward,
unless you want to wade deeper in disgrace. The comment appeared pregnant
with a jocular fellow-feeling, an off-hand appreciativeness, which threw a baleful
shadow backward across Fred's yarn, and seemed calculated to set people
thinking. A dead silence fell on the company, while a glance of sudden
resentment from the dark eyes of the authoress made me feel much as when, in
a dream, we are conscious of having in our possession, property which we
vaguely remember to have a stolen and which we can find no opportunity of
quietly restoring. I made two or three more slips of the same kind before the
evening was over, but the deepening of my infamy was only like a few
cumulative sentences upon a life.

The bushman, whatever else he may be, is always a con- secutive thinker,
balancing evidence with forensic circum- spection, and much more than forensic
fairness; and he seldom speaks till he has something to say. Bob turned to the
authoress.

"Curious thing how some yarns proves their own selves," he remarked. "I notice
that very forible with your ole man. Now, when he said, quite simple, about
makin' observations to find out what part o' the sea he was in, I seen the truth
o' the yarn stickin' out strong. Course, I seen the truth of it all along; for
schooners has on'y two masts, an' by the same token sheets aint sails, they're
ropes. But that remark about observations sort o' clinched the yarn on the fur
side."

"You're a keen observer, Mr Bruce," said the authoress, half-suspiciously; though
she might have known that, to the barbarian's sense of propriety, my own frivolous
coment made a clear vindication politely imperative.
O, for heaven's sake! thought I; and, leaning through the window, I said hastily to Fred, who had resumed his seat, and was in the middle of another anecdote, "What do you say if we go for a walk along the river?"

Fred assented, and came round into the parlour, with Bob and Hereward. Mrs F-B. took the latter and Sissy away to give them a general freshening up; and presently we came forth in our pride. Bob, with Sissy, again asleep, on his arm, was still rapt in the moving accidents of all description so accurately related by his adventurous companion. Close behind, followed the spell-bound authorissa and her unwearyed mentor, the latter bringing forth from his treasury volumes of disconcerting prophecy. And I, neglected and oppressed, brought up the rear, carrying the bald-headed bambino, now wrapped in a swale, like a silkworm in its cocoon. Hereward pattered along beside me, holding on to the well, the leg of my pants, if you must have it. The little fellow kept me under severe cross-examination during the whole talk, detecting and exposing with great frankness any evasion on my part, and now and then venting what he conceived to be a grievance, namely, that I had failed to call his attention to the epigram before it got away. Once, in filling and lighting my pipe, I inadvertantly changed the position of the cigar-shaped roll which contained the papoose. Mrs F-P. was by my side in an instant, her quick maternal eye having observed that I was carrying the cocoon with the wrong end uppermost. Otherwise, I got on very well.

We returned as night was setting in. After tea we were again found in the little parlour. Hereward had talked himself to sleep, and was folded, shapeless and invertebrate on my knees. Sissy was in the same condition on Bob's knees. Mrs F-P. took them away in rotation, and disposed of them for the night. Rigby had brought in a number of photographic proofs of Aborigines, and was commenting on how Finidel had, through hard work, got himself to a better state of things. Bob, with Sissy again asleep on his arm, was still rapt in the moving accidents of all description so accurately related by his adventurous companion. On the other side of Fred walked his spell-bound wife, and I, neglected and oppressed, brought up the rear, carrying the bald-headed bambino, now wrapped in a swale like a silkworm in its cocoon. Hereward pattered along beside me, conducting a severe cross-examination on general subjects, abruptly varied now and then by the ventilation of what he conceived to be a grievance, namely, that I had failed to call his attention to the epigram before it got away. Once, in filling and lighting my pipe, I inadvertantly changed the position of the cigar-shaped roll which contained the slumbering papoose. Mrs Pritchard was by my side in an instant, her quick maternal eye having observed that I was carrying the cocoon with the wrong end uppermost. Otherwise, I got on very well.

We returned as night was setting in. After tea, we were again found in the little...
Critical Edition with apparatus as footnotes

From:
Boldrewood, Rolf, & Eggert, Paul, & Webby, Elizabeth. & Australian Academy of the Humanities.
2006, Robbery under arms / Rolf Boldrewood ; edited by Paul Eggert and Elizabeth Webby, University of Queensland Press, St. Lucia, Qld.
think out some other plot before I've done. Snarley's got to suffer; and he knows it; I see it in his eye.”

A year or so afterward occurred the second known instance of Freddy's telling an unmitigated truth. It came about in this way:—

My little brother, Bobby, was at that time six or seven years old; Steve Thompson’s brother, Jimmy, was about the same age; and the children were inseparable companions. One Sunday afternoon, returning from Sunday School, Steve and I sat down in a road-metal quarry, to enjoy a quiet smoke of honeysuckle; Bobby and Jimmy meanwhile gathering wild-flowers among the rocks.

“The little coves is about the same size,” I remarked.

“Same temper, too,” replied Steve. “Couldn’t be better matched.”

“Sooner they learn to take their own parts the better for themselves,” I hinted.

