Status of Use Cases

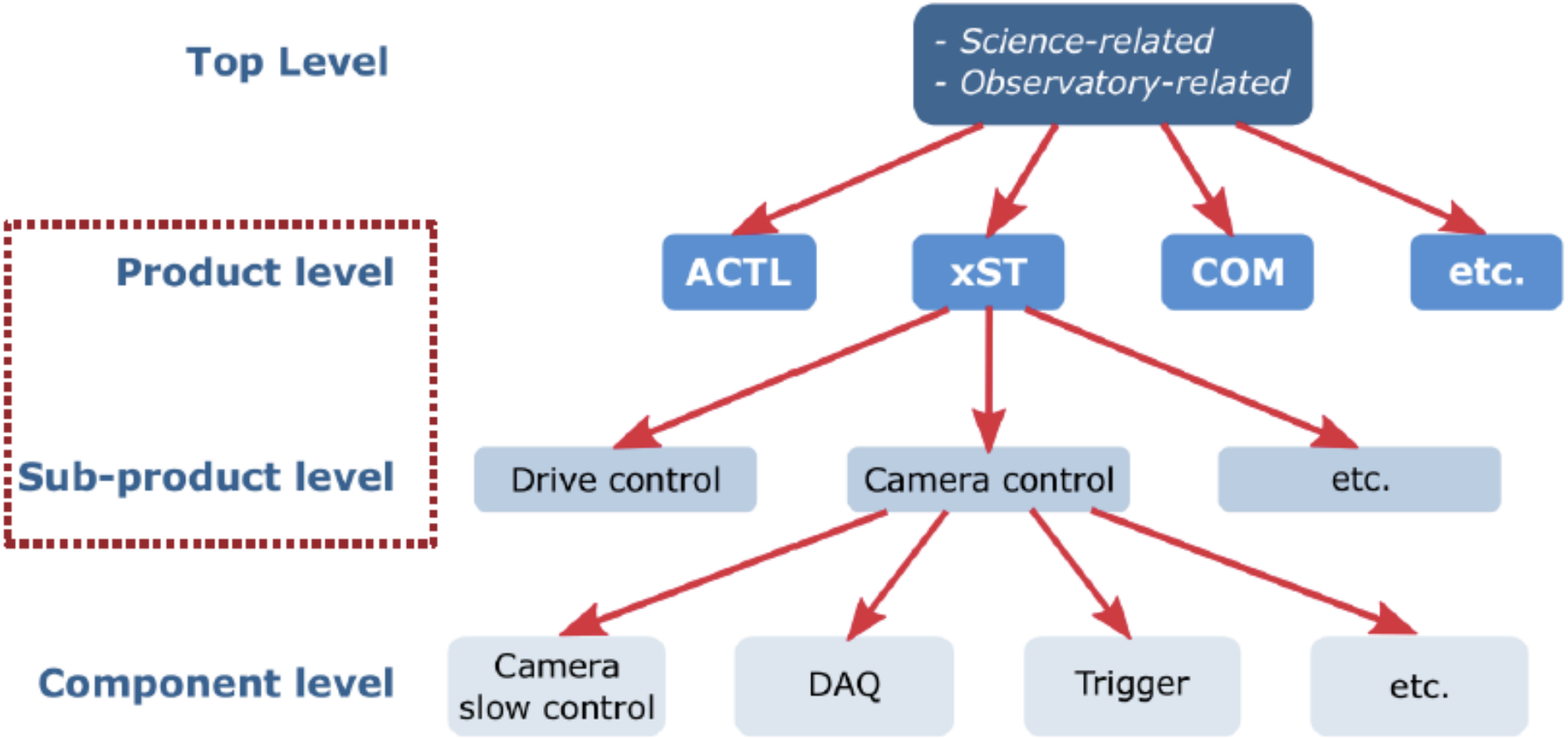
CCF general meeting, Barcelona, Oct. 4nd, 2017

