ILC GLOBAL SYSTEMS MEETING

CONVENTIONAL FACILITIES AND SITING GROUP

Status and Overview

V. Kuchler, J. Osborne, A. Enomoto

Current CFS Efforts

- Accelerator Integration and Design is a Major Focus of Current Effort
- Main Linac Tunnel Configuration Alternative Study
- Proposed Dubna Site Soil Boring Report Analysis and Planning for Additional Preliminary Design Efforts
- Rapid Excavation and Tunneling Conference

Accelerator Integration and Design

- Coordination and Status Meeting was Held at DESY on May 28 & 29
- All Area Systems Provided a Status Report with Respect to the Accelerator Integration and Design Effort
  - Current Design Status and Similarities/Differences from RDR Criteria
  - Revised Area System Designs are in Varying Degrees of Maturity
  - There are Some Dependencies for Criteria Development Between the Area Systems
- CFS Video/Webex Meetings will be Used to Meet with Individual Are System Representatives
- A Meeting will be Held at SLAC on July 20 &21 to Develop, with Area System Input, a Preliminary Overall CFS Machine Layout

Main Linac Tunnel Configuration Study

- FESS Engineering Support has Been Provided to Continue This Effort
- Hanson Engineering is Now Under Contract to Support This Effort
- Work is Continuing and is Scheduled to be Completed in Time for the September GDE Meeting
- If Funding is Provided, JINR Will Provide Input for This Study for Near Surface Enclosure Alternatives

Dubna Site Soil Boring Report

- Meeting was Held at DESY on June 25 & 26
- JINR and GSPI Representatives Attended the Meeting
- The Soil Boring Report has been Partially Translated into and English Version
- A Written Report will be Generated to Record the Results of the Meeting and Future Plans for JINR/GSPI Efforts for Continued CFS Preliminary Design for the Dubna Site

1.0 Executive Summary/Overview (M. Ross) 2 Pages

2.0 GSPI Soil Boring Report (A. Dudarev) 10 Pages

3.0 Description of Current Dubna Site Design (G. Shirkov – W. Bialöwons) 5 Pages

- 3.1 Current Status of Preliminary Design (Shallow Bored Tunnel with Surface Level Gallery)
- 3.2 Verification of GSPI Soil Boring Report
- 3.3 Status of Cost Estimating Effort

4.0 Near Term Topics for Further Investigation (V. Kuchler – JINR & GSPI)3 Pages

- 4.1 Identification of Optimal Location for Dubna Sample Site
- 4.2 Additional Field Investigation for Site Definition
- 4.3 Investigation of Alternative Tunnel Configurations for Shallow Siting
- 4.4 Analysis of Life Safety and Egress Strategies of Alternative Tunnel Configurations
- 4.5 Cost Estimates for Alternative Tunnel Configurations

5.0 Longer Term Planning Opportunities and Schedule ?

6.0 Summary (V. Kuchler) 2 Pages

7.0 References

- 7.1 Soil Boring Report (Original)
- 7.2 Soil Boring Report (English Version)

Schedule:

Vic's First Preliminary Descriptions - July 10
G. Shirkov Soil Boring Report Release Agreement w/dist to V. Kuchler and M. Ross - July 10

First Draft - July 31 (Including Translations in ILC doc)

First Full Draft with Introduction and Summary - August 14

First Edit - August 28

Final Document - September 11

Rapid Excavation and Tunneling Conference

- Held Every Two Years and International in Nature
- Papers are Presented Describing Underground and Tunneling Projects Worldwide
  - Transportation Tunnels for Auto and Train Traffic
  - Hydroelectric Generation
  - Potable Water Distribution for both Drinking and Irrigation
  - Micro Tunneling for Utility and Infrastructure Distribution
  - Construction Methods for Shaft, Tunnel and Caverns
  - Geotechnical Investigation Methods
  - Project Management Techniques
- Sponsor Display Area Provides Opportunities for Interaction with Equipment Manufacturers and Product and Service Companies