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## The First Flatbed Inkjet Printer: Data Mate Rembrandt



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In the mid-1990's a company named Data Mate developed and manufactured one of the first flatbed wide-format inkjet printers ever made. This printer was named the "Rembrandt." It used printheads from Sharp.

The Rembrandt printed at 360x360 dpi, which was standard in those years. This is roughly the year before the Encad NovaJet Pro 36 came out, with its Lexmark printheads. The Encad inkjet was the first wide-format printer at FLAAR and was the beginning of our now 9 years of evaluations of wide-format inkjet printers.

The Rembrandt was ahead of its time, both in resolution and in format. This remarkable printer accepted rigid flat material, plus had a roll-fed capability (something neither the Grapo Manta nor Mimaki JF-1631 can accomplish adequately today). Indeed not even Océ has been able to deliver roll-fed capability on its otherwise nice Arizona 250 GT printer.

During a visit to Bordeaux Ink in Israel during September 2007 it was possible to see two of these Rembrandt printers, so I felt it would be useful to publish this photo essay for several reasons. First, I doubt that half the people who are designing flatbed UV printers today know the features and details of this Rembrandt flatbed. Second, the presence of these two printers at the Bordeaux Ink international headquarters documents that this ink company has been developing ink for wide-format inkjet printers longer than companies such as Canon. During the year that the Rembrandt was being developed HP was still probably limited to black-and-white inkjet for CAD, and had barely left its heritage of pen plotters.

Encad never really made its own ink; their pigmented ink came from DuPont (which also provided the pigmented ink for the HP 5000 and HP 5500). So the claim that you should use manufacturers own ink is rather imprecise since most manufacturers do not actually make their own ink. They test it, they spec it out, but don't really manufacture it (especially not in those years).

But Bordeaux was making ink, and still does: ink for Mimaki, Mutoh, Roland, Salsa, Arizona, HP 5000/HP 5500, and dozens of other printers. Bordeaux also makes UV-curable inks, but this we cover in other FLAAR Reports. The present report is to show a photo essay on what we list informally as "the first flatbed inkjet printer." It is probable that other flatbeds existed before, during, and after. For example the Pixation and the LAC printers, but those are airbrush, not inkjet, and their quality varied from awful to terrible (unless viewed at several meters distance away).

The quality of the Data Mate Rembrandt was quite nice, including at a viewing distance of 1 to 2 meters.

So here are the photographs of this remarkable printer. I thank Moshe Zach, CEO of Bordeaux Ink for taking these printers out of storage, dusting them off, and setting them up for me.

