

# PITZ TV meeting

## Discussion of work topics

- > Screens
- > Cameras
- > Optical readout system

# Screens

## > YAG screens

- Quality gets more and more an issue
- Try to get own production (long-scale)

## > LYSO screens

- for faint light detection, e.g. in HEDA2
- test was promising
- get more; producer was contacted (size limitations)
- possible to install it at beamlet detection positions

## > OTR screens

- currently not used due to low beam energy
- tests for THz studies planned



# Optical readout system

- > Improve shielding against stray light
  - Think about full tubing
- > Improve robustness of alignment
  - construction / fixing to be checked
- > Apply other techniques (e.g. PSI transverse profile imager)
  - Snell-Descartes law of refraction for thick scintillators
  - What do we really need ?



# TV cameras

- > Beam monitoring
  - current solution is sufficient (Prosilica GC1350)
- > Dispersive sections
  - camera defined by array pixel size
  - for HEDA2 get more resolution due to use of LYSO screens
- > Laser system
  - camera types predefined, discussion VC2 and BSA is needed
- > High-resolution readout (after EMSY, TDS)
  - different cameras were already considered
  - compatibility to PITZ (readout channel) is essential
  - experience of others (mainly Hamburg)
  - satisfying solution will be expensive, e.g. PCO camera
  - Who will take care ?

