

International Issues - Bid to Host

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Major Issues

- Critical distinction: A laboratory with international participation vs an internationally constructed and managed lab: US as an international partner
- Development of formal international agreement
- Role of host institution
- Changes that would have to occur at Fermilab
- Actions we can take now

An Internationally Managed Lab on US Soil

- - **Secure and dependable (U.S.) budgets**
- - **Dividing benefits among the international participants consistent with contributions.**
- - **Non-interference of government agencies; non-politicization of the site.**
- - **U.S. willingness to adapt to recognized international standards and to waive rules.**
- - **Access to the U.S.**
- - **Exceptions on job permits**
- - **Director may be non-U.S. citizen.**
- - **Have to share: contracts and \$\$; positions; scientific glory.**
- - **Is the U.S. dependable?**
- - **Can any agreement protect from Congressional and DOE interference?**

Development of formal international agreement

- Maury Tigner (chair of the ILCSC) also chairs the International Subcommittee of the USLCSC) is drafting a document on international governance, within a U.S. context. Hope to have it available in October. The group doing this includes U.S., Canadian, and Mexican representation
 - **Make a list of everything an international agreement has to accomplish.**
 - **Draft the American version of the Kalmus model.**
- **(Roy)** It is easier to write down issues than solutions. **Solutions are likely to be determined in negotiations between governments and it is unlikely physicists will have the final word.**

“Kalmus” (SGOM) Model

- The GLCP as a “Fixed-term Project located near an existing laboratory
 - **We propose that initially the GLCP should be established for 25 years, including construction time. This should enable the scientific objectives to be met and would limit commitments of the participating governments. There should be a review of the lifetime of the GLCP after ten years of operation with subsequent reviews every 5 years**
- **International representation is based on “three region” model – so we must continue to coordinate with other nations of the Americas**

GLCP and the Host Lab

- **The GLCP should be sited near an existing “Host” laboratory, from which it should be managerially wholly independent. This would:**
- **a) save much of the cost of establishing the infrastructure, support, and services that are needed by any large-scale project, while keeping the number of staff directly employed by the GLCP low;**
- **b) provide the necessary academic and technical ambience from the outset;**
- **c) reduce the cost of ultimate closure of the GLCP by ensuring that facilities owned by it are kept to a minimum.**
- **Relations between the GLCP and the Host Laboratory, and the role of the Host State, are considered in more detail ...**

Host Lab

- **5.2.1 The overall objective in using the Host Laboratory is to minimise the overhead element of the GLCP and to ensure that the full range of necessary services is available locally and does not have to be built up from a zero base.**
- **5.2.2 The Host Laboratory, if necessary involving the Host State, should conclude a detailed agreement with the GLCP concerning the interaction between the two parties and their respective rights and obligations.**
- **5.2.3 The GLCP and the Host Laboratory must be financially and managerially independent of each other. Services and deliverables required from the Host Laboratory by the GLCP should be technically and financially specified, the costing and payment basis defined, and the managerial interfaces established.**
- **5.2.4 None of the general infrastructure investment made in the Host Laboratory by the Host State should belong to the GLCP and, unless agreed otherwise, should not be included in the accounting of the Host State Premium.**

Model not what we might have expected

- Most of us probably imagined the host lab building and managing the LC
- Has its advantages: Can continue to have an independent program
- Question (Maury): What part of the lab resources can go towards this new infrastructure and still maintain a viable program in other areas – discussed 30%.
- Will the LC absorb the (nearby) host lab

To Do: From Maury

- Kalmus model is stronger on governance than management.
- We (Fermilab and U.S.) need to think about authority chain, including the authority of the central team.
- Once the U.S. report is complete it will be necessary to convey to DOE and NSF so they can carry forward to the higher ups in government who will negotiate.

Changes at Fermilab

- Major issues to be understood if Fermilab is host lab:
- Imperative to form a view on the relationship between the host lab and the international project organization.
- Need to think about authority chain, including the authority of the central team.
- How much of the research program at Fermilab would the lab (or the U.S.) be willing to sacrifice?
- Feeling within the discussion that 30% of Fermilab resources devoted to the project is right scale.

Issues we should resolve now “Locally”

- Consensus: Fermilab and LC should be separate organizations to start. (Consistent with Kalmus model.)
- U.S. has no experience base in having an internationally managed/financed laboratory within its borders.
- Fermilab has responsibility to continue a forefront hadron based program during the construction period (at least).

We should develop (a) Scenario(s) that shows how we would evolve our program to achieve the headroom to do this based on a realistic schedule for an LC (and also what our exit strategy would be)

What we can do now Globally

- Show we “get it”
 - LHC a good example
 - Establish ourselves as a good “regional” collaborator
 - Show sensitivity to international issues throughout the HEP program
- Pursue the formal agreements even tho there are many other issues
- Emphasize and exploit the fact that the US govt may see the major value in this project that we can use it to learn how to be an effective international collaborator