



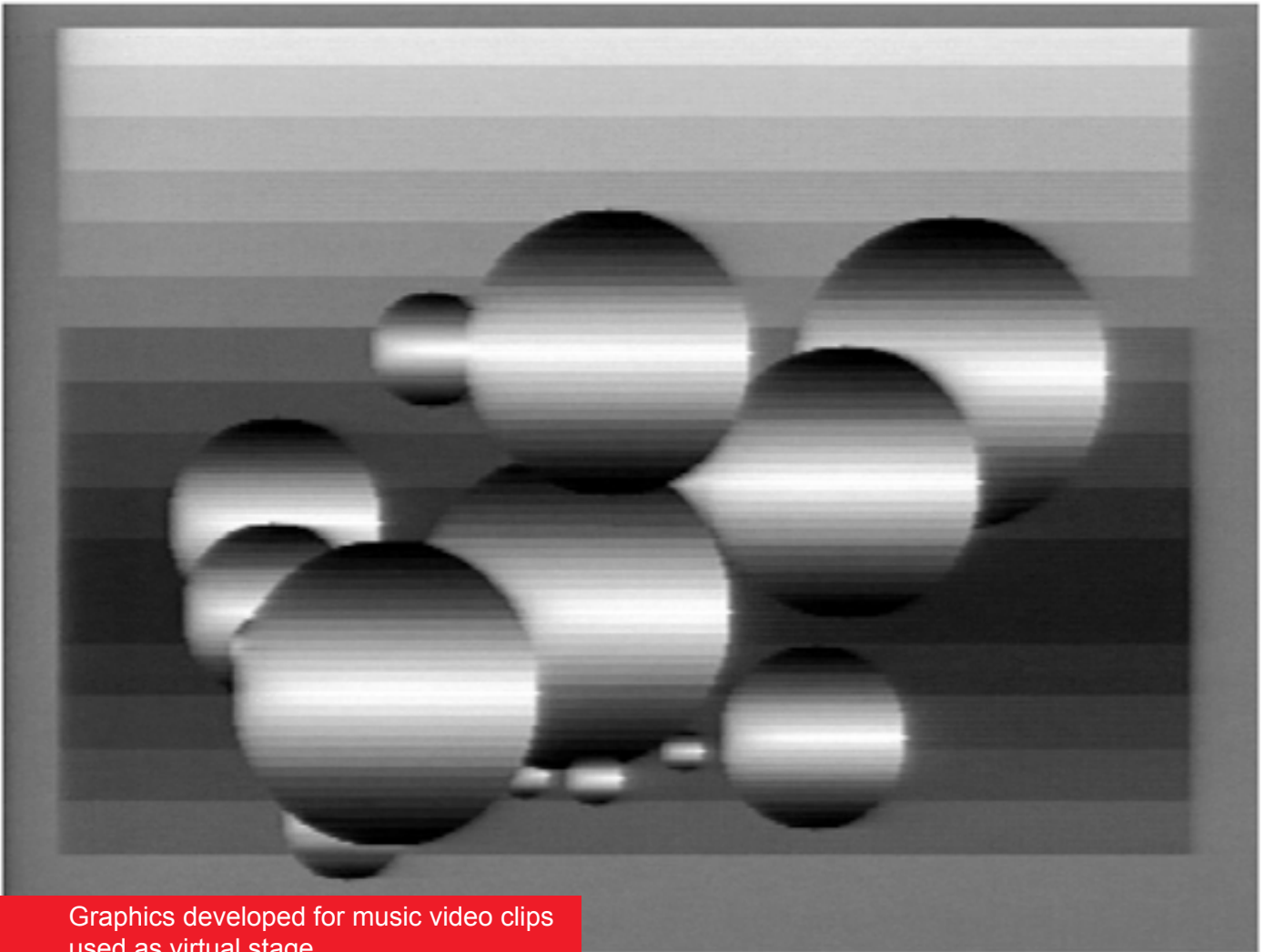
Tomislav Mikulić

Graphics created with DAI Personal Computer 1981-1986 (2019)
Generated by programming, hand-drawing and captured from video.

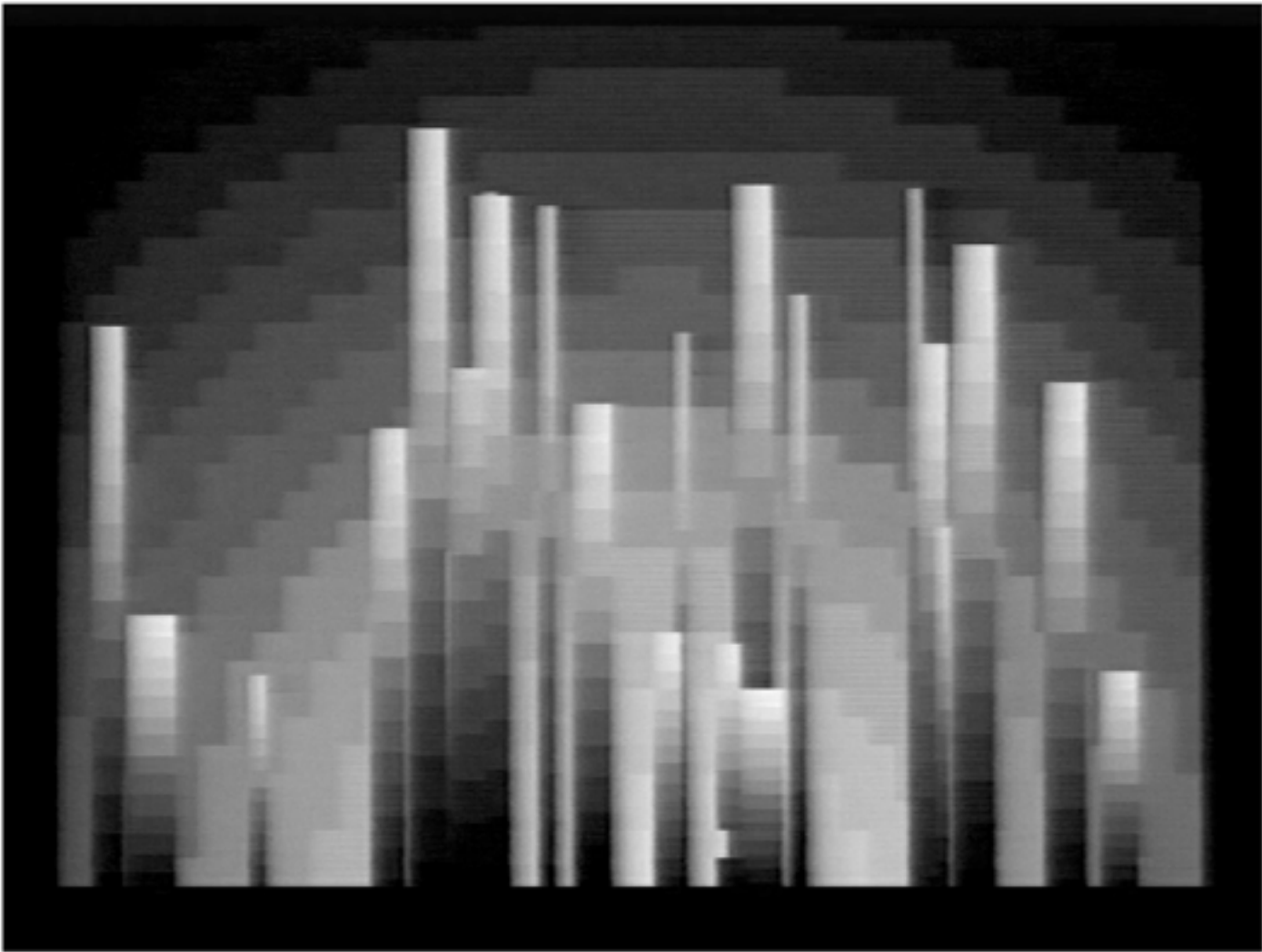
DAI PERSONAL
COMPUTER

Original DAI splash screen
and a hack with customized text and colors.

