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## Data collection system for a wide range of gas-discharge proportional neutron counters

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[Journal of Physics: Conference Series, Volume 936, conference 1](#)



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#### Abstract

This article describes the development and creation of a universal system of data collection to measure the intensity of pulsed signals. As a result of careful analysis of time conditions and operating conditions of software and hardware complex circuit solutions were selected that meet the required specifications: frequency response is optimized in order to obtain the maximum ratio signal/noise; methods and modes of operation of the microcontroller were worked out to implement the objectives of continuous measurement of signal amplitude at the output of amplifier and send the data to a computer; function of control of high voltage source was implemented. The preliminary program has been developed for microcontroller in its simplest form, which works on a particular algorithm.

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