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(71) Applicant: **MICRON TECHNOLOGY, INC.** [US/US];
Micron Technology, Inc., 8000 South Federal Way, Boise,
ID 83716-9632 (US).

(72) Inventor: **JEDDELOH, Joseph, M.**; 4302 Reiland Lane,
Shoreview, MN 55126 (US).

(74) Agents: **BULCHIS, Edward, W.** et al.; Dorsey & Whit-
ney LLP, 1420 Fifth Avenue, Suite 3400, Seattle, WA
98101 (US).

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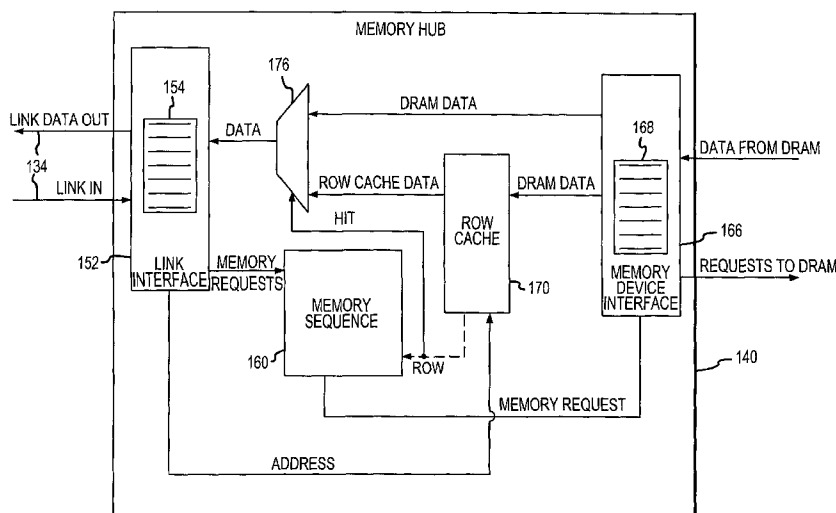
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(54) Title: MEMORY HUB AND ACCESS METHOD HAVING INTERNAL ROW CACHING



(57) Abstract: A computer system includes a controller coupled to a plurality of memory modules each of which includes a memory hub and a plurality of memory devices. The memory hub includes a row cache memory that stores data as they are read from the memory devices. When the memory module is not being accessed by the controller, a sequencer in the memory module generates requests to read data from a row of memory cells. The data read responsive to the generated read requests are also stored in the row cache memory. As a result, read data in the row being accessed may be stored in the row cache memory even though the data was not previously read from the memory device responsive to a memory request from the controller.

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