

AAC Charge Questions – final, Dec. 3, 2020

Fermilab AAC meeting Wed Dec 9, 2020 (9:30 – 13:30 Central)

<https://indico.fnal.gov/event/46154/>

1. Recommendations from AAC 2019

Have all the recommendations by AAC 2019 been adequately addressed?

2. High Field Magnet Program

- a. Assess the results of the 15T magnet demonstrator tests.
- b. The Fermilab High Field Magnet R&D program is an integral part of the US Magnet Development Program (MDP). In 2020, the MDP underwent re-planning of short- and long-term R&D activities. Are the short- and long-term activities at Fermilab well defined and resources secured?

3. FAST & IOTA Progress & Research Program

- a. Run-II of the FAST and IOTA research program was conducted in Dec 2019 – Mar 2020.
 - i. Assess the operations efficiency, and the science output of FAST/IOTA Run II.
- b. Is the near-term and long-term science program well defined?
- c. Assess the progress and plans for the IOTA proton injector?

4. SRF R&D Progress and Research Program

Assess the Fermilab SRF R&D program progress since last AAC. Is this research program adequately setup to align with and to enable future Fermilab, national and international projects?

5. Beam Energy Deposition and Fermilab MARS code

Assess the Fermilab's effort in beam energy deposition and particle/radiation production modeling. What are the long-term plans for this effort? Is the MARS code effort adequate to sustain future Fermilab program demands?

6. Accelerator Operations

Assess the efficiency (high-level view) and performance of Fermilab Accelerator operations. Assess FY21 the proposed red and blue curves. Are the goals and plans for the near future (including g-2 and Mu2e) well understood?

END of Charge Questions