

Introduction to accelerators in the medical domain: prerequisites and strategies for the alignment of magnets

Tuesday, 21 March 2017 17:15 (25 minutes)

The CERN spin-off company ADAM has designed and is building a 3 GHz linac for proton therapy applications. The linac comprises several rf accelerating units which allows to accelerate protons up to 230 MeV in about 25 meters. The focusing lattice is based on FODO cells made of compact small aperture Permanent Magnet Quadrupoles (PMQ) placed between the accelerating tanks. A general introduction on the use of linac for protontherapy with a focus on the requirements and the possible strategies for alignment of the PMQ are discussed.

Primary author: Dr DEGIOVANNI, Alberto (CERN)

Presenter: Dr DEGIOVANNI, Alberto (CERN)

Session Classification: Magnetic measurements