Peer-review Discussion Group Summary

Participants - E. Hilf, E. Muller, R.
Brandsma, H. Bosc, T. Velden, I. Bohlin,
S. Harnad, J. Vigen, P. Dall'Aglio, B. Arms (scribe), A. Wray, K. Konings, S.
Buckingham Shum, D. Dallman, M. Bosc,
J. Palmer, M. Doyle (moderator)

CERN, March 22, 2001

Scope of Discussion

- Traditional peer-review
 - Reasons for peer-review
 - The true cost of peer-review (added responsibilities?)
 - Serials crisis
- Open Archiving
 - Variations across disciplines
 - Prejudices and encouraging expansion
 - Relation to OAI
- Non-traditional possibilities
 - Referees as scarce resource and multiple reviews
 - New schemes
 - New ways to fund it

Reasons for Peer-review

- Quality control and certification
- Author recognition
- Guideposts for outsiders and insiders
- Editorial suggestions
- Constructive criticism

Costs

- Access problem -- closed access to journals -- journals not accessible to all researchers.
- Can lower cost of peer review, but not eliminate it.
 Relationship between costs of peer review and costs of serials spiral. Can it be broken?
- Publisher's cost of editorial and processing each article could be as low as €500. This is 100 x greater than the cost of arXiv distribution.
- Shortage of peer reviewers. In NL plans to have cost of reviewers reimbursed ("referee tax")
- Conclusion: There is an irreducible cost to peer-review that must be funded somehow

Some options for covering cost

- Charge for rejection
- Submission side payment
 - by author
 - by author's institution
 - by government funding agencies
 - additional payments for advanced services
 - from self-archiving windfall savings (savings from reduced serials expenditures re-allocated to institutional payments)
- Conclusion: We don't believe any of them (last may happen if time scales are commensurate), but at least one is surely necessary

Discipline and Organizational Factors in Open Archiving

- Long-term trend towards primary information being open accessible.
- Discipline have different approaches, e.g, central archives v. distributed web sites.
- OAI can be used to provide services across distributed systems.
- Requires push-button easy to submit.
- Institutional support to break through real and perceived barriers can be from research center, university, professional society, funding agency. Embolden individuals to act.
- Conclusion: No real difference between goals of different disciplines, but paths may be very different.

OAI issues

- What is the role of the OAI in harvesting full text?

 Minimalist protocol for metadata harvesting including

 URLs to full document. Ethical to link back.
- Is the name "Open Archives Initiatives" confusing?
- Is the name "preprint" confusing? Really should be focused on postprint literature being available in archives.
- Fields in which patents, commercialization, etc., are unlikely to use preprints but authors still want their postprints to be read.

Scarce Resources

- Different kinds of multiple reviews
 - Good when non-overlapping resources used; e.g., CERN collaboration => institution => journal
 - Bad if submitted to successive journals. Is it possible to forward a rejected paper to another journal with its reviews?
- Finding and managing reviewers is a major challenge in running publishing services. Web can help be better and more equitable. Peer-review can be improved by e-print commentary.

New Schemes

- Open reviews (JIME example)
 - May be constrained by willingness of participants to work for "egoboo" (cf. eopinions, Usenet)
- Additional cycles of vetting (social sciences and humanities)
- Internal review (CERN model, PhysNet model)
- Editorial Board (volume => referees)
- Conclusions: To maintain benefits of current system, any new replacement will be at least as expensive in terms of money or referee resources.

Conclusions

- Either eliminate peer-review or find a new way to fund it. Latter preferred.
- New schemes unlikely to preserve benefits while being cheaper.
- Beneficent publisher can't act unilaterally.
- Institutional support needed for archives, author encouragement, new funding models.
- Money may have to come from government funding agencies unless institutions can really manage to redirect library savings.