

- [54] **INK JET PRINTING APPARATUS**
- [75] Inventor: Peter C. Di Giulio, Fairfield, Conn.
- [73] Assignee: Pitney Bowes Inc., Stamford, Conn.
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Attorney, Agent, or Firm—Melvin J. Scolnick; Albert W. Scribner; William D. Soltow, Jr.

[57] **ABSTRACT**

An ink jet printing apparatus is described wherein an array of ink jet heads of the impulse jet type is compled to print sheets such as envelopes traveling past the heads. The ink jet heads are spaced along the travel path of the sheets and laterally staggered to print different image lines. The apparatus includes a microprocessor and controllers which are associated with individual heads. The controllers include buffers which are loaded with image signals derived from a font memory in correspondence with data to be printed. Presettable delay networks are used in the controllers to precisely determine when an ink jet head is to be printed in relationship with the detection of sheets at a particular distance relative to the heads. The ink jets heads are operated in timed relationship with each other and in synchronism with the traveling sheets while their associated buffers are reloaded at the proper times for a continual printing of different information such as addresses on envelopes.

Primary Examiner—Donald A. Griffin

10 Claims, 4 Drawing Figures

