

— format for Friday meeting:

- get more prepared for wider participation by theorists, facilitate exp./theory collaborations, while keep efficiency on helping student make progress
- 1 regular long talk from student's analysis, ~15 min, default rotation order: Y.Aoki, T.Mizuno, K.Yumino, J.Nakajima, Y.Kato, plus any new students to come
- 1 invited long talk by theorists, every a few weeks, time can be flexible, 15-30 min, welcome to reach out to your colleagues who may be interested in giving such talks
- roundtable brief update on each analysis: progress in last week, issues found, plan for next week, ~5min
- new starting time: 2:30pm

— general physics meeting:

- differentiate with regular Friday meeting, make it more like a formal workshop, invite more theorists to participate and stimulate collaborations

— roundtable

- study of  $e^+e^- \rightarrow \gamma + \text{higgs}$  (Y. Aoki)
  - progress: found a technical bug in script; signal contribution from eR.pL sample was not included; background statistics was not fully utilized for a few processes (~half for 2f\_z\_h, 4f\_ww\_sl, etc.)
  - next step: update results reported at LCWS2021, estimate uncertainty due to limited Monte-Carlo statistics

- A\_LR measurement using radiative return process (T. Mizuno)

- progress: analysis jobs using high statistics signal events were submitted; found some error messages, not understood yet, to be investigated
  - next step: analysis full background events; update on jet energy scale calibration study with another way of defining jet energy resolution (detector effects only)

- tau polarization measurement in  $e^+e^- \rightarrow \text{di-tau}$  process (K. Yumino)

- progress: try to improve the efficiency for eR.pL signal in the region where tau polarimeter is close to 1 and cone sizes become too small to likely find overlap as solution; working on mid-point method, which does not require complete overlap between two cones; found some issue about python memory leak
  - next step: reconstruct neutrino momentum; tau decay mode selection; probe new physics

- study on right handed neutrino at ILC (J. Nakajima)

- progress: working on analyzing background events; no issue found so far
  - next step: continue to understand background events and to apply event selection cuts

- study of kinematic fit (Y. Kato)

- progress: some recap on the slides reported at LCWS2021; log-likelihood fitting algorithm has been developed which can deal with non-gaussian detector response; results applying that algorithm to benchmark events  $e^+e^- \rightarrow ZH \rightarrow \mu \text{ pair} + b\text{-quark pair}$  look reasonable so far
  - next step: understand why chi2 is so large; consider fitting with MC truth information for jets.

— Next week's long talk: Y. Aoki