2.1 Hot Cell Project Roadmap Project Integrator Information Day

Magnus Gohran Project Leader

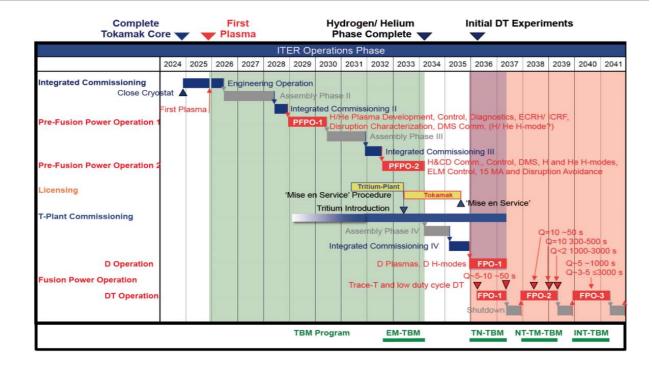
Disclaimer: No information provided in the current slides is binding.

The views and opinions expressed herein do not necessarily reflect those of the ITER Organization



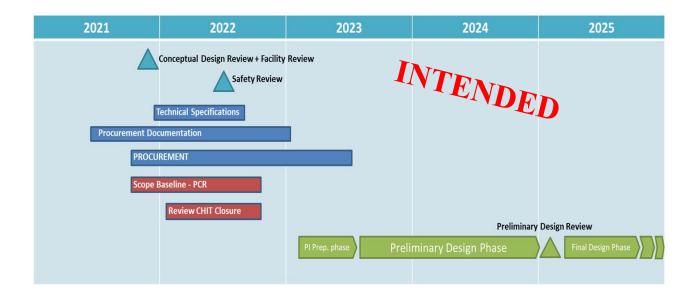
ITER Schedule

- HCF (Hot Cell Facility) required functions first link into the PFPO-1, then FPO-1
- There is an ITER general rebaselining ongoing
- This will push PFPO-1 (Pre-Fusion Power Operation) to the right <u>but not change the FPO-1</u> (Fusion Power Operation) date

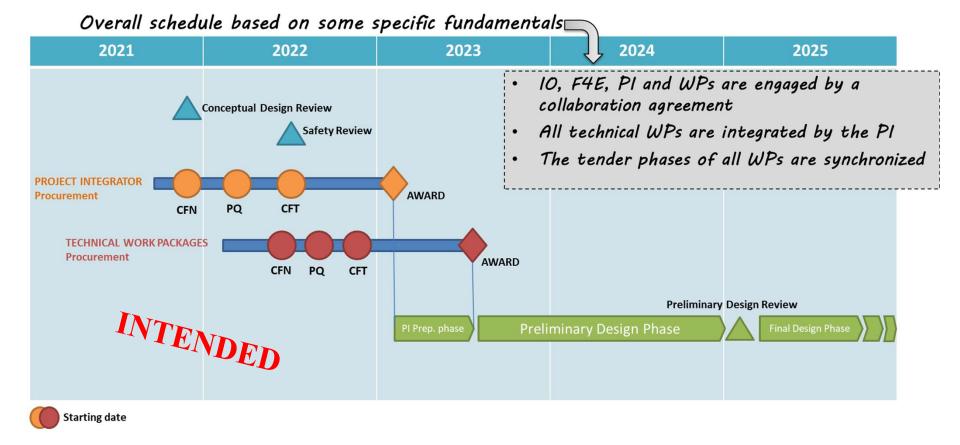


HCF Near Term Schedule

- This year (2022) will be devoted mainly to:
 - Procurement,
 - Safety Review,
 - CDR CHIT closure
 - Scope & Program Baseline
- In Q1 2023, the Project Integrator contract should be signed (see next slide)
- 4-6 months later, the technical Work Packages should be onboard (see next slide)
- Preliminary Design will officially start upon technical Work
 Package contract signatures



