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**Protocol generator for on-wire and on-disk data formats for DAQ systems** JAN BERNAUER, Center for Frontiers in Nuclear Science, Stony Brook University and Riken BNL Research Center — The documentation, implementation and testing of data formats is a typical and tedious task in the realization of data acquisition systems. This situation is worsened by the ongoing efforts in developing high-rate capable streaming-readout systems and associated on-wire and on-disk data formats. Unfortunately, few software tools exist that can help in the development, e.g. by automatically generating data verification or generation tools from a bit-level description of the format, or by generating data structures and accessor functions in the programming language of choice. In the talk, I will present such a tool currently in development, and show how it can be applied in some example use-cases.

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