“I think parents ought to learn their kids to defend themselves,” observed Steve; “not have them growin’ up helpless, for people to wipe their feet on.”

After some further interchange of opinion, we called the children, promising to show them a new way. We took them for a walk, and told their little ways for good this moment.
Collaborative annotation tools allow editors to attach or reply to scholarly commentary, display, search and migrate annotations.
Annotation Tool

lore annotations
- Firefox add-on
- create, edit, search, browse annotations and resource maps

github.com/auselit/lore/
Annotation Repository

lorestore

- Search, query, display & visualise annotations & resource maps
- REST API for creating, retrieving, updating and deleting annotations

github.com/uq-eresearch/lorestore/
Specialised Annotation Types

Implemented using the Open Annotation model
http://openannotation.org/

Diagram of specialised annotation types:
- oa:Annotation
  - TextualNote
    - VariationAnnotation
  - ExplanatoryNote
    - ClassicalAllusion
    - BiblicalAllusion
    - LiteraryAllusion
    - HistoricalNote
    - BiographicalNote
    - ...
Tools for versioning, locking & publishing electronic scholarly editions and to export to formats such as TEI/XML, HTML, MS Word & ePub.
## Tools Summary

<table>
<thead>
<tr>
<th>Text Import &amp; Markup</th>
<th>Text &amp; Image Alignment</th>
<th>Collation &amp; Text Analysis</th>
<th>Annotation &amp; Tagging</th>
<th>Publishing</th>
</tr>
</thead>
<tbody>
<tr>
<td>HRITServer</td>
<td>TILE, TILT</td>
<td>nmerge (MVD) and HRITServer, Juxta, Interedition</td>
<td>LORE &amp; lorestore, YUMA, UVic, HRIT CaTT</td>
<td>epub-tools, Apache POI, SADE, xMOD</td>
</tr>
<tr>
<td>T-PEN, Tika, CTSDH</td>
<td></td>
<td>CollateX, HRIT image collate, eHinman, Voyant, CATMA</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Standoff Markup</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>editor, Tessaract OCR, Islandora editor, Scripto, XTF</td>
<td></td>
<td></td>
<td></td>
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</tbody>
</table>

### Existing

- Versioning & correction services, Service to link documents with bibliographic entities, Advanced content search, Document relationships visualization service
- Improved page / line / word recognition service, Support for standoff properties
- Advanced variant query and visualization services, Light box
- Annotation of textual variants, Advanced annotation query services
- One-click publication, locking and cloning of electronic editions

### To be developed
## Workflow – Roles

<table>
<thead>
<tr>
<th>Role</th>
<th>Description</th>
<th>Per-Project</th>
</tr>
</thead>
<tbody>
<tr>
<td>Admin</td>
<td>A technical administrator who ensures the continued operation of the system.</td>
<td></td>
</tr>
<tr>
<td>General Editor</td>
<td>An editor with an advisory / supervisory role on one or more projects (e.g. within a series)</td>
<td>✔</td>
</tr>
<tr>
<td>Project Leader</td>
<td>The editor who is responsible for / has ownership of a project.</td>
<td>✔</td>
</tr>
<tr>
<td>Collaborator</td>
<td>A collaborating editor. This role also includes students and research assistants.</td>
<td>✔</td>
</tr>
<tr>
<td>Digitiser</td>
<td>Someone who assists with digitising artefacts</td>
<td>✔</td>
</tr>
<tr>
<td>Transcriber</td>
<td>Someone who assists with transcription of digitised resources</td>
<td>✔</td>
</tr>
<tr>
<td>Copy-editor</td>
<td>Someone who assists with proof reading and corrections</td>
<td>✔</td>
</tr>
<tr>
<td>Reviewer</td>
<td>Someone who reviews an edition</td>
<td>✔</td>
</tr>
<tr>
<td>Authenticated User</td>
<td>Someone with a user account for the system who has authenticated</td>
<td></td>
</tr>
<tr>
<td>User</td>
<td>Someone using the system (regardless of role or whether they have an account)</td>
<td></td>
</tr>
</tbody>
</table>
Workbench Web Portal

- Drupal 7 with MongoDB backend
- OpenID authentication
  (AAF support to be added next year)

Wireframe for Workbench project page
Using a combination of a document datastore (MongoDB) and RDF triplestore, the content repository stores images, transcriptions (as Multi-Version-Documents), annotations and edition metadata.
Key Entities

- **Agent**: A person or organisation e.g. author, publisher, editor
- **Artefact**: a material object (e.g. manuscript, book, newspaper, magazine etc.) that makes available to readers a version of a Work. An Artefact might be made up of parts, and so could be distributed across the world.
- **Version**: one of two or more authoritative forms of a Work. A Version is made available to readers on an Artefact. A Version might be made up of parts.
- **Work**: an organisational concept that relates versions and artefacts, usually under a common title. A Work is realized in a Version.
- **Surrogate**: A concept that relates Artefacts to Digital Resources (e.g. digital images and transcriptions are both surrogates for an Artefact).
- **Digital Resource**: A digital representation of an Artefact (e.g. digital image, transcription, audio-visual etc.).
- **Resource Collection**: A collection of Digital Resources e.g. a collection of page images providing a surrogate for a manuscript.
Case Study: ‘Such is Life’

