

Rand
SANTA MONICA, CA

WILLIS H. WARE
Corporate Research Staff

September 28, 1984

Mr. Jess Dutton
The Computer Museum
300 Congress Street
Boston, MA 02210

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Dear Mr. Dutton:

A Rand Tablet is being sent you separately via UPS as Ms. Stimbert discussed with you by telephone. You have previously received a stylus and some documents about the Tablet.

If you open it up, you will find a printed-circuit matrix with decoders along the edges. The latter were driven with binary sequences such that each wire of the matrix was in turn driven by a binary code indicating its position in the matrix. Thus the stylus had only to "listen"; the wire over which it was positioned reported who it was. Of course, the stylus would sometimes hear more than one wire, but the binary sequences were chosen so that any uncertainty could be resolved. The surface of the tablet was protected by a plastic (teflon, I think) coating which was renewed from time to time. In fact, you will find a label on the back of the unit we sent to you which indicates that it was re-surfaced in 1965.

There is quite a history to this device, but I don't know how much of it you really want to have or to know. For example, our first effort to build one used a woven wire mesh of specially insulated (Formex) wire, but of course it yielded only about 256 points across the whole dimension. The development of the printed-circuit version followed, but even then there were several variants. The one you have is the "production engineered" version of which we made a small number which were delivered to ARPA (now DARPA) contractors at cost. We made at least one that was translucent enough that a picture could be rear-projected onto the tablet surface. We made one that was 30 inches square; we made another in which all the decoding was done electronically

Mr. Jess Dutton

-2-

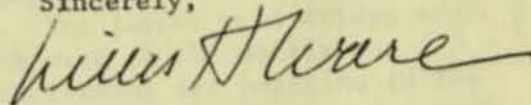
September 28, 1984

so that it was much smaller overall and the solid-state componentry was packaged along the sides of the tablet inside the enclosure. We made some effort to attract a commercial supplier, but the field was not ready in the mid-1960s for such a sophisticated mechanism.

I can put you in touch with the people who can recount the intimate details of the Tablet effort--Keith Uncapher, Tom Ellis, Nelson Lucas, Gabe Groner, and Bill Sibley. If you want to collect interviews from them, or to ask them specific technical or historical questions, let me know and I will forward you addresses.

I am so glad that an organization like The Computer Museum exists to capture the historical excitement and achievements of the field. Otherwise, things such as we have been sending you would wind up as junk--to be never known or seen.

Sincerely,



Willis H. Ware
Corporate Research Staff

WHW:dms

Under separate cover:

(1) Rand Tablet

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