

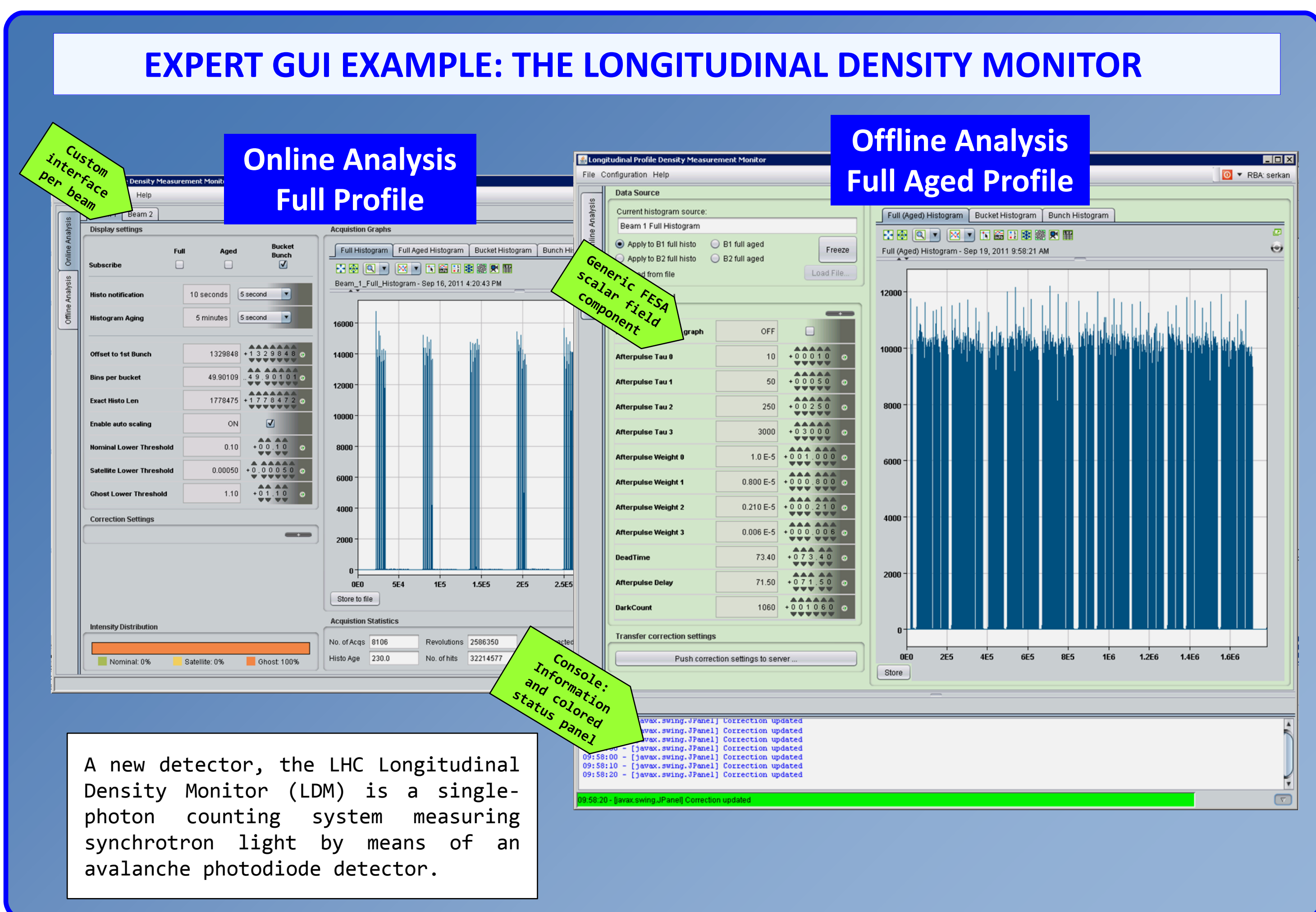
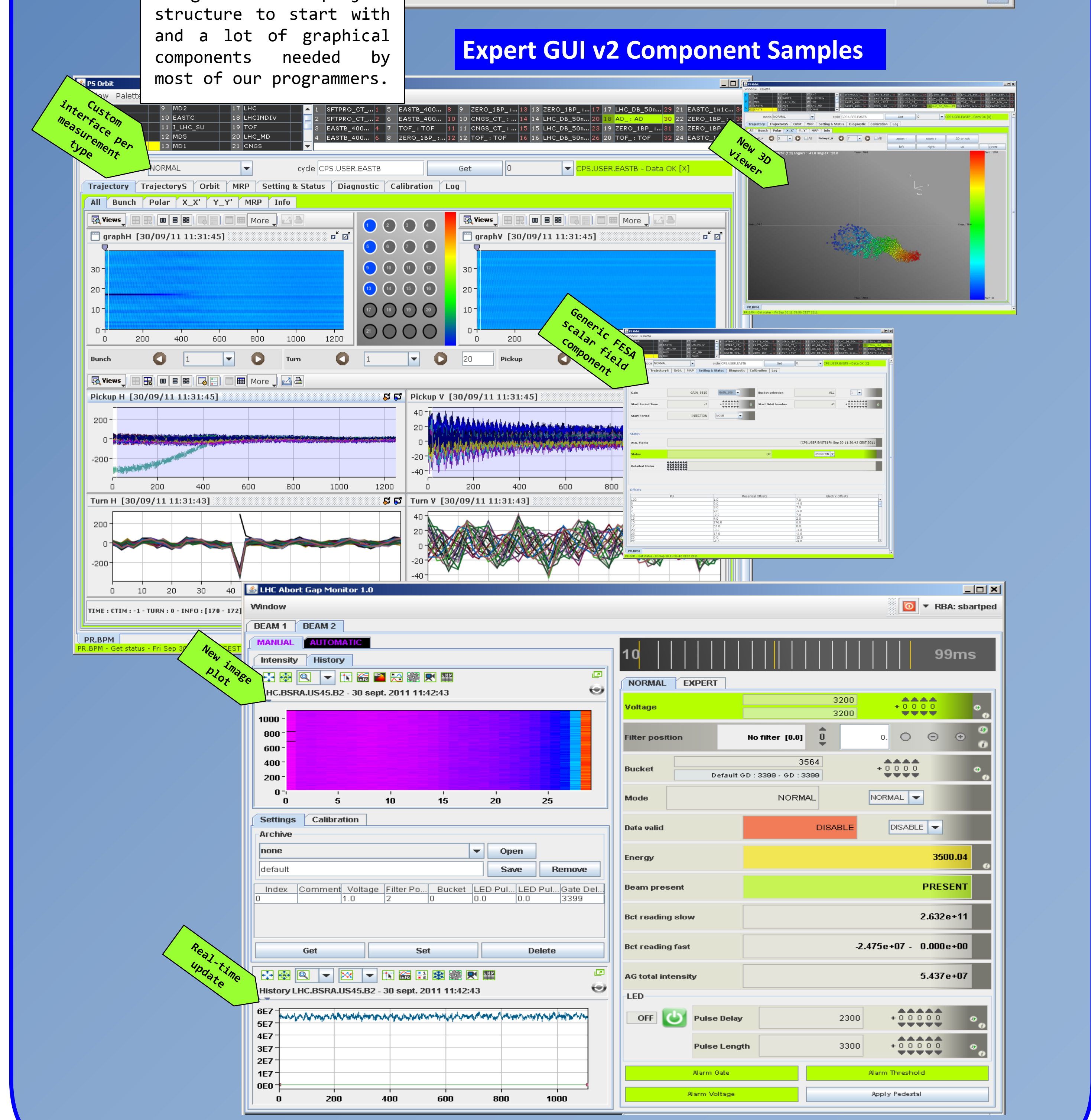
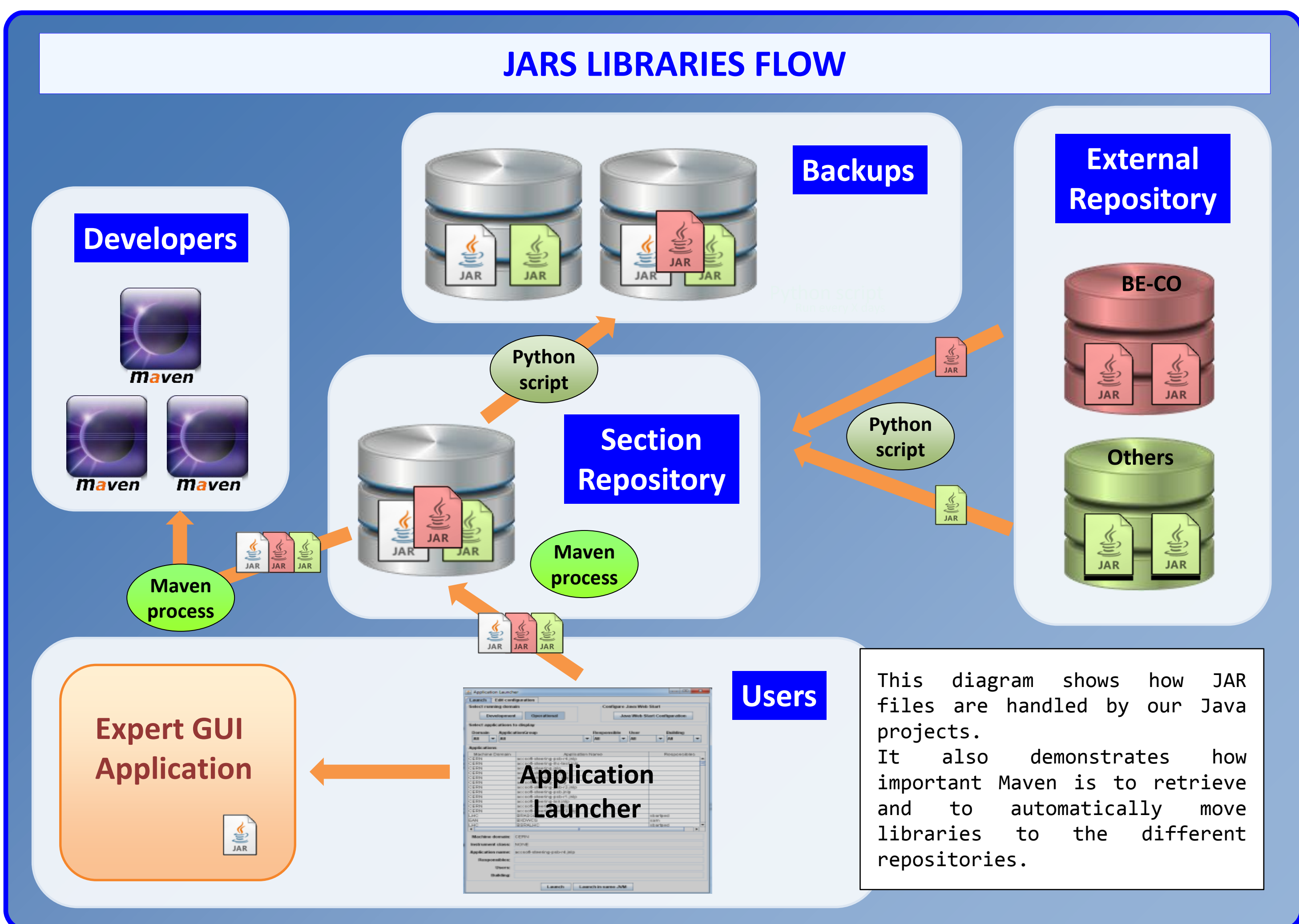
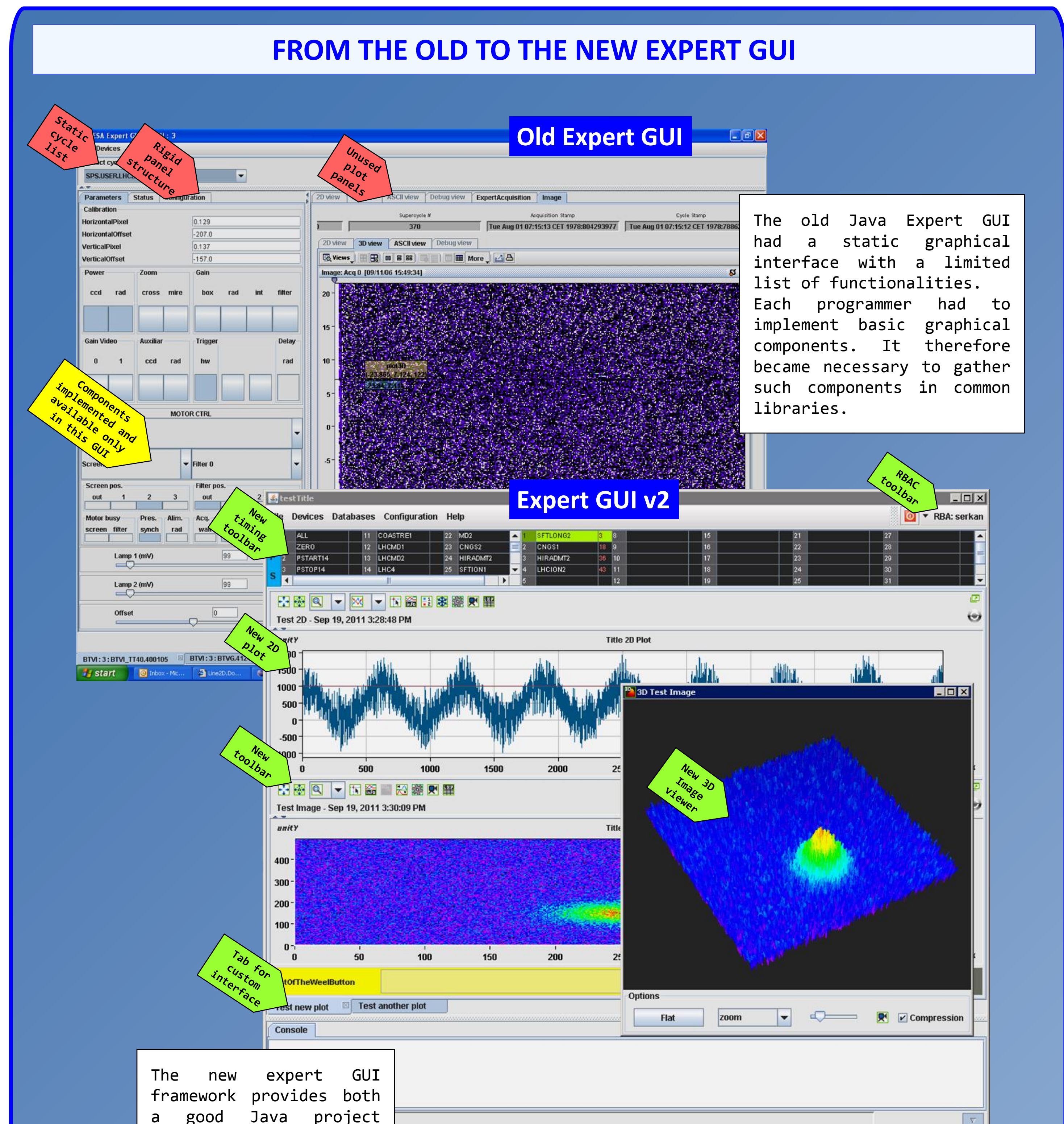
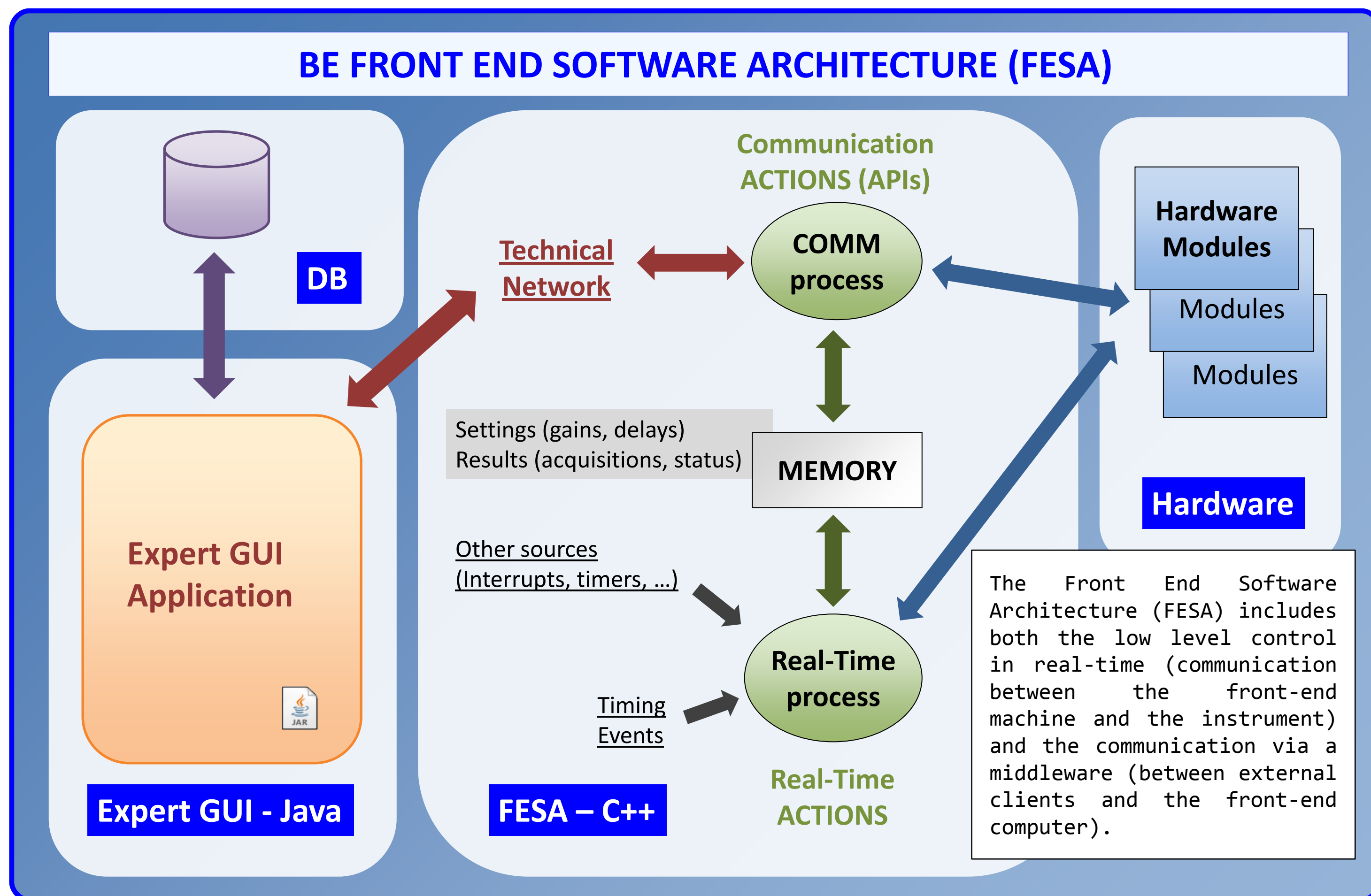


Java Expert GUI Framework for CERN Beam Instrumentation Systems

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Abstract: The CERN Beam Instrumentation Group's software section has recently performed a study of the tools used to produce Java expert GUI applications. This paper will present the analysis that was made to understand the requirements for generic components and the resulting tools including a collection of Java components that have been made available for a wider audience. The paper will also discuss the prospect of using Maven as the deployment tool with its implications for developers and users.



CONCLUSIONS

The analysis and the improvement of our Java software development is still on-going. This process is taking time because of several constraints. Keeping backward compatibility with our old applications, to be in agreement with CERN software standards, and to cover the needs of all our programmers are just some examples of things to be considered.

However, the new expert GUI has already given very good results. Users can easily and quickly create a Java project with a pre-defined structure that will allow them to run an application in two mouse clicks. At the same time, they are able to add whatever components they need to libraries that are now common to all. Using Maven, the handling of the library dependencies is much improved and the availability of archetypes very useful.