HCF Procurement Schedule





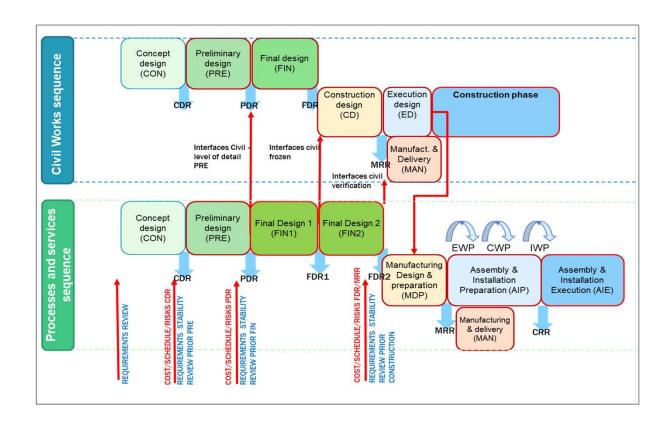
HCF Near Term Major Intended Milestones

INTENDED

Milestone	Date	Description
CDR	Nov -21	Conceptual Design Review of PBS 62.21 and 62.24
FR	Dec -21	Facility Review of the HCF
SR	Sept -22	Safety Review of HCF PT10 and RPrS update Safety File
CS-PI	Feb-23	Contract Signature Project Integrator
CS-RH	Jun-23	Contract Signature Remote Handling
CS-RW	Jul-23	Contract Signature Radiological Waste
CS-BS	Jun-23	Contract Signature Building Systems
CS-CW	Jul-23	Contract Signature Civil Works
PD	Jul-23	Start of Preliminary Design
PDR	Q1-25	Preliminary Design Review

HCF Design Process

- The engineering process is built without schedule gaps
- Civil Works (CW) hold the critical path from Construction Design
- Iterations (level of change) are needed based on the level of design detail
- FDR1 aims at freezing interfaces between CW, Process and Systems
- FDR2 to finish Process and Systems Final Design.



Collaborative Strategy / Golden Rules

- 1. <u>Integrated team</u> of the Clients participants, best able to deliver the required project outcomes defined by the IO as Nuclear Operator (outcome-based contract). Early & flexible involvement of these stakeholders and their supply chains.
- 2. <u>Culture, behaviours</u> and expressed commitment to collaboration, mutual support, openness, constructive challenge, innovation, efficiency, outperformance, no fault, no blame.
- 3. Visible commitment and unconditional support from the executive of each participant.
- **4.** <u>Equitable shared pain/gain</u> based on collective success in achieving required project outcomes rather than individual success or individual scope.
- 5. Shared ownership of risks and their management.
- 6. Equitable internal management and governance where decisions are on a "best-for project" basis.
- 7. The Clients shall keep some <u>reserved matters</u> (e.g. decisions affecting the HCF functionality, and/or safety case, licensing arrangements, cost/schedule changes that are beyond the delegations provided to the collaboration board).
- 8. Alignment of participants' objectives.
- 9. Shared information and tools which facilitate all of the above.
- 10.Contracts with obligations around <u>mutual relationship and collective performance</u> and which facilitate all of the above.
- 11.Payment mechanisms and <u>financial incentives</u> which are transparent and which facilitate all of the above, and support delivery of the HCF project outcome

HCF Procurement Strategy

INTENDED es

> Long term contracts covering the entire HCC project phases

- From preliminary design to commissioning
- Step-by-step commitment with break points to update accurately to the upcoming phase
- A strong yet realistic early involvement of the manufacturers/constructers within the design phases

> Collaboration framework promoting best-for-project decisions

- Clients (IO as Design Authority and F4E) + Project Integrator + Technical Work
 Packages (Tier-1 contractors) committed within a common poly-party agreement
- Collaboration features: open book commitment, collaborative decision making, shared risk and reward, aligned commercial incentives, etc.

> A win-win incentive scheme

- Mainly reimbursable cost scheme type contacts
- Common incentives on target prices



2.2 Hot Cell Project Governance Project Integrator Information Day

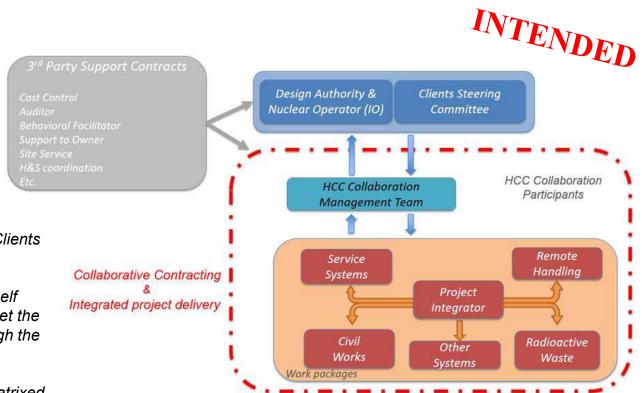
Magnus Gohran Project Leader

Disclaimer: No information provided in the current slides is binding.

The views and opinions expressed herein do not necessarily reflect those of the ITER Organization



HCF Procurement Strategy



This line describe the border between Clients and Participants.

The Collaboration will have certain self governance within the line, the clients set the input rules and guidelines for this through the Collaboration Agreement

The Clients will also be participants – matrixed into the collaboration organization

HCF Future Governance and Organization

- **Project Execution** Governance are not yet agreed
- IO is the Design Authority
- There is a separation between Project **Execution and Project** Control (green boundary)
- There should be a delegation of accountability to the project

