

MEMORANDUM
April 23, 1981

TO: Wally Rhines

COPY: Jim Huffhines
John Hughes
Ron Norris
Jerry Rogers

FROM: Karl Guttag

SUBJECT: THE VIDEO DISPLAY PROCESSOR DEBACLE

I am making this report on what I consider to be the near disastrous state of affairs with the 9918 VDP and its associated spin-offs. We have taken a potential big money and image maker for MOS Microprocessor and turned it into another embarrassment. There has been an almost total lack of cooperation and communication between the design, products engineering and marketing areas with a lot of finger pointing at each other for who is responsible for the problems and almost nothing being done to correct them. I feel that there is still an opportunity to salvage some success from the VDP, if and only if corrective action is taken immediately.

First, as to the current state of the VDP; we have had fully functional VDP's for 2½ years, and we still are not in a position to ship production units. I am informed by Marketing that all major customers have disengaged with the VDP due to poor picture quality. Support for customers is a sad joke; generally, this amounts to an RTC person with an out-of-date spec., who is lucky to have seen a VDP picture, "helping" our customers. A customer must design his own system in order to investigate the VDP's capabilities; there are no application notes and little other written material to help the users. Our one chance to salvage the VDP in the U.S. appears to be the 9928A and it's being handled as a back door operation.

I now turn to what should be done. The 9928A is our only near term solution to the picture quality problems. With the 9928A, we should be able to eliminate the "rainbow effect" and be able to produce "zipperless" external video, the two major problems with picture quality. I am told that barring unforeseen delays or errors, we can have 9928A's in 8 weeks (P.G. is scheduled for about 4/20/81); I know that with proper expediting, this time can be brought in, but getting the 9928A is only half the job. We must have solid support for this part. While it would be easy to get a circuit to use the 9928A, we still don't have a hard and fast schematic or better yet, an evaluation board for the product. I consider the quick development of an evaluation board essential to success, since it lets the customer easily evaluate our product and will reduce customer questions; they will have a known working system rather than coming to us asking, "Will this work?" Incredibly, we do not have any of the original 9928's to work with in Houston to develop and/or test out any circuits. We must move on getting support for the 9928A now, which includes data sheets, evaluation boards and soliciting customers; as of now, we are standing around "flat footed" in all these areas.

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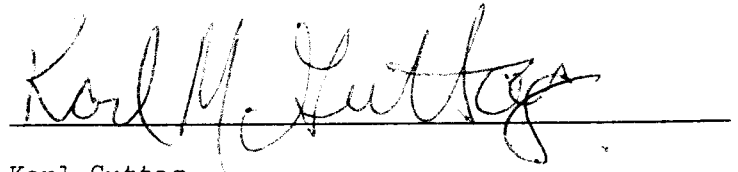
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There needs to be a dynamic person assigned full time to making sure the right things happen and coordinating the activity; this person needs to have the authority to cut through the inter-manager bickering and get action started.

There are several additional issues that must be addressed, most importantly, the question of price elasticity vs. picture quality (i.e., is there a market for the 9918A and at what price?). Marketing appears to have no feel for this. My impression has always been that we have pushed the VDP toward higher end applications that are more quality rather than cost and feature conscious. We must solve yield problems with the 9918A and 9928A through proper levels of effort.

In conclusion, I must point out that the market window for the VDP is closing. While the new NEC part is not a direct competitor for the bulk of the VDP market (due to high system costs), I am relatively certain that Motorola and other companies will be introducing new display processors that will severely limit the VDP's market within the next year or so.

At a conference in which I presented the 9918 over a year ago, a marketing manager from Motorola came up to me and said, "It looks like a very nice part you have there. It's too bad you work for TI because they will never be able to sell it." So far, he has been proven right.

A handwritten signature in cursive script, reading "Karl M. Gutttag", is written over a horizontal line.

Karl Gutttag

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