

Advanced Tracking Tools

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AID2020 WP3, Mar 10, 2017

- discussion at *Connecting the Dots Workshop* about future of *Common Tracking Forum*
- general agreement that **ACTS** would be a good basis for creating a *tracking toolkit ecosystem* for HEP
- not one common tracking software but modular tools that can be used in different experiments and frameworks



Discussion on Common Tracking Forum

by Frank Gaede, Markus Elsing

- idea was ground up initiative to develop tracking tools
- first ACTS releases exit, with repository + build system
 - see talk by Andi, some talks mentioned they develop against it already
- what are the next steps to make more codes available ?
 - detector independent ...
 - building/integration, against ACTS and/or standalone ?
 - who is interested ? how shall we go about it ?

- already some work done for ACTS in WP3:
 - made ACTS test framework multi-threaded (H.Grasland)
- plan to evaluate example implementation for CLIC-like detector and **implement example for ILD-like detector**
- investigate the possibility to base AIDA2020 work on common tracking tools on ACTS
 - could merge with **generic** pattern recognition tools developed so far for CLIC and ILD
 - implement the *IMarlinTrk* tracking interface with ACTS fitters
 - can we also contribute other fitter, e.g. GBL from aidaTT ?
- will focus more on tracking latter this year from DESY side
 - currently busy with preparation for large Monte Carlo production for ILD