Agent

Joseph Furphy – author of ‘Such is Life’
And this business, in the distribution of his personal estate—strictly so called—the pig provides for quality, as well as quantity. He is the only fat that is fit to eat. Say you are dispensing the simple hospitalities of your camp to some stranger—swagman, bullock-hunter, drover, or nondescript wayfaring, as the case may be. Can you eat fat? you ask politely. Well—yes, is generally the reluctant reply; I like it mixed, or ways to that effect. It's upon, with a complacency which reflects little credit on your higher nature, you place before your guest a Benjamin's mess of flabby, porous, bubbly, porcine, lukewarm beef fat, intermixed by a few insignificent and inseparable garnishings of lean, and while you apologize for the hardness of the damper, and call your guest's attention to the belly, you sedulously press the savoury delicacy on his eagerness—and where is his bravado? Not so with cold fat bacon. One can lay a slice of that on your slice of damper, and keep both edges intact till the lot is gone. So you see the pig is always up to sample, and true to name—true to that true, dramatic and dainty name which never partakes with us in a double sense, keeping the word of promise to own.

I
SUCH IS LIFE.

CHAP. I.

Unemployed at last.

Either the tendency of events during the last few days, weeks, months, years, centuries, millennia, for we can't mark an arbitrary point on the line anywhere, has been working toward this end, or my indomitable old adversary has suddenly called to mind Dr. Watts's friendly hint respecting the easy enlistment of idle hands. Good. If the former hypothesis be correct, my enforced furlough tacitly conveys the responsibility of extending a ray of information, however narrow and feeble, across the path of such fellow-pilgrims as have led lives more sedentary than my own—particularly as I have enough money to frack myself in a frugal way for some weeks, as well as to purchase the few requisites of authorship. If, on the other hand, my supposed safeguard has been cut off at the meter by that amusingly short-sighted old Conspirator, it will be only fair to notify him that his age and experience, even his captivating habits and well-known hospitality, will be treated with scorn, rather than respect, in the paragraphs which he virtually forces me to write; and he is hereby invited to view his own feather on the fatal dart.

Yet a peculiar defect—such I scarcely like to call an oversight in mental construction—shuts me out from the flowery pathway of the romancer, a coordinate requital endows me, I trust, with the more sterling, if less ornamental, qualities of the chronicler. This fairly equitable compensation embraces, I have been told, three distinct attributes: an intuition which reads men like sign-boards; a limpid veracity; and a memory which habitually stereotypes all impressions except those relating to personal injuries.

Submitting then, to the constitutional interdict already glanced at, and availing myself of the implied license to utilise that homely talent of which I am the bailie, I purpose taking certain entries from my diary, and amplifying these to the minutest detail of occurrence or conversation. This will afford to the ob-
Artefacts

Original Tom Collins Manuscripts

1. List of poems for Chapter Headings of ‘Ripley’s Romance’
2. Draft draft of ‘Such is Life’ (Chapter heading) ‘Taking It Easy’ also included in manuscript
3. Draft of letter
4. Original letter accompanying presentation copy of first edition of ‘Death is Life’
5. Partial revised draft of ‘the poem’ ‘Dreams’
BBB (NLA)

RR (SLV)

1898

1901

1903

eResearch Australasia 2012
Stemma visualisation (wireframe)
Workbench Development

- AustESE project running from June 2012 until December 2013
- Agile development approach and active research community involvement through user acceptance testing
- The workbench and all tools being implemented/extended by the project are open source
- VM images are also being developed to make it easy for researchers to run their own instance of the workbench on the NeCTAR research cloud
Impact

AustESE hopes to enable:

• Faster authoring of scholarly editions, particularly online electronic editions;

• Greater sharing of the resources, including primary and ancillary materials, annotations and bibliographic metadata that comprise scholarly editions; and

• Wider adoption of best practices and standards for publishing and archiving electronic editions and their constituent resources.
People

Project Steering Committee

- Community Project Leader and Chair - Prof Paul Eggert, UNSW;
- Technical Project Leader - Prof Jane Hunter, UQ;
- Project Manager - Wilfred Brimblecombe, UQ;
- Technical Adviser - Dr Desmond Schmidt, QUT;
- Prof Tim Doin, Curtin University;
- Dr Mark Byron, University of Sydney;
- NeCTAR representative

International Advisory Committee

- Prof Peter Shillingsburg, Loyola University;
- Prof Peter Robinson, University of Saskatchewan;
- Prof Dirk Van Hulle, Antwerp University;
- Gregor Middell, University of Wurzburg;
- Prof Paul Eggert, UNSW;
- Prof Jane Hunter, UQ.

Project Team

- Project Manager - Wilfred Brimblecombe;
- Workflow Analyst and Community Liaison - Dr Roger Osborne;
- Senior Software Engineer - Anna Gerber;
- Junior Software Developer - TBA.
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