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(71) Applicant *(for all designated States except US)*: **INTEL CORPORATION** [US/US]; 2200 Mission College Boulevard, Santa Clara, CA 95052 (US).

(72) Inventor; and
(75) Inventor/Applicant *(for US only)*: **SCHMISSEUR, Mark** [US/US]; 1402 East Amberwood Drive, Phoenix, AZ 85048 (US).

(74) Agents: **VICTOR, David, W.** et al.; Konrard Raynes Victor & Mann, 315 South Beverly Drive, Suite 210, Beverly Hills, CA 90212 (US).

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ACTION

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(54) Title: METHOD, SYSTEM, AND PROGRAM FOR GENERATING PARITY DATA

(57) Abstract: Provided are a method, system, and program for generating parity data when updating old data stored in an array of storage devices in a data organization type which utilizes parity data. In one embodiment, a logic engine has plural registers or store queues in which new data obtained in a read operation is stored. A logic function such as an Exclusive-OR function is performed on the new data in each of the plural registers using old data obtained in another read operation. A logic function such as an Exclusive-OR function is performed on the intermediate data in one of the plural registers using old parity data of a first type obtained in another read operation, to generate new parity data of the first type. A logic function such as an Exclusive-OR function is performed on the intermediate data in another of the plural registers using old parity data of a second type obtained in another read operation, to generate new parity data of the second type.