TOMISLAV MIKULIC
Zagreb, 1981



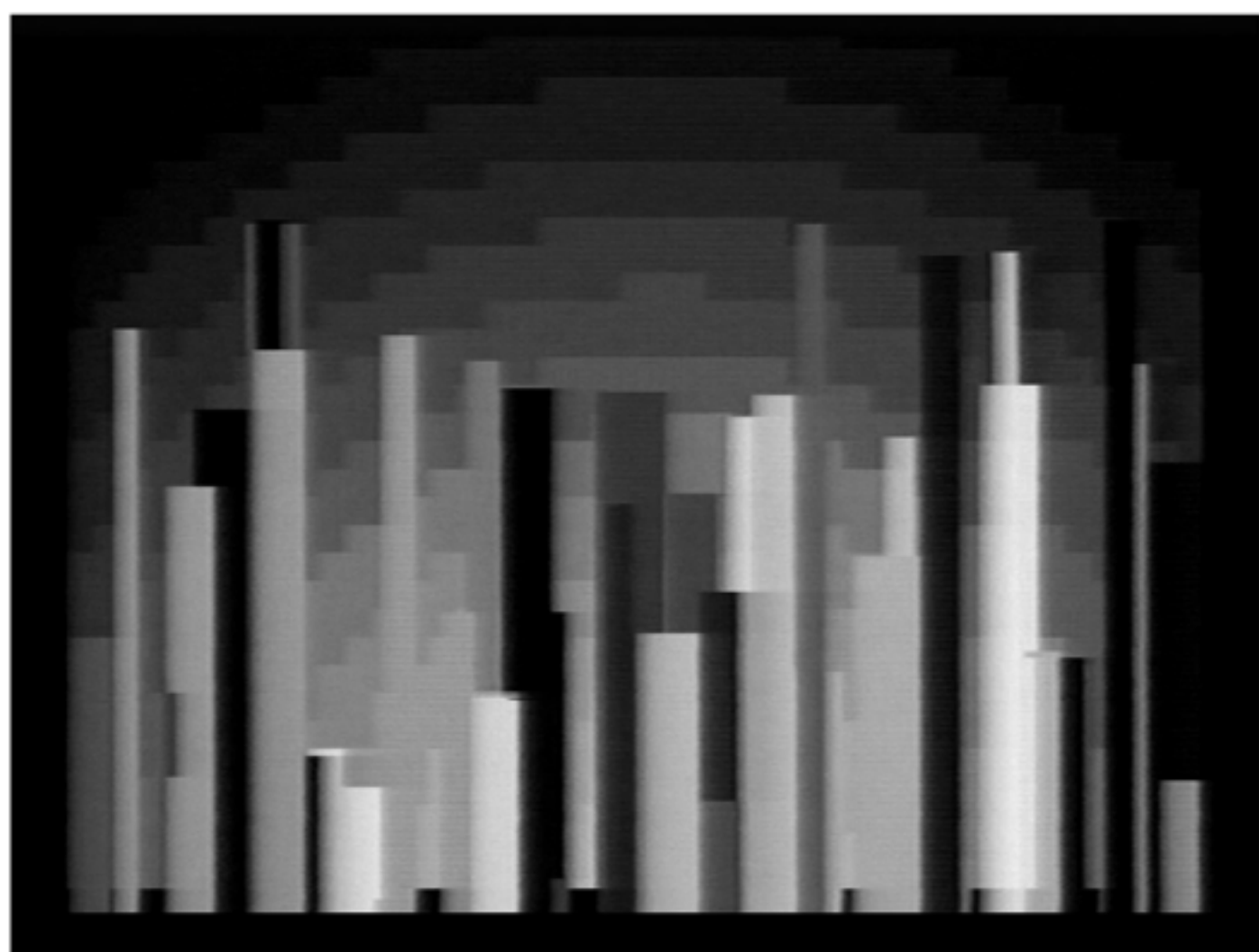
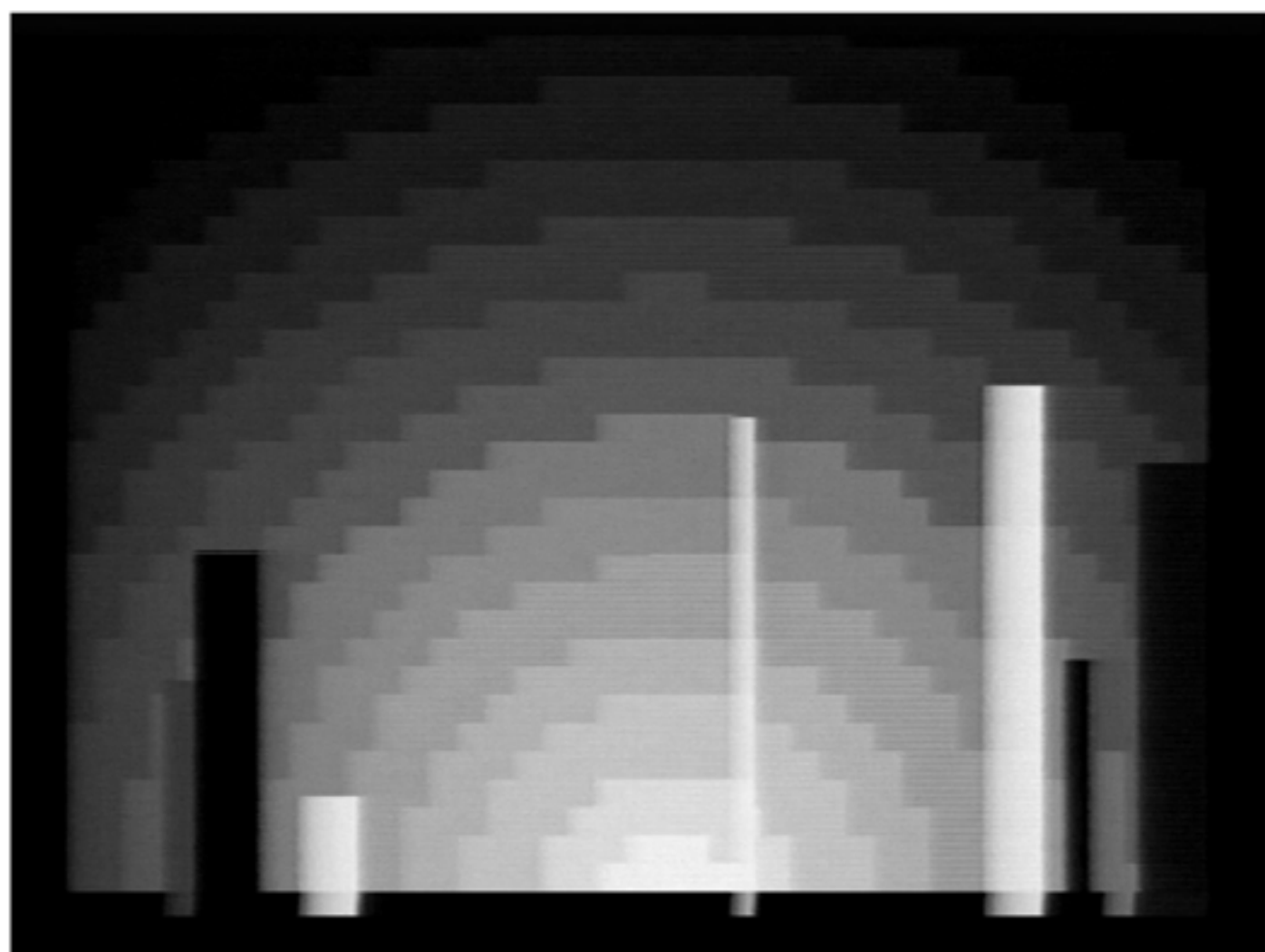
Graphics developed for music video clips used as virtual stage.

