Crab Cavities Technical Coordination I

Location: 376/01-020

Date: 30th May 2016

Time: 10.30

Scope: coordination and alignment of tasks involved in the preparation of SPS tests, follow up of

master plan.

Attendees: Alick Macpherson, Aurelio Berjillos Barranco, Carlo Zanoni, Eric Montesinos, Frank Gerigk,

Giovanna Vandoni, Krzysztof Brodzinski, Kurt Artoos, Marco Garlasche, Mathieu Therasse,

Ofelia Capatina, Rama Calaga, Paula Freijedo Menendez

Introduction:

Frank introduces the new coordination meeting in the scope of the Hi-Lumi work package: Crab Cavities Technical Coordination (CCTC). The meeting will be held with a bi-weekly recurrence.

As part of the introduction, Frank overviews the link-persons for the various tasks concerned by the CCTC. All the material is available on indico:

https://indico.cern.ch/category/8048/

The CCTC meetings are chaired by:

- Frank Gerigk (as Technical Coordinator)
- Giovanna Vandoni (as Deputy)
- Carlo Zanoni (as Scientific Secretary)
- Aurelio Barjillos Barranco (Planning)

Christelle Gaignant (BE/ASR) is coordinating Safety and will be added as link person and also to the mailing lists.

An initial action list has also been presented. It will be monitored and updated by Carlo. A list of open points/discussions will also be created and maintained.

Master Plan

Aurelio gives a general overview of the master plan where he has summarized the main activities with blocks. He stresses the need of input in order to detail the schedule and the need to guarantee proper contingency on the last activities.

Alick remarks that in his opinion the time allocated to SM18 CM tests is very tight. Aurelio's planning is not yet at that detail level, but is the tool to clarify this kind of issues. Rama highlights that besides the planning, the technical sequence is still missing several inputs. The sequence itself should become the skeleton of the Acceptance Criteria document, written also for the LHC hardware, and which is missing several contributions.

Cavity Work Flow

A discussion over the cavity production-conditioning-testing workflow is held. The main steps are attached on the whiteboard, reordered and discussed. The results, along with the main comments, are in attachment.



Among the discussion, the sequence of the cold tests has predominant importance. There are 3 possible cold tests: bare cavity (along with cold leak tightness), dressed cavity, CM.

For the time being it is agreed to make a dressed cavity test only for cavity 1, and to skip the dressed cavity test for cavity 2, which should allow to advance the CM assembly by 2-3 weeks with respect to the present planning (provided all tests are successful). The vertical dressed cavity test appears less representative in terms of stress and system validation than the bare test and the CM test.

Action list:

	Action	Responsible	Opened	Closed	Result, Comment
1	Complete list of acceptance criteria	all	13.6.16		
2	List of people whose input is missing in the list of acceptance criteria	Rama	13.6.16		
3	Provide input to complete master plan	All	13.6.16		
4	Preparation of draft work flow towards CM assembly for next meeting	Carlo	13.6.16		

Subjects for next meeting:

- Heat treatment procedure of bare cavity (Alick)
- Complete the work flow planning with link persons for steps 1-26 (all).
- Continuation of work flow planning from step 26, "Clean room assembly of single cavities with couplers" (all).

Minutes taken by Carlo

Next meeting: Monday 13th of June