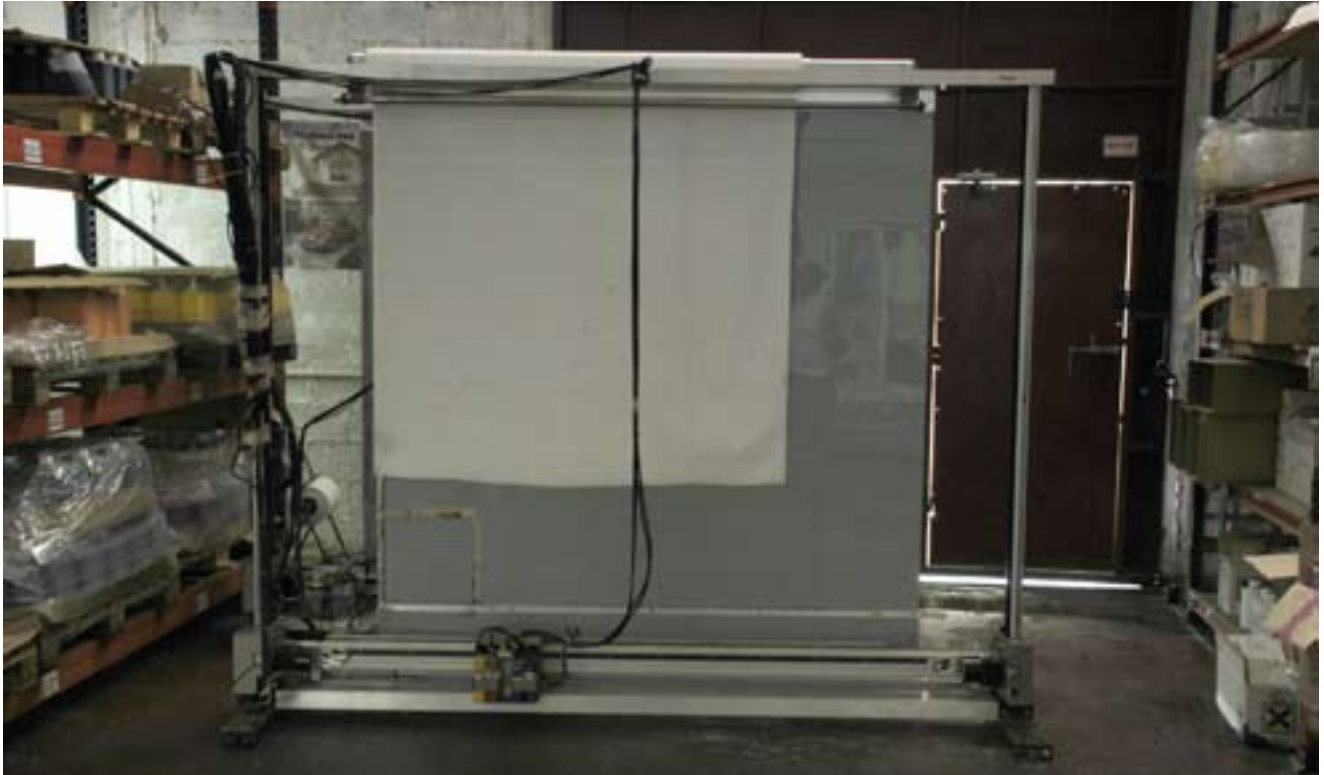
I highly recommend that printer integrators and printer manufacturers get their hands on these printers for their own R&D. I would guess that Bordeaux Ink would consider any reasonable offer to rent them or sell them. Contact info is Moshe Zach, CEO, Bordeaux Digital PrintLink Ltd, [www.c-m-y-k.com](http://www.c-m-y-k.com), telephone +972-8-942 0398.

Basic specs:

- 4 printheads from Sharp.
- Resolution was 90, 180, or 360; ink was water-based. ([www.eurochannel.de/trade/wis/en/SpecsWIS.Detail?/V\\_TYPEId=1787](http://www.eurochannel.de/trade/wis/en/SpecsWIS.Detail?/V_TYPEId=1787))

It is sad that virtually nothing is available on the Internet either on the Data Mate company nor on the Rembrandt printer. Actually I found zero documentation.





*Here you can see that this flatbed offered roll-fed capability (in the 1990's!).*

*Today, there is no roll-fed capability on the GRAPO Manta; no significant roll-fed on the Mimaki JV-1631; and the supposed roll-feeding system of the Oce Arizona 250 GT has been withdrawn (somewhat embarrassingly). And yes, this printer is correctly pictured standing up. Today this would not be recommended, but at least it takes less space when it is standing.*











## Acknowledgements

I thank Moshe Zach (CEO) and Ruth Zach (Import Manager) for making it possible for me to come to Israel. Since I am interested in archaeology, I especially enjoyed a day in Jerusalem with a guide who was herself an archaeologist (a separate FLAAR Report will be issued on the medium format digital photographs that were taken that day with a Phase One P25 22-megapixel camera).

- Ziv Politi, Operation Manager
- Amnon Shalev, Product Management
- Amittai Yosef, Production Manager
- Anat Aisicovich, Assistant to the CEO

And others who will be cited in the separate report on the digital inks all contributed to making this a productive week in Israel.

Bordeaux Ink has a booth at ISA, FESPA, and other leading international trade shows. They have offices and/or distributors in most parts of the world. Their website is [www.c-m-y-k.com](http://www.c-m-y-k.com).

In order to photograph these printers they had to be moved out of storage and dusted off, a chore that was really quite nice of the Bordeaux folks to undertake (after I had indicated that it would be great if FLAAR could take photos to write a report on these unique printers).