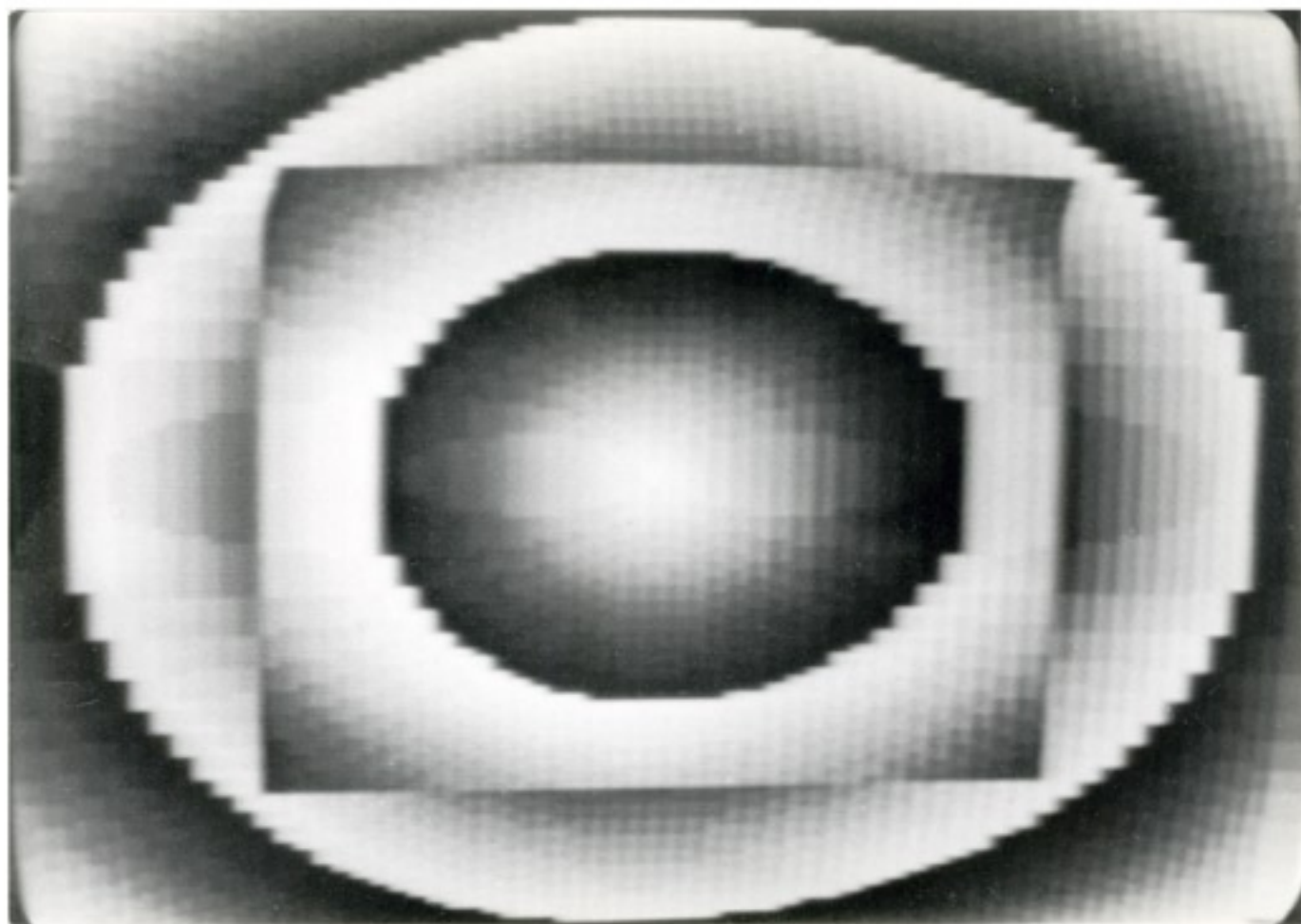
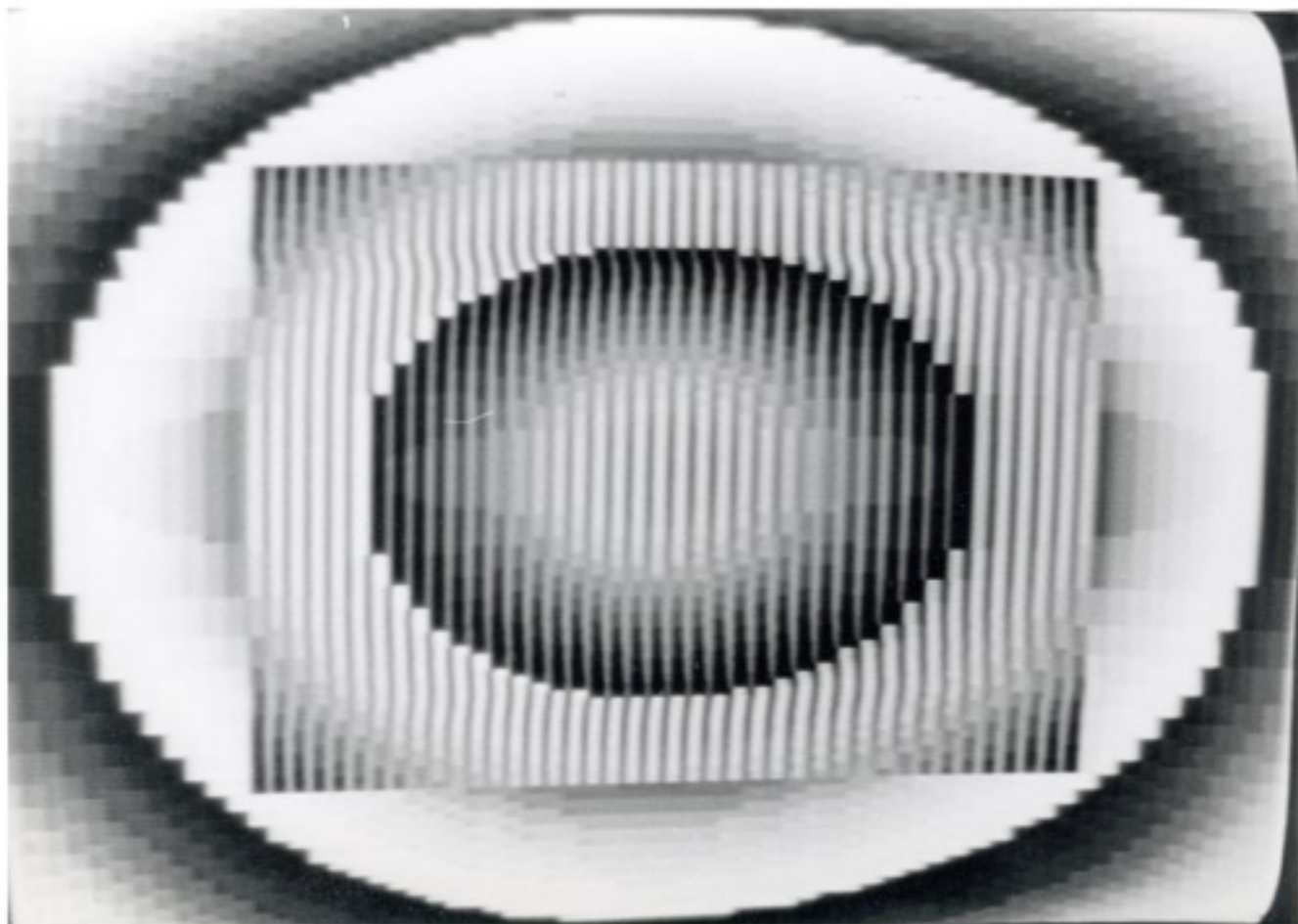


