


NSTX-U Recovery Project Team Meeting

Les Hill, Project Manager
September 20, 2019

Long list of challenging objectives were put on the table at last team meeting on May 22...daunting at the time

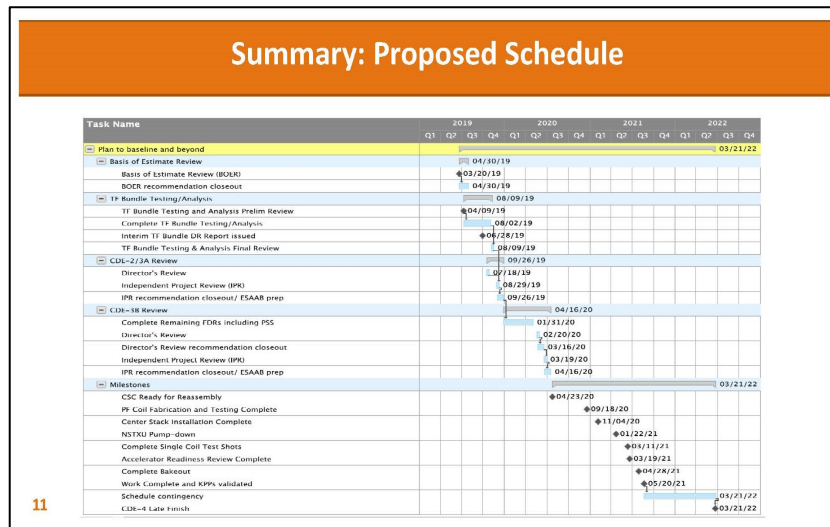


**DOE-FES Briefing:
NSTX-U Recovery Project
Path to CDE-2/3A Baseline Approval**

**R. J. Hawryluk, L. Hill
April 11, 2019**

April 11th meeting w/DOE resulted in an almost immediate \$2.5M increase in interim spend authorization – vital to keeping the critical path moving.

Resulted from master plan and schedule presented to DOE on April 11th to *baseline the project before the end of FY2019.*



Scores of PPPL staff & contractors contributed to meeting these objectives

- Minimize impact to March 2021 completion ✓
- BoER ✓
- TF Bundle Analysis ✓
- Passive Plates FDR ✓
- Machine Core Structures FDR
- PF-2/5 Alignment FDR ✓
- Director's Review ✓
- Independent Project Review ✓
- COGs
- Engineers
- Designers
- Tech Shop
- Procurement team
- QA/QC team
- Human Resources team
- APMs, P&C support and project controls

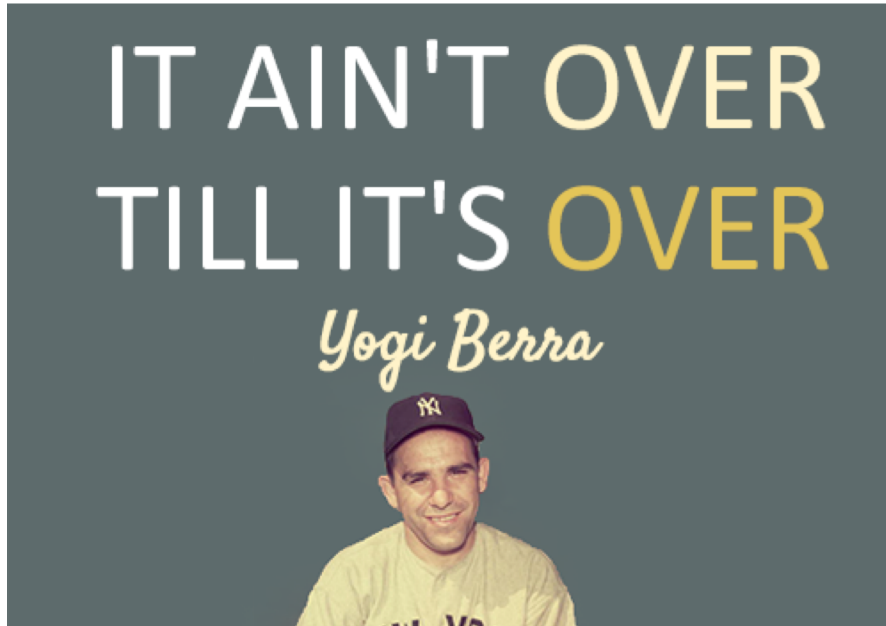
CDE-2/3A ESAAB approval pending – expect this in September!

Great job and thank you all!

- Level of project team commitment and support evident throughout all of this
- Level of Laboratory commitment and support evident throughout all of this
- Level of DOE commitment and support evident throughout all of this
- Project team is now complete