Franca Cassol (CPPM Marseille)

Slide from Raquel (Oct 2016)

Introduction (e.g. WP levels of Ucs)

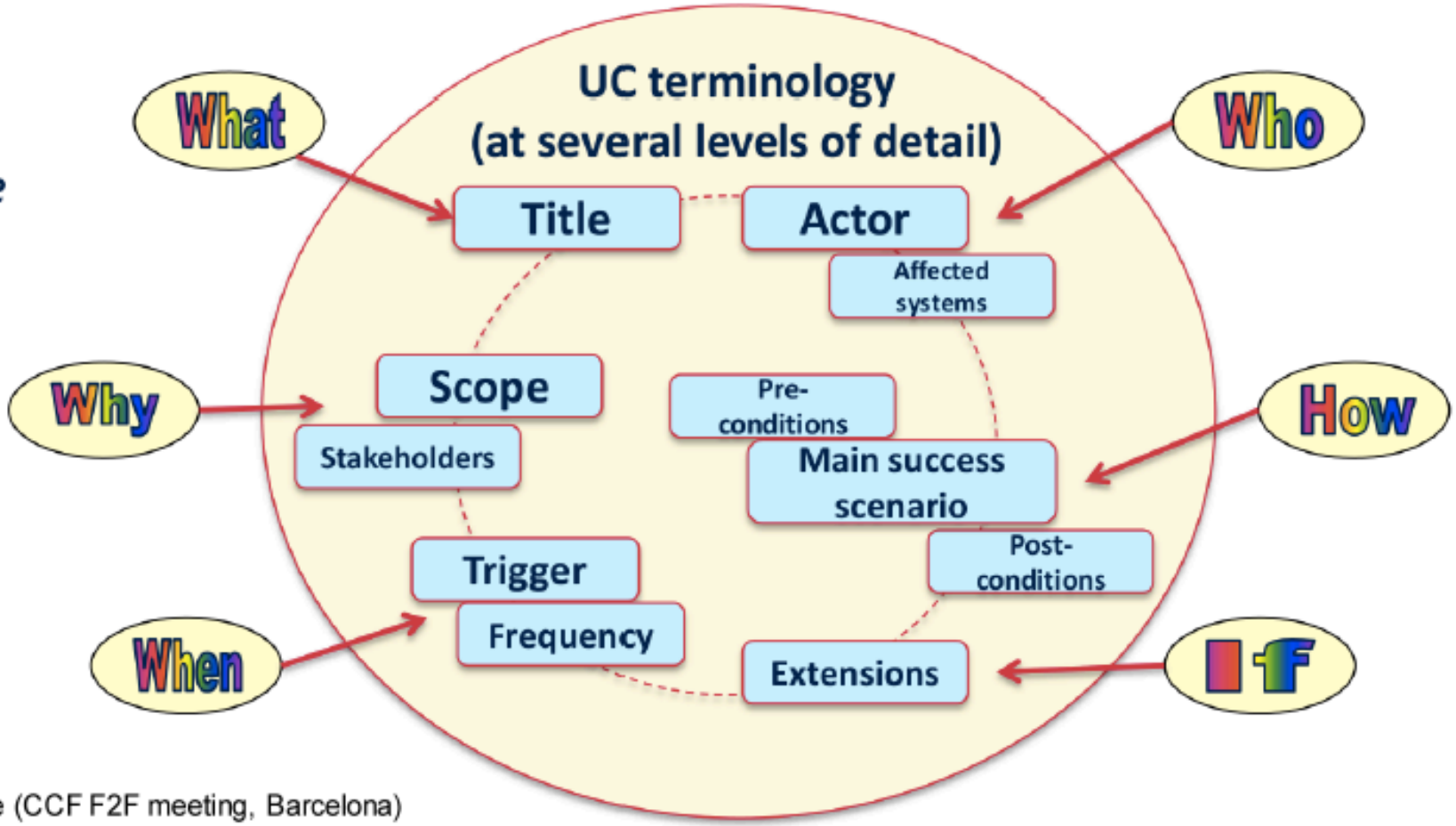
J. Goullon



Slide from Raquel (Oct 2016)