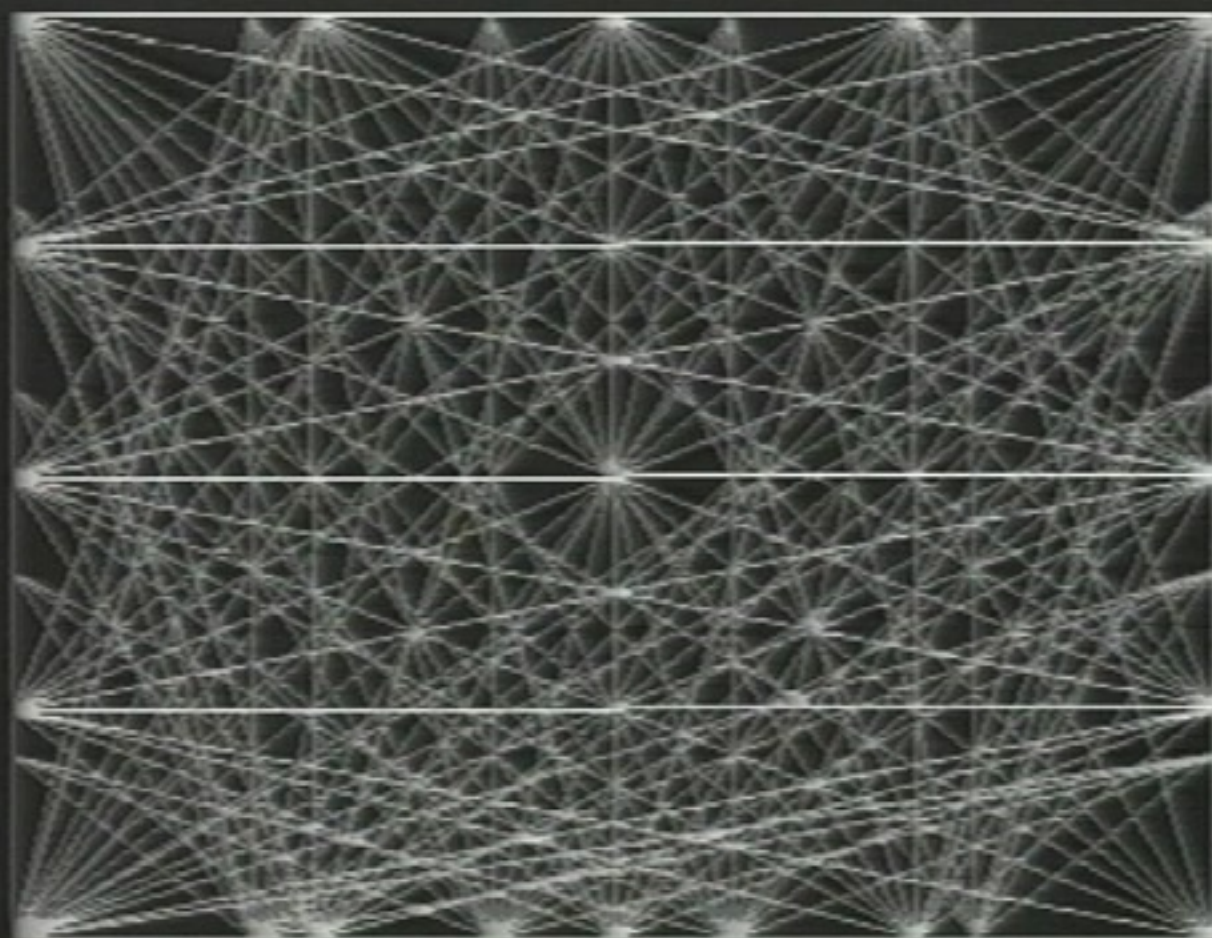
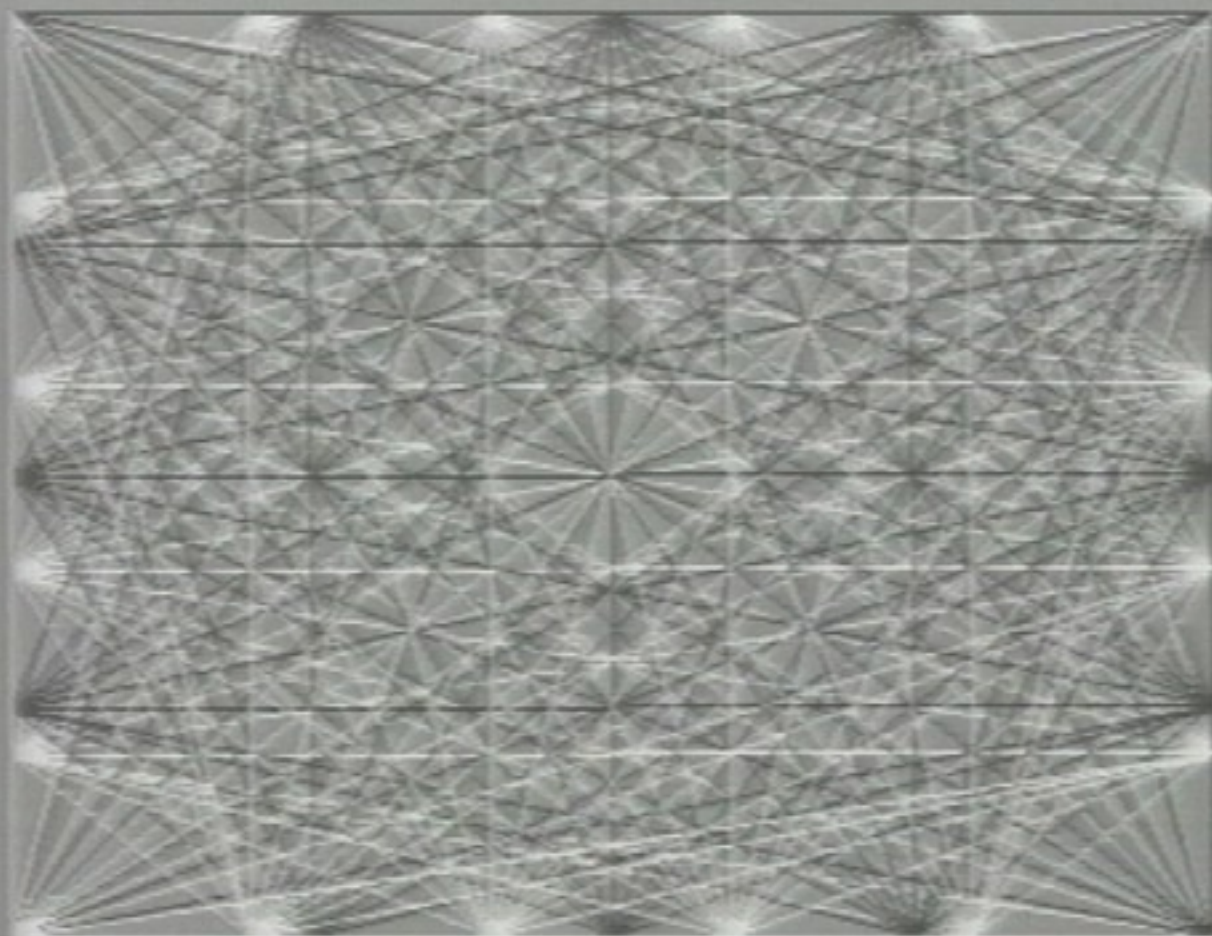


