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(54) **Title**: METHODS AND COMPOSITIONS FOR EXTRACTION AND STORAGE OF NUCLEIC ACIDS

(57) **Abstract**: A solid matrix for the extraction, stabilization, and storage of nucleic acids is provided. At least one protein denaturant, and at least one acid or acid-titrated buffer reagent are impregnated in a dry state therein the matrix; and the matrix is configured to provide an acidic pH on hydration. The matrix is configured to extract nucleic acids from a sample and stabilize the extracted nucleic acids, particularly RNA, in a dry format under ambient conditions for a prolonged period of time. Methods for collecting and recovering the nucleic acids stored in the dry solid matrix are also described.