

Progress and status of the FAIR proton linac

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The progress and status of the high intensity short pulse 325 MHz proton linac driver for the FAIR facility in Darmstadt is described. The proton linac is designed to deliver a beam current of 70 mA at an energy of 68 MeV. The design of the normal conducting CCH cavities was carried out in collaboration with our partners at the IAP Frankfurt and industrial partners. First bead pull measurements have been successfully performed on the CCH prototype. This prototype cavity is intended for later final production and copper plating. The construction of the ladder RFQ has been completed together with first rf measurements at levels up to 400 W. The RFQ has been delivered to FAIR and high power rf tests are expected to be performed on site during the next year. The proton driver, along with the antiproton chain of the FAIR project, has been postponed due to a re-prioritisation of the project and is now in a frozen state. All delivered components need to be brought to a state that is consistent with the project objectives. This will allow a smooth re-launch in the future. The status of this process is described in this paper.

Footnotes

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