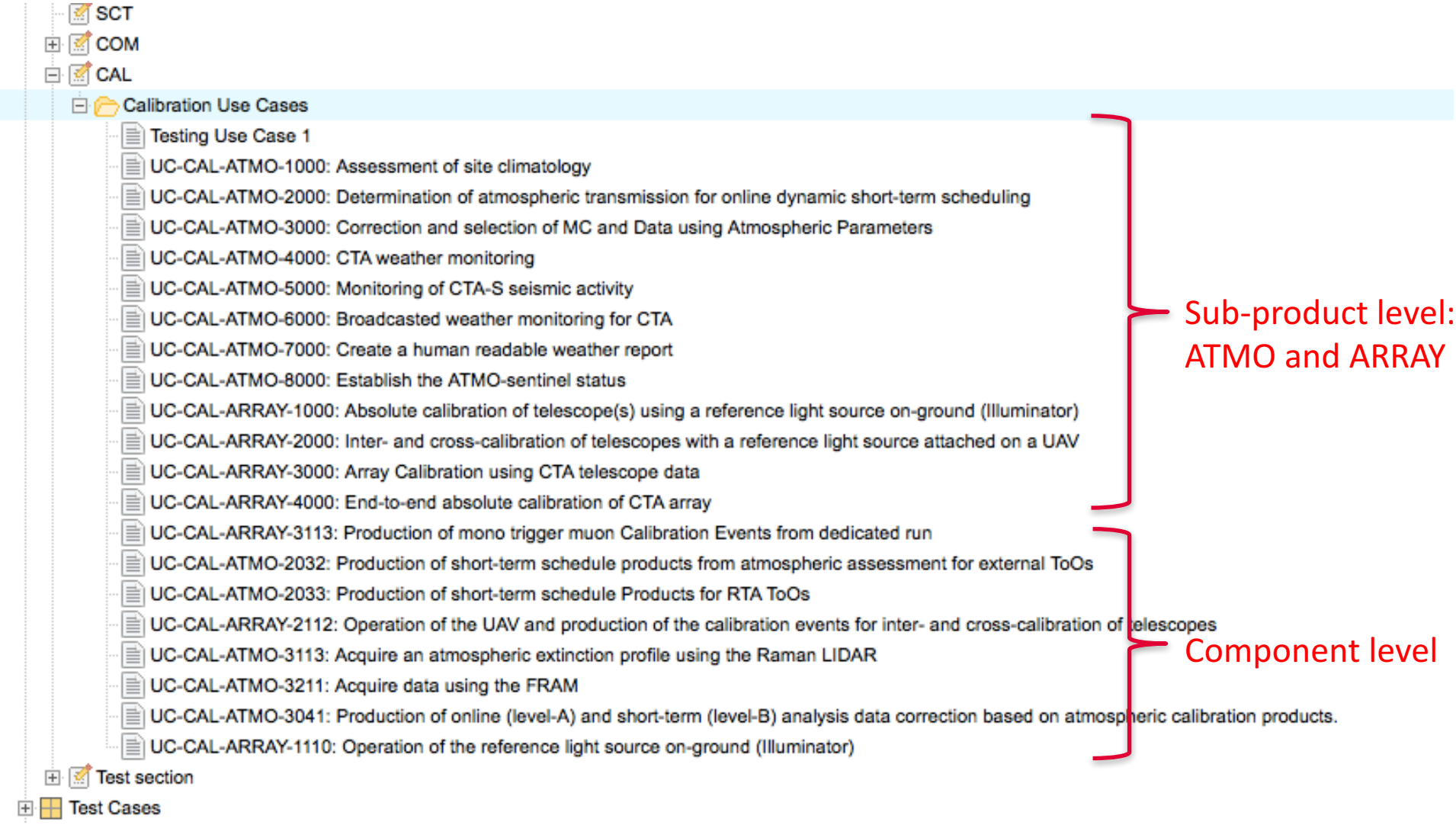
Introduction

Human questions (few, more or less detailed)



