

EUROdrive and LED

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- Initially two JRAs had been proposed
 - EUROdrive
 - Focused on CLIC drive beam issues
 - LED
 - Focused on luminosity
 - Stabilisation and alignment
 - Luminosity instrumentation
- Additional tasks have been proposed later by ILC community
 - Try to integrate them
 - But not everything seems to fit the scope
 - Resources are too small for whole programme
 - Will have to find a way to decide on priorities
- EUROdrive, LED and high gradients will likely be merged
 - GADGET not yet decided

EUROdrive Topics

- Drive beam phase feedback
 - Mainly address the phase monitor
- Longitudinal profile monitor
 - to be coordinated with GADGET
- Beam tuning studies
 - mainly focus on the drive beam
 - maybe can add a little for ATF2
 - Need to fit program development in
- Machine protection
 - mainly focus on loss monitors
 - can integrate some simulations
 - to be coordinated with GADGET

LED Topics

- Demonstration of 1nm stability for main linac
- Sub-nanometer stability for final doublet
- Precision alignment equipment
- Accelerating structure mechanical alignment
- Crab cavities
- Laser wire
- Supporting simulation studies
- Other topics that are well enough supported
 - Fast feedback, luminosity monitoring, beam dump

Phase Monitor

- Concern:
 - Drive beam phase errors can critically impact the luminosity performance of CLIC
- Objective:
 - Investigate a potential low impedance phase monitor
- Description:
 - RF noise that runs down the beam pipe can spoil the signal of a phase monitor
- Work programme: (INFN, PSI, CERN)
 - Design, build and test low impedance monitor with filter

Loss Monitor

- Concern
 - Loss monitors are an important part of the machine protection and will be important for CLIC operation