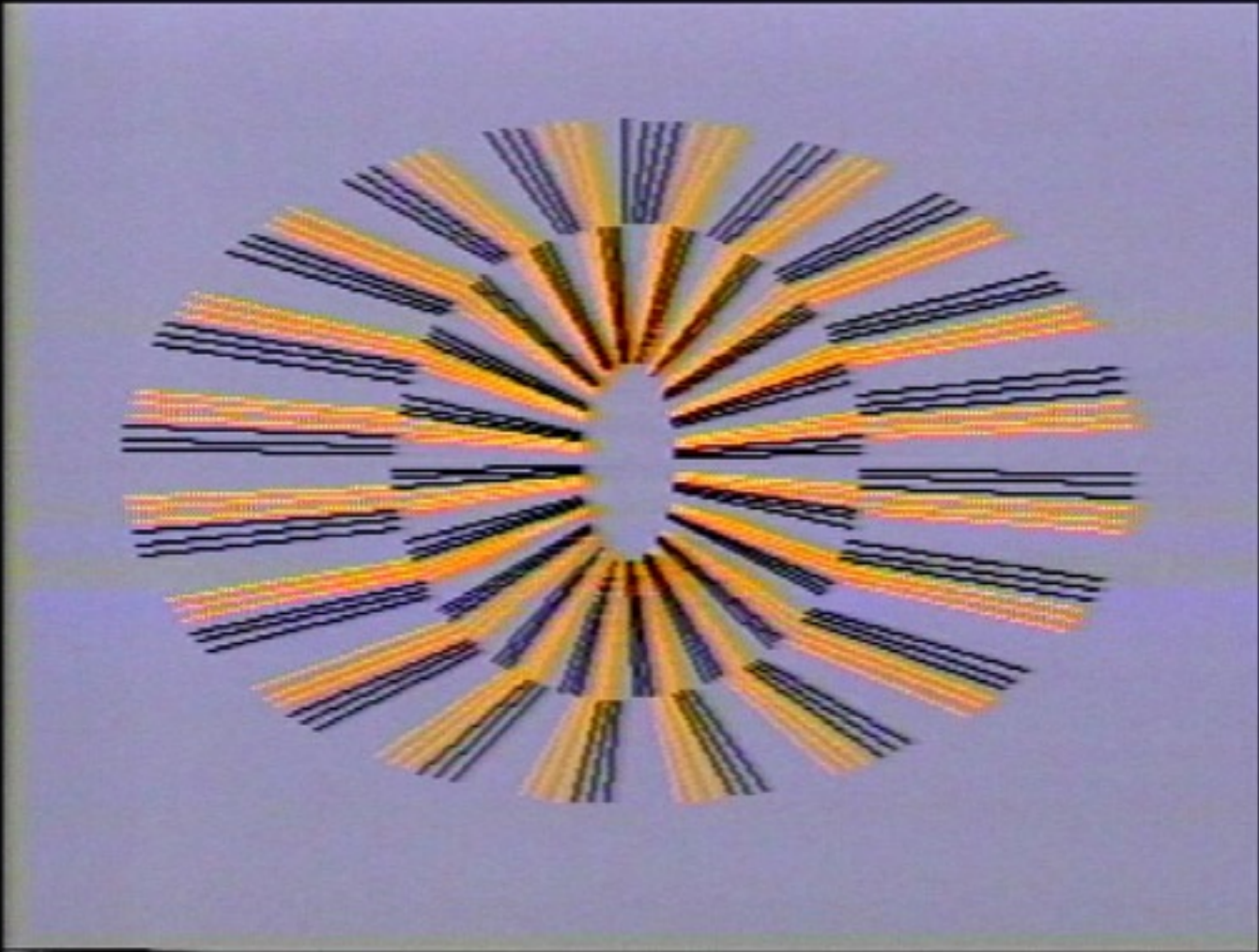
DAI graphics superimposed live over video camera in TV studio.



