

Software Coordinators Report

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ILD Meeting, Feb 26, 2020

- Generator
- Reconstruction
- Monte Carlo Production
- ICHEP abstracts

report from *ILD Software Convenors Meeting* today

- will reproduce test samples (10k each)
 - HZ->Hmumu, 2f leptonic (tau tau), 4f semi-leptonic (qqlnu)
 - with slightly modified production cuts
- LCGenerator meeting at CLICdp workshop in two weeks
 - will address issue in $\gamma\gamma$ samples
 - together with Whizard authors
- need to prepare scripts to produce large 250 GeV sample
 - $O(10^{10})$ events !

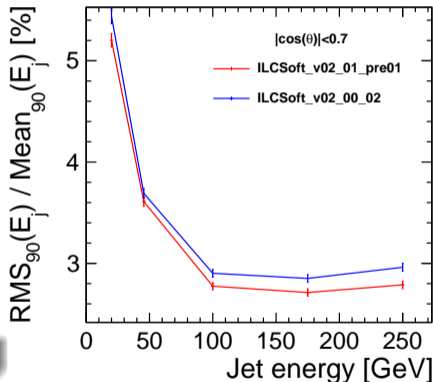
250 GeV new sample production plan

Resource requirement for new 250 GeV samples have estimated using small sample production and scaled to be last Junping's request (2f, 4f only available so far)

Process pol.	eL.pR	eR.pL	eL.pL	eR.pR
2f_l, 2f_h	5 ab ⁻¹	5 ab ⁻¹	1 ab ⁻¹	1 ab ⁻¹
all 4f				
all 6f	10K	10K	10K	10K
2f_bhabhag	1 ab ⁻¹	1 ab ⁻¹	1 ab ⁻¹	1 ab ⁻¹
h->inclusive	1 ab ⁻¹	1 ab ⁻¹	1 ab ⁻¹	1 ab ⁻¹
h->each mode (5x9 channels)	100K	100K	10K	10K

H.Ono

- fixed calibration and improved the JER
- will create **ILDConfig** tag with this
- need create iLCSoft test release: **v02-01**
 - need to include latest tag from LCFIPlus
- RE will have another go at investigating the μ -reconstruction issue at $\cos(\theta) \approx 0.6$ - in parallel to test production
- will have release for physics test production very soon





- will start with test production of 10k events of
 - $HZ \rightarrow H\mu\mu$, 2f leptonic ($\tau\tau$), 4f semi-leptonic ($qq\nu$)
 - and O(100k) of single γ , K_L^0 , π , K , μ , e
- a 500 GeV 6q samples with BG overlay for flavor tag studies will be produced with the final production version
- see confluence page: <https://confluence.desy.de/display/ILD/Production+with+v02-01>
- then need **physics validation** of these samples:
 - already assigned manpower to the individual channels

- the ILD software groups has submitted an abstract for ICHEP:
 - **The ILD Software Tools and Detector Performance**
- also the LCC-generator working group has submitted an abstract
- see all ILD abstracts at:
 - <https://confluence.desy.de/display/ILD/Abstract+submission>