The reviewer's report is as follows:

Title: Protecting intellectual property associated with Canadian academic clinical trials - approaches and impact

Version: 1 Date: 12 August 2012

Reviewer: Steven Webb

Reviewer's report:

This is a well-written, thoughtful, and interesting manuscript that identifies an area of interest to readership of the Journal. I feel that there are some potential areas of additional discussion that warrant consideration for inclusion within the manuscript.

Major Points

1. Responsibility to complete a trial lies with the investigators who have proposed to conduct the trial. This is a shared responsibility to the community of clinicians who may avail themselves of the results of the study as well as a responsibility to the body that has funded the trial. If investigators feel that their interests in completing the trial are best served by open access, is there any reason why they should not provide open access. Similarly, if investigators feel, for whatever reason, that their interests in completing the trial are best served by restricted access, is there any reason why they should not be able to restrict access. If there is a difference in the real impact of these approaches, on trial productivity and completion, the investigators that use the system that offers advantage will out-compete the investigators who opt for the other model. I think an argument can be constructed that investigators should be open to choose the method that makes sense to them, and that it should not be the role of funding bodies to specify the model of access. My personal view is that restricted access will be wholly counterproductive, but I could be wrong- let those who hold a countervailing view have their opportunity to prove me wrong.

2. A central issue in this paper is concern that the IP in a protocol will be expropriated by others. There may be a range of alternative solutions that allow open access, but reduce the risk of expropriation that could be considered and discussed. It is possible that investigators who work within a clinical trials network (particularly a network with terms of references that cover issues related to IP and its protection) may be offered at least partial protection as a consequence of the capacity of the network to prevent other researchers from conducting the same or similar study in the same location. This obviously won’t stop expropriation by investigators in other countries. Open access, to some extent, can prevent expropriation of a trial concept, as if an expropriated project is submitted for funding, the grant panel that considers the application is more likely to be aware of the preceding study if it has submitted itself to open access. So in other locations should be searching for existing studies. Sometimes, protection against competition from the same trial being conducted elsewhere can be
achieved by the infrastructure that is necessary to conduct a trial being unique to the group that is conducting it, i.e. if your group of investigators is the only group who can feasibly do the trial there is no reason to promote restricted access.

3. I feel the risk of expropriation and value of IP in a protocol may be both over-estimated by the authors. There are few clinical questions that are unique and so, I presume, there is no reason why different investigator groups should not consider developing trials to answer the same research question. Perhaps, if there is something unique and novel about the proposed methods there may be a rationale for restricted access, but the idea of randomly allocating patients to different interventions and then measuring outcomes has, after all, been around for a while.

4. An additional potential defense against expropriation, that might be considered, for those who advocate open access could be better processes for establishing provenance of the trial concept. For example, clinical trial registration sites could collect information on the history of how the trial was developed and when and to whom it was submitted for funding prior to final funding success. At least then, if there were claims of expropriation, there is a documented record of who proposed what when.

5. It could also be argued that there is societal advantage associated with open access (and perhaps this is an argument for funding bodies to have a role). Many of these are outlined in the manuscript, but, it could be argued, that if a trial is expropriated and conducted, because it was available via open access, then there is likely to be more (possibly better) evidence in the public domain to provide better definitive information to clinicians who care for patients, i.e. the original investigators might be harmed but, so what, patients end up with better care.

6. The IP of trial can be substantially more than the protocol. Particularly in resource constrained environments, as is common for investigator-led trials, the protocol is only part of the IP, with other aspects of trial management (operationalisation, ie how trial management get sites to participate and follow the protocol) being as or more important than the protocol.

7. I wonder if the issue of the potential enforceability of NDAs should be discussed. While legal remedies are available are NDAs enforceable and, if so, what realistic prospect of obtaining damages is there and what sort of damages would be possible.

8. It was not clear to me if the model of restricted access model that is discussed in the manuscript includes ongoing restriction of access to the protocol after completion of recruitment and publication. If so, I think this is difficult to justify but it may be useful if the manuscript could clarify this.

**Minor Points**

1. I’m not sure I accept the logic within or the logical connection between the first three sentences in the background- grant funding is competitive but is their compelling information that the difficulty of competition is worsening. Not sure that the reputation of institutions is dependent on ownership and management of IP, as distinct from the academic productivity and the quality of infrastructure
provided by an institution to its faculty members.

2. Line 55, IP can be accorded legal protection, but not sure that is valid to say it should.

3. Publication of trial protocol can still occur with restricted approach, would just occur close to completion of recruitment.

4. Not sure that I agree that the “Need to adhere strictly to protocol and publish study as designed, or publish amendments affecting design or analyses” is a disadvantage. If changes to study design occur these should be formalised by changes in protocol with, in the system of open access, publicly available trail of changes.

**Level of interest:** An article whose findings are important to those with closely related research interests

**Quality of written English:** Acceptable

**Declaration of competing interests:**

I declare that I have no competing interests