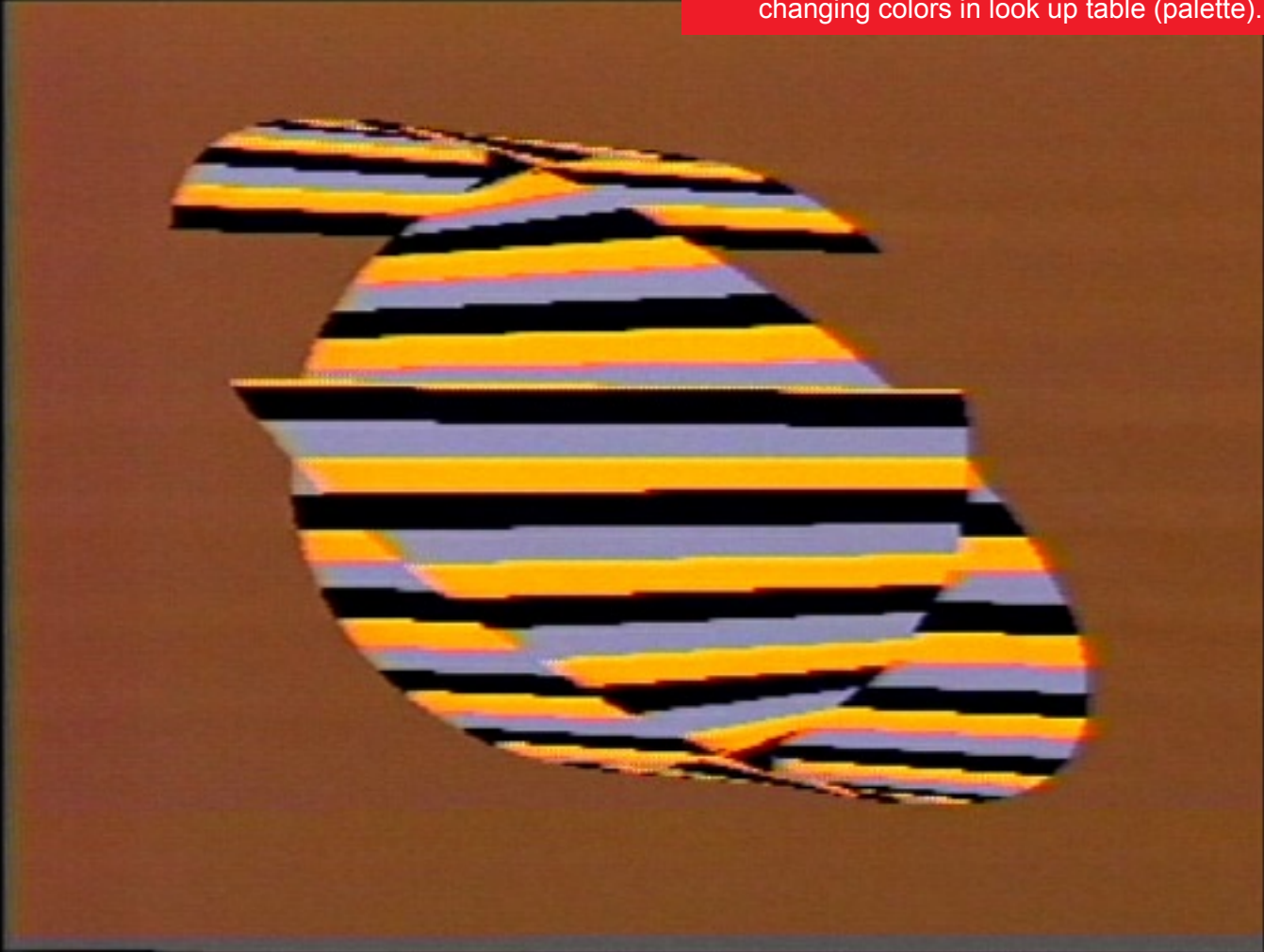


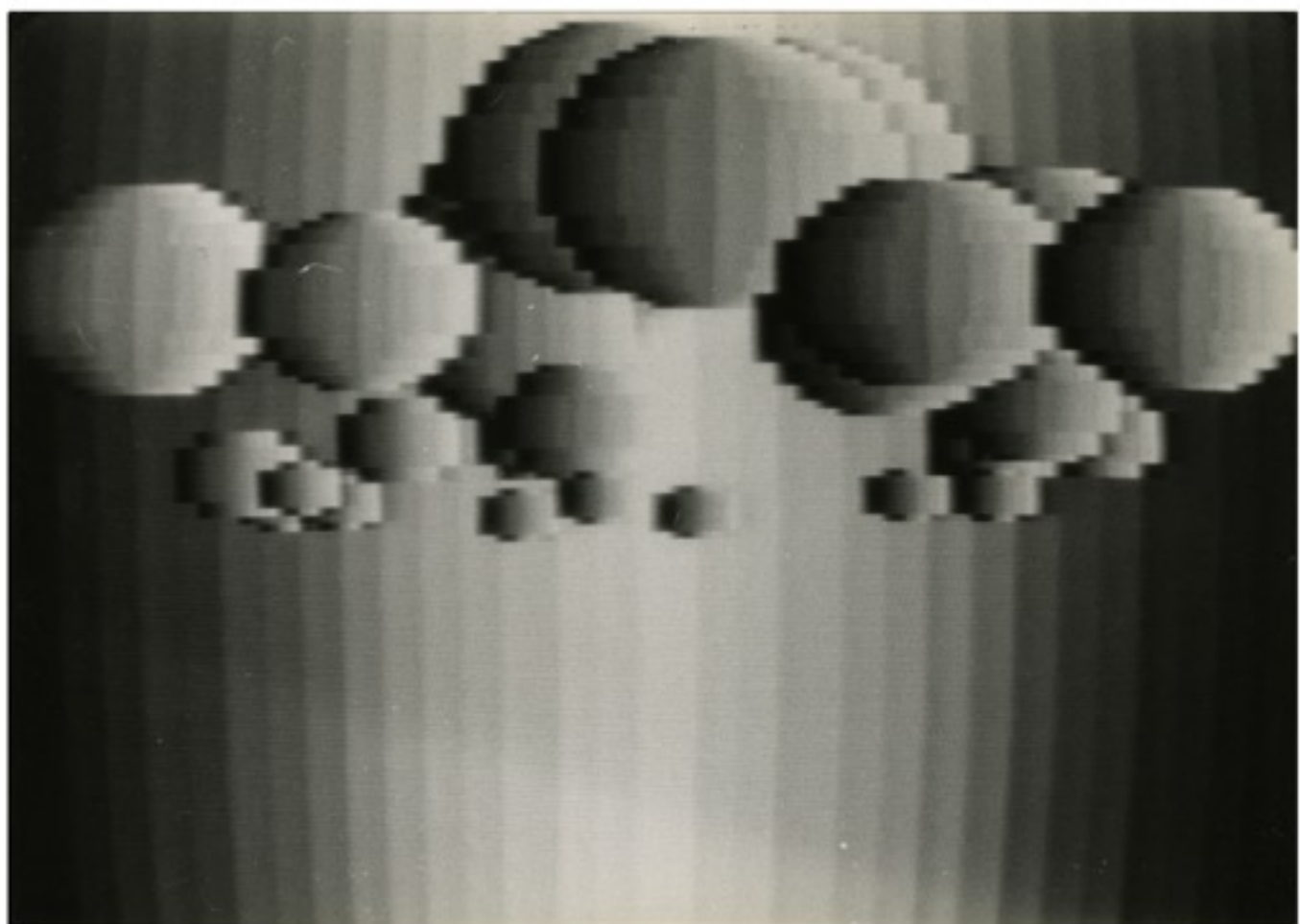
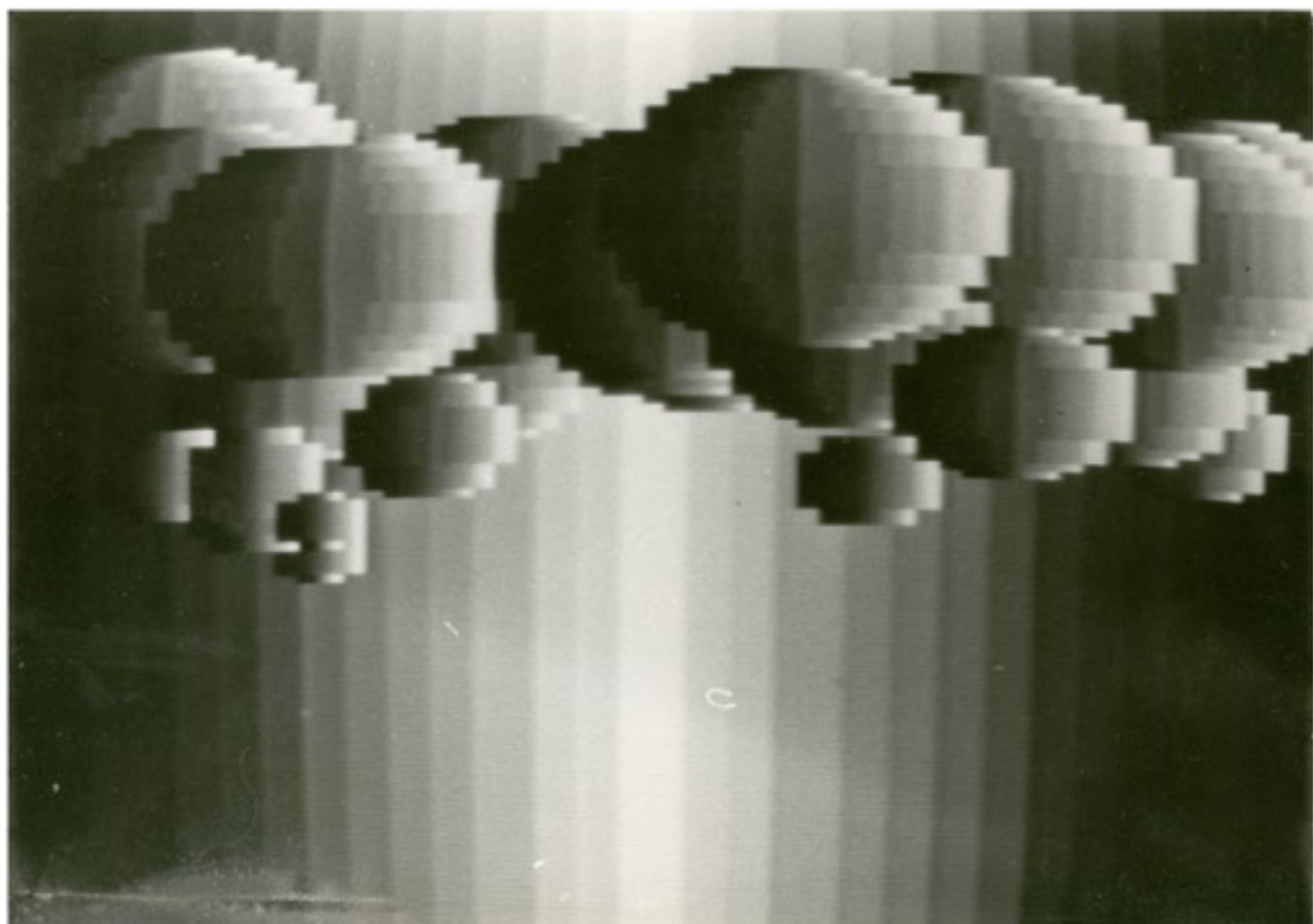






