Bruno: changes and ideas

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Introduction

- Andrea asked us to put together the list of **last changes** and **ideas** to implement for planning better the future Bruno development

- Three main areas:
  - Framework
  - BrunoApp, including subsystem specific code
  - Background analysis

Framework wishlist

- Packaged version is very familiar for people coming from BaBar
- User interface is not standard, mix of command line options plus G4 macro, not so versatile
- I would like to see something chosen from the whole collaboration (for BaBar it was Tcl)
  - Python is probably the best candidate now
  - Issue to be solved asap, in order to avoid a difficult transition later
- Dedicated package with small library / scripts to do job submission

BrunoApp developments

- Some bugs in compilation:
  - Visualization not working
  - Shared library for using with Root macro (temporary fix from Marco Corvo, need definitive fix from Roberto Stroili)
- Personal developments:
  - fixing bug into BrnHit classes, missing information
  - Svt hits are now derived from the generic hit that is good for most of the subsystems (apart from Emc)
  - Additional information on Svt hits: module number, wafer type and coordinates in silicon volume frame to get a better estimate of rates
- All ready to be committed

BrunoApp wishlist

- Validation procedure to be assessed:
  - Tag a candidate
  - Few jobs for testing to be checked within a week
  - Release a candidate as good for production, if not fix the bugs and tag another version
  - Tag version should include geometry (subdir of BrnRunTime package)
- GDML:
  - clumsy and not versatile enough,
  - any idea when we will move to full C++ geometry?
  - is possible to have an hybrid for transition (insert geometry created with C++ code into volumes created from GDML)?
  - problem not solved: files have to stay in the same directories, no different packages
- Cleaning up of class names, still old names

Background analysis

- Wishlist:
  - Dedicated package
  - Common and standalone executable
- Personal developments (not ready yet):
  - Svt rate module by module in both views, phi and z