

Multiplex recording of cellular events over time on CRISPR biological tape

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A CRISPR device to record time

The CRISPR adaptation system has been used to record the sequence and ordering of exogenous oligonucleotides that are electroporated into cell populations. Sheth *et al.* engineered a system bypassing the use of exogenous DNA to directly record temporal signals. An input biological signal is transformed into the ratio of the frequency of incorporating trigger DNA to that of incorporating reference DNA into the genomes of a bacterial population. A multiplexing strategy enables simultaneous recording of three environmental signals with high temporal resolution.

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