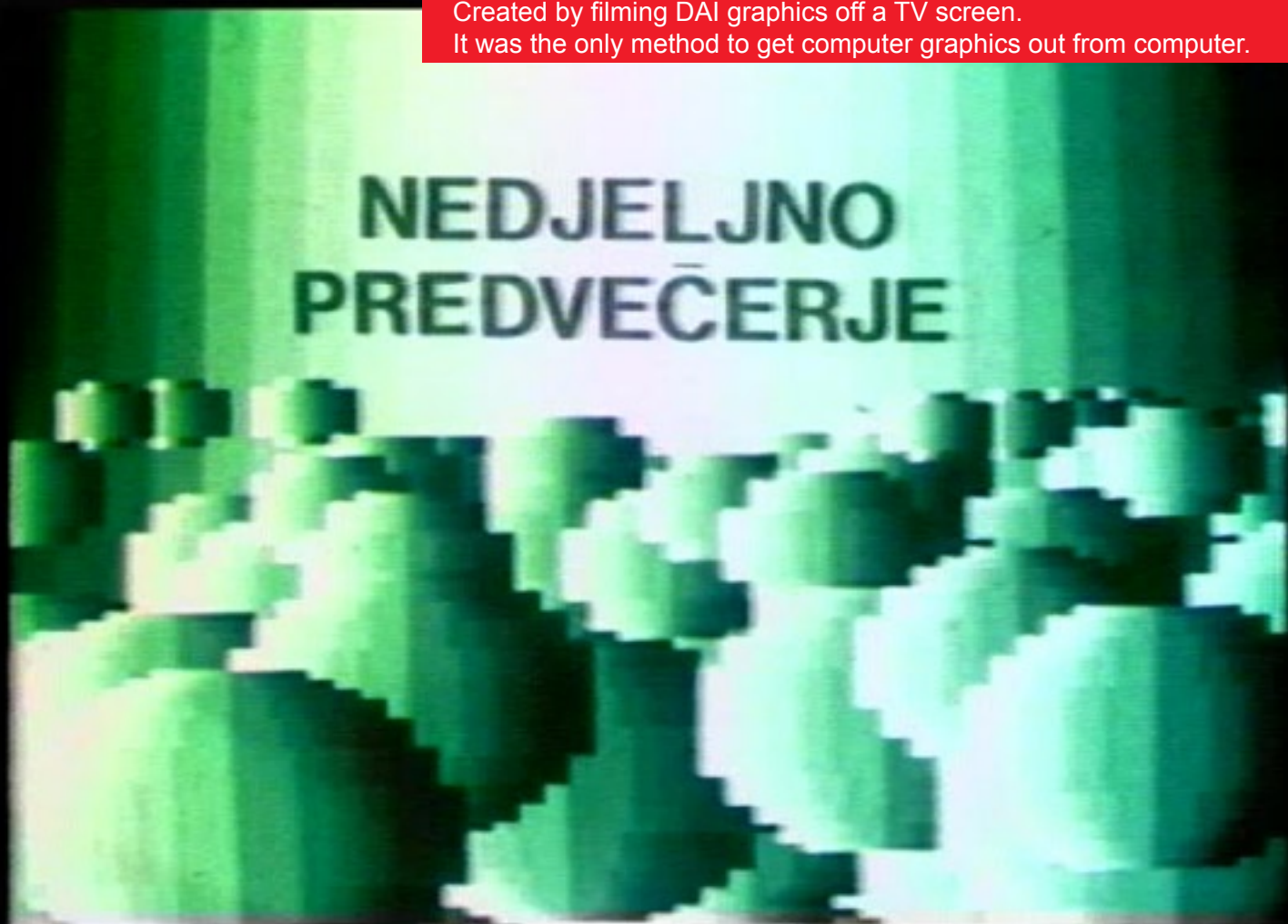
Animation in real time achieved by changing colors in look up table (palette).





