# CMSDAS – Generators (short)

**Facilitators:** F. Stober (looking for more)

**Sketch:** Focus on Z0 and top pair production with decays to leptons at a 13 TeV, proton-proton collider

1) How to generate a Monte Carlo dataset in CMSSW
2) Which Monte Carlo truth products exist and how to interpret them
   How to navigate the MC record - eg. identify an electron from a $W^-$ decay compared to one from a b quark decay
3) How to compare generator-level information with unfolded data
4) What are the differences between various Monte Carlo tools (LO, LL, NLO, Matched or merged calculations)

**Outlook of what needs to be done:** Based on short exercise from 2016, adapt to new CMSSW version (1 month)

**Technical requirements:** Computing account for the batch system