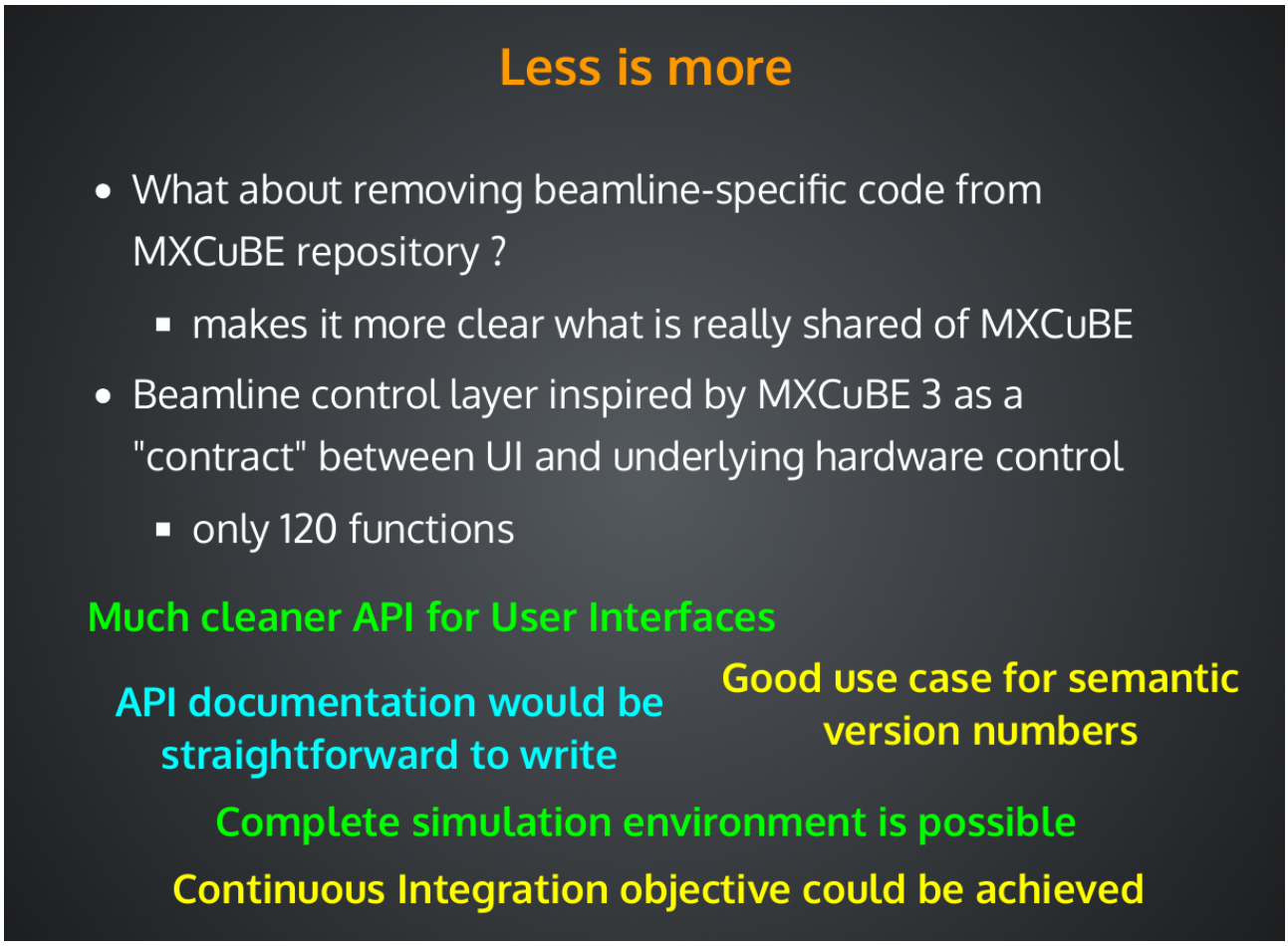
# MXCuBE Developers Committee

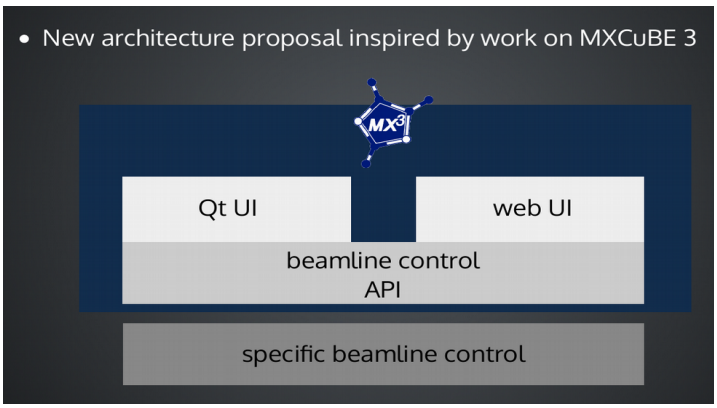
Friday 20180202 - minutes

## New HardwareObject-UI interface

Matias presented work from MXCuBE 3, which was able to do all necessary interaction between user interface and hardware objects using one of 120 specific function calls and 21 signals. This is implemented and known to be working, since MXCuBE3 has the full functionality of its predecessor.




It was agreed to use this as (the basis of) an interface definition, and work towards reorganising the MXCuBE code to work through this interface. MXCuBE 3 of course has already done this, and the MXCuBE 2 developers agreed to aim for the same goal. It was suggested that considerable work might be needed to specify and document not only function signatures but the content and significance of parameters and usage, in order to arrive at a suitable software contract.




The first task for the developers committee is to investigate the practical possibility and resource requirements. The steering committee will follow this work, mainly through Gleb as its embedded representative, and will decide on implementation and on further plans as soon as the Developers Committee can report its conclusions.

## Code and repository structure

Further actions will be considered once it is decided (whether) to go ahead with the restructuring

It was agreed in general terms that repositories and directories should be reorganised to reflect the new interface, so that a core consisting of the classes supporting the interface and mock objects was separated from site-specific, and possibly from all, implementation. Further subdivision into components and collaboration at the implementation level was positively viewed but left for later discussion. Specifically there was discussion of: 1) dividing the core further into components with defined interfaces; MXCuBE3 had already identified a division into nine components. 2) Setting up shared code at the implementation level, e.g. sharing code for specific instrument types, and keeping this as ‘part of MXCuBE’ rather than at the individual site level.

## Branches and versions

Branches, releases and versions were discussed but no consensus was reached.
It is noted, however that

- Many synchrotrons are upgrading to a newer version over the first half of 2018 or so
- Adoption of the new interface would greatly simplify both harmonisation and testing, so that branch and release structure might be rediscussed once the issue of the new interface is addressed
- EMBL-HH showed no inclination to change their current practice of working from the master branch, but declared that their actual builds were *not* taken directly from master but done with a separate system, and that people therefore need have no inhibitions about checking code into master on their account.

## Action items

- Matias will prepare a Github issue that presents the UI interface developed by MXCuBE3 with pointers to documentation, code, etc.
- The MXCuBE developers will meet electronically on the first Tuesday of every month at 1400 GMT to coordinate and advance work in these issues.
    - The first meeting will be on Tuesday 13/2, mainly for testing communication protocols and agree on initial actions
    - Rasmus/GPhL will call the meetings and circulate minutes
    - Gleb will report to the steering committee.
- Communication will be by Github Issues and/or using the mxcube@esrf.fr mailing list
    - Marcus/Matias to investigate whether there is a mailing list archive for this list, and if so how it can be accessed from outside ESRF.