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(54) Title: ENUMERATION OF NUCLEIC ACIDS

(57) Abstract: Disclosed are methods and systems for enumeration of nucleic acids, including for the detection of rare events in a biological sample. In certain embodiments, the method may comprise arranging polynucleotides obtained from a biological sample to form a plurality of reaction sites, wherein each reaction site contains on average one polynucleotide; amplifying the polynucleotides in the plurality of reaction sites; determining by nucleic acid hybridization (i) a first number of first reaction sites containing a target nucleic acid sequence, or a portion thereof, and (ii) a second number of second reaction sites containing a reference nucleic acid sequence, or a portion thereof; comparing the first number of the first reaction sites to the second number of the second reaction sites to determine the relative amount of the target nucleic acid in the biological sample.

