# LHCb Calorimeter Upgrade

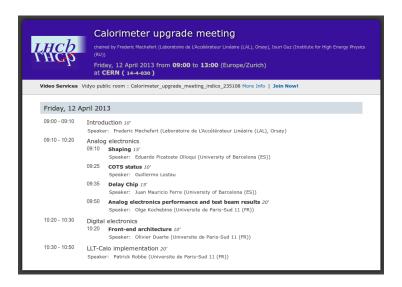
Introduction and News

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LHCb calorimeter upgrade meeting

## Today's program





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#### MC Simulations

#### Calorimeter implementation

The default geometry of the calorimeter for the upgrade is implemented

- SPD, PRS ands lead absorber are removed
- No specific problems observed on test samples

## MC sample requests

I requested the production of 3 MC samples

- The decay produced is  $B_s o \phi \gamma$ 
  - $E = 14 \text{TeV}, \mathcal{L} = 10^{33} \text{cm}^{-2}.\text{s}^{-1}$
  - $E = 14 \text{TeV}, \mathcal{L} = 2x 10^{33} \text{cm}^{-2}.\text{s}^{-1}$
  - $E = 14 \text{TeV}, \mathcal{L} = 3x 10^{33} \text{cm}^{-2}.\text{s}^{-1}$

The intermediate stage of the production are kept:

- should be able to adapt the digitization (to test with realistic electronics performances)
- should be able to run the reconstruction and test different algorithms

Treatment of spill-over not realistic, but difficult to implement in the simulation.

#### Calorimeter review

- LHCb management would like to have a review of the architecture of the electronics of each sub-detector
- Need to write a (short) document that gives details on the implementation

#### Natural outline of the document / review

- Architecture overview
- Electronics
  - Analog
  - Digital
- LLT-Calo (FE implementation)
- Control and monitoring
  - HV
  - I FD
  - Current integrators
  - Radioactive source

Did I forget anything? Please send me your comments/suggestions...

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