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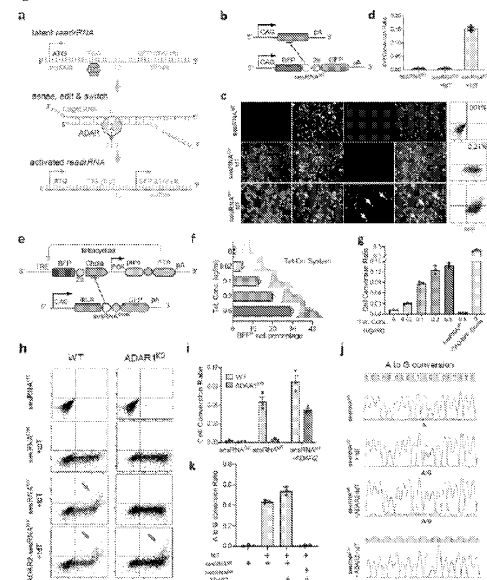
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(54) Title: COMPOSITIONS AND SYSTEMS FOR RNA-PROGRAMMABLE CELL EDITING AND METHODS OF MAKING AND USING SAME

Fig. 5



(57) Abstract: A readrRNA (RNA sensing by Endogenous ADAR) molecule is a modular RNA molecule that facilitates cell sensing and detection of a cell type or cell status and/or facilitates delivery of an effector protein to a selected cell. A composition that includes such a modular RNA molecule and another nucleic acid (linked or unlinked to the modular RNA molecule) is a CellREADR (Cell access through RNA sensing by Endogenous ADAR). readrRNA and CellReadR sense the presence of a selected cell RNA and leverages RNA editing mediated by ADAR (adenosine deaminase acting on RNA) for coupling the detection of a cell-defining RNA with translation of one or more effector proteins in a cell or in a mammal.

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