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13/748,495 23 January 2013 (23.01.2013) US(71) Applicant: **INTERNATIONAL BUSINESS MACHINES CORPORATION** [US/US]; New Orchard Road, Armonk, New York 10504 (US).(71) Applicants (*for MG only*): **IBM UNITED KINGDOM LIMITED** [GB/GB]; PO Box 41, North Harbour, North Harbour, Portsmouth Hampshire PO6 3AU (GB). **IBM (CHINA) INVESTMENT COMPANY LIMITED**

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(54) Title: VECTOR CHECKSUM INSTRUCTION

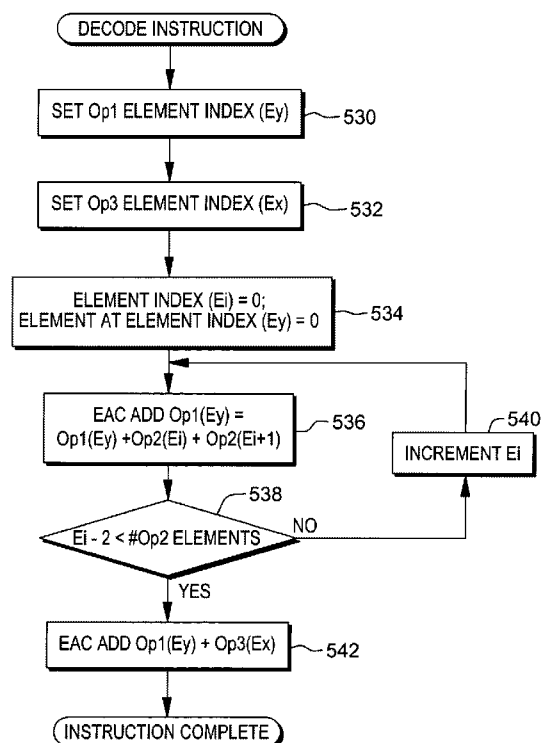


FIG. 5B

(57) Abstract: A Vector Checksum instruction. Elements from a second operand are added together one- by-one to obtain a first result. The adding includes performing one or more end around carry add operations. The first result is placed in an element of a first operand of the instruction. After each addition of an element, a carry out of a chosen position of the sum, if any, is added to a selected position in an element of the first operand.



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