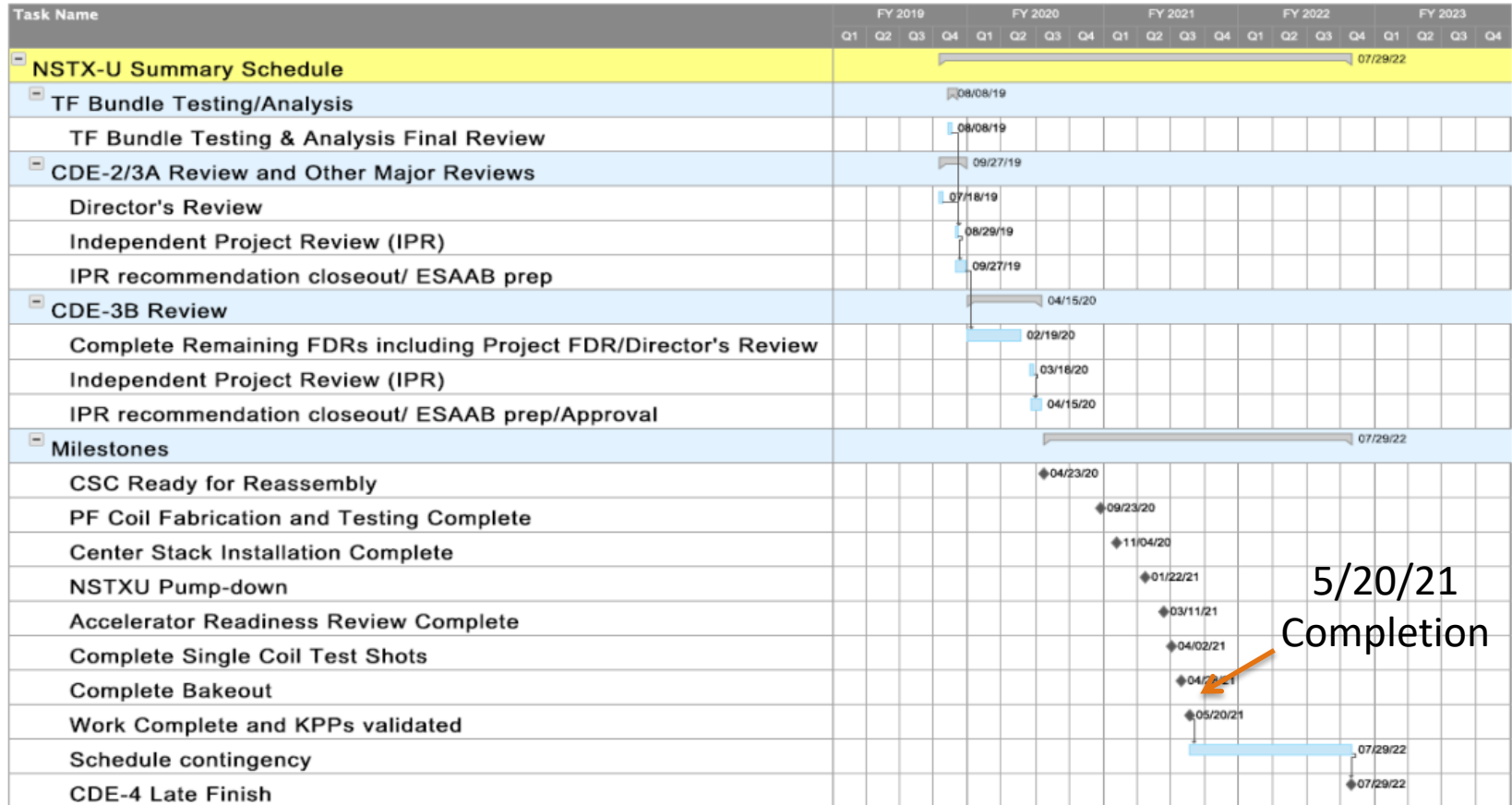


CD-2/3A approval is the start of the journey



CDE-4 and turning a high-performance, reliable machine to our researchers is the destination!

Here's the road to completion



Major milestones on the road to completion

- EVMS Surveillance [December 4-5]
- Project-Level FDR [February 2020]
- CDE-3B Approval [April 15, 2020]
...with all of the trimmings
- Early Completion 😊 [May 20, 2021]



Here is the real, embedded challenge

Organized, efficient 50% increase in project run rate...

	FY17	FY18	FY19	FY20	FY21	TOTAL
OPC	16.8					16.8
TEC	3.4	30.1	40.1	63.7	11.3	148.6
Contingency			1.5	6.4	26.1	34.0
TPC	20.2	30.1	41.6	70.1	37.4	199.4



New tools to meet this challenge

- Innovative procurement solutions will result in streamlined acquisition of fabricated parts and components
 - Fabrication BOAs
 - Metrology BOAs
 - IDIQ Contracts
- Lab-wide staffing BOAs to rapidly recruit and deploy staff using streamlined process orchestrated out of HR
- More on the way...



Near term focus and objectives

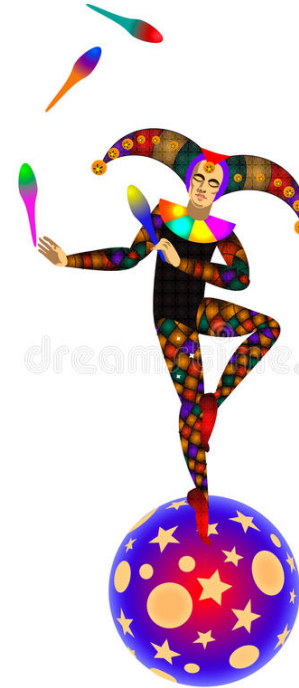
- Clear up outstanding chits and recommendation
- Work the plan and complete remaining project designs by end of calendar year
- Engage Laboratory stakeholders and begin detailed, nth degree planning



Simple, wholesome goal: Safely deliver a high-performance, reliable machine in May 2021

Simultaneous excellence...

- Safety – protecting our workers and each other
- Unwavering engineering rigor
- Relentless problem solving
- Uncompromising commitment to quality
- On-time completion
- Cost performance



Questions?

