



INO-CNR
ISTITUTO
NAZIONALE DI
OTTICA

Eupraxia PP WP10



- *Interests* and *Competences*

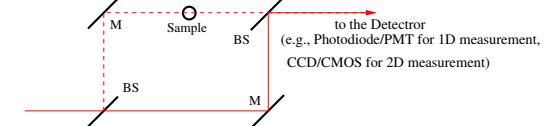
- Development and implementation of robust optical interferometric diagnostics for accurate plasma and gas density measurements.
- Application of high intensity optics/photonics.

- *Contribution*

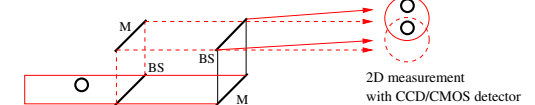
- Support in the evaluation of the plasma-based accelerator stage design with respect to the implementation of the optical diagnostics.
- Support on the definition of optical interferometric diagnostics for the actual plasma-based accelerator stage.

a) Two-arm interferometer

i) Standard (e.g., Mach-Zehnder Interferometer)

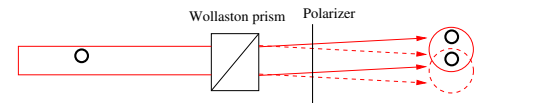


ii) Modified (e.g., folded Mach-Zehnder Interferometer)

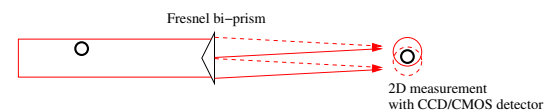


b) Nomarski-type interferometer

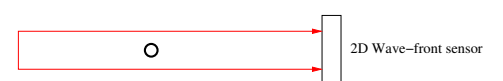
i) Standard Nomarski Interferometer



ii) Fresnel bi-prism Interferometer



c) Multi-wave lateral shearing interferometer



d) Common path second-harmonic interferometer

