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Recent test beam results of the ATLAS ITk Pixel detector

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The High Luminosity program of the Large Hadron Collider (HL-LHC) will increase the beam's instantaneous luminosity up to $7.5 \cdot 10^{34} cm^{-2} s^{-1}$.
An upgrade of the ATLAS tracking detector, the Inner Tracker (ITk), is needed to cope with the resulting harsher radiation levels and number of tracks.
The outermost layers of the ITk pixel detector are designed to operate for the entire lifetime of the HL-LHC. The innermost layer, instead, will be exposed to a fluence up to almost $2 \cdot 10^{16} n_{eq}/cm^2$ (including safety factor) and is scheduled to be replaced after half of the HL-LHC program.
Planar silicon sensors will be used in most of the detector, while the innermost layer will be populated with 3D silicon sensors due to their inherent radiation hardness.
As long as pre-production sensors of different types and readout ASICs are becoming available, they are being tested in test beams both unirradiated and after irradiation.
A summary of recent results of the ATLAS ITk Pixel detector test beam campaigns will be presented.

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