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## Resistive read-out in silicon detectors

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This contribution will cover the novel field of silicon detectors with resistive read-out. Resistive read-out is a well-known technique, extensively used, for example, in gas detectors. Its application to silicon sensors requires the development of new sensor designs, where a resistive cathode shares the signal among several read-out pads. Measurements performed on first prototypes have demonstrated that the charge sharing mechanism allows achieving excellent spatial and temporal resolutions with large pixels.

This design opens the possibility of reducing the number of read-out channels by about a factor of 100 with respect to standard sensors, decreasing significantly the power consumption.

**Primary authors:** CARTIGLIA, Nicolo (INFN Torino (IT)); ARCIDIACONO, Roberta (Universita e INFN Torino (IT))

**Presenter:** FERRERO, Marco (Universita e INFN Torino (IT))

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