M.C. Maccarone (CCF F2F meeting, Barcelona)

Use Cases in Jama NOW



Product level

- Describe CAL as a black box: main tasks
  - UC-CAL-0001: Calibration of CTA data
  - UC-CAL-0002: Monitoring of site environment conditions
  - UC-CAL-0003: Optimize the quality of observations and CTA duty cycle.

Abandoned because replaced by CTAO use cases

Sub-product level

- Camera calibration: Missing (mainly for lack of man power)
- Array calibration (UC-CAL-ARRAY-X000): In Jama
- Atmosphere calibration (UC-CAL-ARRAY-X000): In Jama
- Pointing calibration: Missing (mainly for lack of man power)

Component level

- Third level: UC-CAL-subWP-Xxyz -> CCF sub-WP device/method (Z) as a black box.
- Describe the functionalities (N) of the different device/method (Y), classified into.
  - XY1N -> **Operation** (e.g. N control, etc. UCs)
  - XY2N -> **Production** of **Calibration Events** (e.g. N ways of producing the calibration events)
  - XY3N -> **Production** of **Calibration Products** (e.g. N different Products)
  - XY4N -> **Integration** of **Calibration Products**

Only few UC with priority or connected to UC-CTAO in Jama

CAL UCs (component level) (priority)
(Array Calibration, UC-CAL-ARRAY-XYZ0)

- **UC-CAL-ARRAY-3000**: "Array Calibration using CTA telescope data"
  - UC-CAL-ARRAY-3113: Production of mono trigger muon Calibration from dedicated run (**UC-CTAO-090**)
- **UC-CAL-ARRAY-4000**: "End-to-end absolute calibration of CTA array"
  - UC-CAL-ARRAY-4031: Perform a test observation of a reference gamma-ray source.

Slide from Raquel (Oct 2016)

CAL UCs (component level) (priority)
(Atmosphere Calibration, UC-CAL-ATMO-X000)

- **UC-CAL-ATMO-2000**: "Atmospheric monitoring for online dynamic
- short-term scheduling"
  - UC-CAL-ATMO-2032: Production of short-term schedule products for external ToOs (**UC-CTAO-140**)
  - UC-CAL-ATMO-2033: Production of short-term schedule Products for RTA ToOs (**UC-CTAO-150**)
- **UC-CAL-ATMO-3000**: "Correction and selection of MC and Data using Atmospheric Parameters"
  - UC-CAL-ATMO-3041: Production of on-line data correction based on atmospheric calibration products (**UC-CTAO-160**)
  - UC-CAL-ATMO-3100: Acquire calibration data using the Raman LIDAR (**UC-CTAO-160**)
  - UC-CAL-ATMO-3113: Take a LIDAR shot to zenith and analize the atmospheric transmission (**UC-CTAO-070**)
  - UC-CAL-ATMO-3200: Acquire calibration data using the FRAM (**UC-CTAO-160**)
  - UC-CAL-ATMO-3231: Determine periods of similar atmospheric conditions (**UC-CTAO-270**)

Slide from Raquel (Oct 2016)

Next steps

Try to go further :

- Still not clear how to proceed for the missing Product Level UCs (camera calibration and pointing calibration): probably better to wait to see what the Architecture group suggests

- **Let terminate the Component level** of the ATMO and ARRAY UCs
  1. Complete the definition of the UCs list (Markus and F.)
  2. Write all new and already defined/started UCs

Assigned people will be solicited, thanks to contribute!