Marj Corcoran, for the DPF

and the DPF Committee on DOE Comparative Reviews
At the April APS meeting in Atlanta, the DPF Executive Committee was approached by several people who had concerns about the comparative review process that DOE had carried out for the first time this past year.

Based on these comments the DPF chair line decided to put together a committee to have an independent look at the process.

Going further back, the Committee of Visitors to the DOE recommended comparative reviews for DOE university grants to mitigate long-standing inertia in funding. NSF and NASA have done comparative reviews for many years. The current round of comparative reviews is in response to the COV to OHEP.
It is not our role to second-guess funding decisions, nor do we want to end up on an adversarial position with respect to OHEP.

Our goal is to provide feedback to DOE, to be a communication link between DOE and the HEP community, and to improve the comparative review process going forward.

There is strong support, both within the committee and from those who have communicated with us, for the concept of comparative reviews. There is some concern over the implementation.
Committee membership

Marj Corcoran and John Cumalat, co-chairs
Chip Brock
Michael Dine
Paul Grannis
Klaus Honscheid
Jack Ritchie
Kate Scholberg
Stew Smith
Rick van Kooten
Mike Witherell
Charge to DPF Committee on the DOE Comparative Review for FY12 Funding

Recently one third of all HEP DOE funded groups were comparatively reviewed. There will be a similar reviews this year for FY 13 funding, and next year for FY 14 funding. The due date to respond to the next comparative review is expected to be September.

One of the effects of these reviews is that a significant number of PIs, and the people they supported including senior scientists, post docs and students, have lost their funding. A significant number of new PIs have been added. Given the magnitude of these changes the committee will consider the review and its methodology, and the changes it has produced and write a report (length a few pages) to be sent to the DOE on behalf of the community through the DPF by July 31 (date to be discussed)
It is envisaged that, as the committee do their work, they may:
(a) distribute an early working draft of the report to the community
(b) set up a web page where community input can be given both on the draft report and in general
(c) use survey software to poll the community if they deem it necessary, or otherwise consult directly with the community
(d) meet with the DOE to be briefed
(e) request from DOE such information not already in the public domain as deemed necessary for the committee to carry out its charge.
The committee was put together during the month of June.

Ian Shipsey, the newly-elected DPF vice-chair, asked me to be chair. I requested a co-chair who is John Cumalat. We tried to achieve balance, and to be sure all areas were represented.

The committee put together a list of questions for DOE, which was sent to Glen Crawford and Jim Siegrist on July 9.

We set up a web page and to solicit comments from the community. This web site went live July 29. We also send a general DPF mailing soliciting comments.
Questions to DOE

We sent a (long) list of questions to DOE on July 9. For completeness, here they are.

1. The committee would greatly benefit from a list of proposals funded in FY12, their funding level, activities supported, and personnel breakdowns (faculty, senior scientists, postdocs, students, technical, administrative).

What is the recent (10 year) history of university grants in terms of the number of grants and total funding. Is the university program shrinking, static, or growing relative to the OHEP budget?

What is the breakdown of funded proposals that were new starts?

What is the breakdown of proposals which were declined, including large grants in which individual PI's were not funded?
2. Did OHEP have a specific strategy in mind going into the review process? For example, did it have targets for the number of existing grants that would be renewed and the number of new grants that would be funded?

3. What guidance was given to the applicants? Were they made aware of the potential for dropping individual PIs, and of the critical assessment of Senior Research Scientists?

4. What was the charge given to the reviewers, both mail-in and panelists? Were they given information or guidance with respect to OHEP's expected outcomes?

5. Were specific instructions given to reviewers regarding Senior Research Scientists which were different than the instructions given for post docs or faculty members? If so, what were they? What was the profile of activities of the 11/20 research scientists whose funding was terminated?
6. What degree of uniformity was there among the several mail reviewers for a given proposal? Among the panel reviewers? How did program managers resolve varying assessments?

7. Were numerical scores assigned to each proposal, and if so how were the scores determined? Was there a hard cutoff, below which proposals were not funded? If numerical scores were assigned, could we see a distribution of the scores, and the cutoff value if there was one?

8. How were proposals assigned to reviewers? For example, was a single reviewer assigned only proposals of similar size, or only proposals in the same area, or were the assignments random? Were (for example) Energy Frontier proposals reviewed only by people working in the Energy Frontier, or was there a mix?

9. Did the reviewers have available to them any information from the leaders of their collaborations or from group leaders at labs to help them calibrate the contributions of groups or individuals?

10. Many groups contribute to detector development, to operations of ongoing experiments, or to accelerator-related activities. How were these contributions considered?
Questions to DOE

11. What provision does OHEP make for reviewing those grants or PIs that have multiple activities that cross the energy/intensity/cosmic boundaries? If a single PI was reviewed by different panels (due to his or her being involved in more than one area), how were the separate rankings from different panels handled, especially if they disagree?

12. When a specific PI was not funded, did all the students and post docs under him or her also lose funding? Are there any graduate students who will lose support so that they are unable to complete their degrees?

13. How were shared resources and infrastructure evaluated, especially for large grants that spanned more than one area?

14. The 2009 "Dear colleague" letter cited a criterion that asked for "alignment with programmatic goals". How is this criterion applied in practice? What would be the reaction to a proposal that seeks to establish some new direction in detectors or in physics experiment? How is it applied for theory proposals?
Questions to DOE

15. Is there a specific policy regarding funding of junior faculty in their first year and subsequent years as assistant professors?

16. For theorists, did the panels/DOE assign particular weights to different areas, such as phenomenology, QCD (collider related), model building, or String Theory?

17. Based on the lessons learned from the first round of comparative reviews, what changes in the process if any do you plan to make for the next round?

On Aug 21 with Glen Crawford and Alan Stone responded in a lengthy conference call. In that conversation, DOE said it would not provide written responses, preferring verbal discussion and providing supplementary material.
The web site is linked from the DPF site

http://dpfnewsletter.org/?p=792

We have received four public comments and about twice as many private comments. Some of the private comments involved lengthy conversations with individuals. Most of the responses have been from those who have lost funding.
There is strong support in the community for such a process, although, several respondents expressed concerns about the implementation.

Concerns expressed:

We heard from panel members and DOE that scoring of proposals tended to have a small spread, requiring program managers to make sharper distinctions than the reviewers.

Some individuals and grants span different frontiers. Is the full range of an individual or group's contributions taken into account, given that each activity was reviewed by different panels?

Some of the funding changes were very significant and abrupt. People have or will soon lose their jobs, and the period of time to adjust, although not zero, is short. If funding levels must fall, the changes should be more adiabatic.
We heard from both PIs and experiment spokespersons that the funding decisions were not always aligned with the needs of ongoing experiments.

Experiment spokespersons are a valuable source of information on group and individual contributions. There were not systematic attempts to gather this information.

Cutting funding for graduate students who are then picked up by the department has a negative impact on the department's and university's view of the group. Funding cuts may impact future faculty hires.

Some groups had negotiated favorable overhead agreements with their universities. If grants are terminated and the faculty re-apply in later years, these favorable agreements may be lost.
Expected timeline

Possible additional phone conference or other input from DOE within a few weeks.

A few more weeks to allow comments from the community, especially now that vacations are mostly over.

Try to establish a consensus of the committee as to the comments/suggestions we want to put forward--mid September.

Final report — end of September.