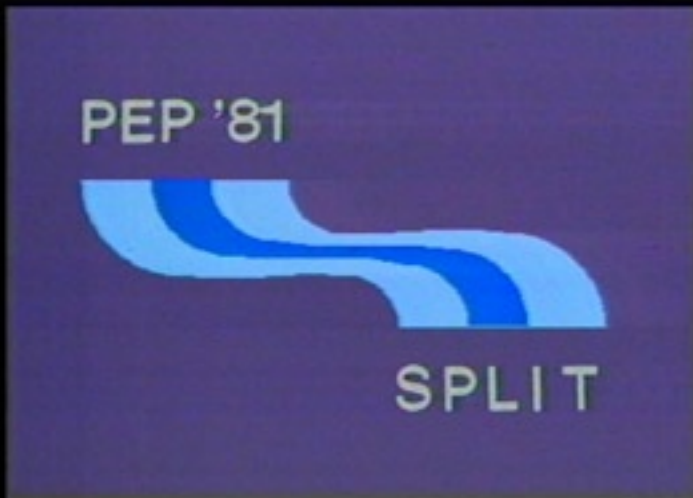
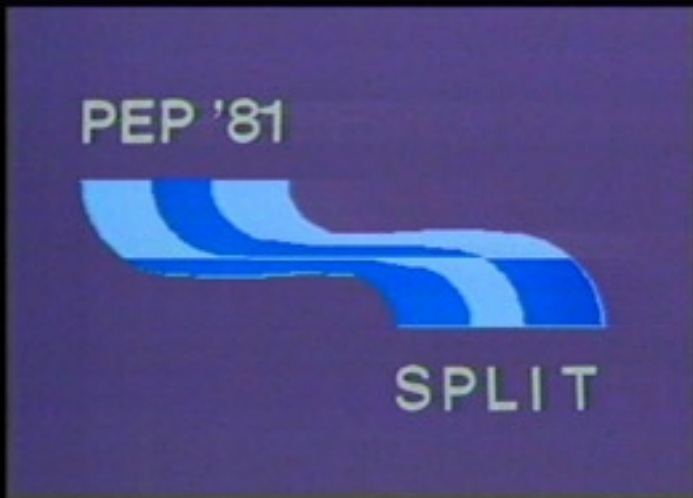


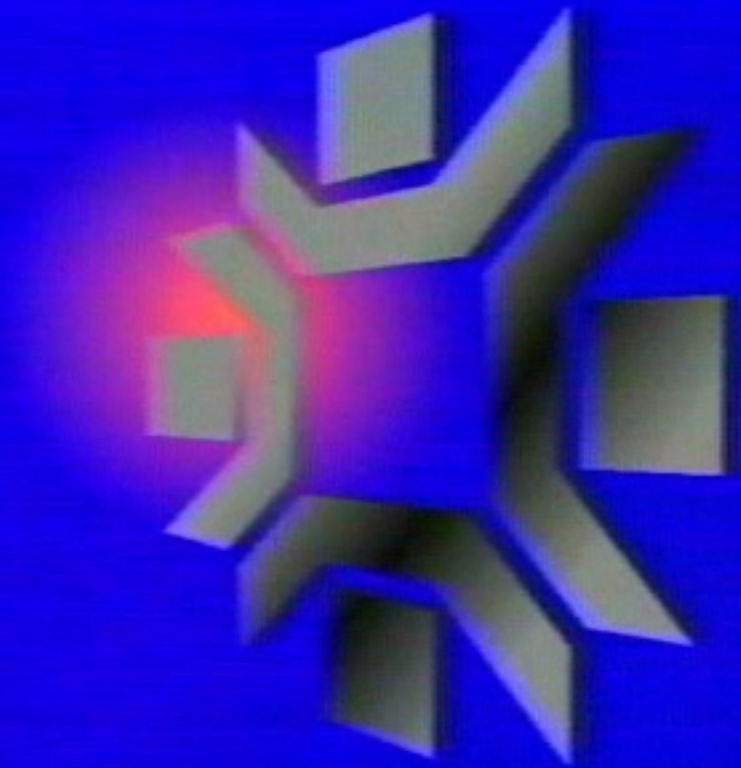
35 mm slides broadcast by national TV.
Created by filming DAI graphics off a TV screen.
It was the only method to get computer graphics out from computer.





DAI graphics and animation in TV commercials and broadcast TV program.
Opener for European Championships in Swimming and Athletics.



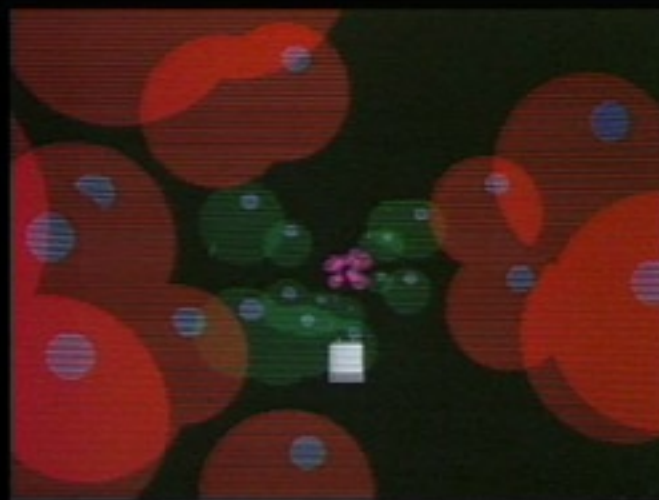


Animation and shading was developed and executed on DAI for internationally awarded opener of Winter Olympic Games in Sarajevo 1984. Broadcast TV paint system Flair was used for graphics output in high resolution.





The "Morphing" animation effect developed on DAI and filmed frame by frame on 35 mm film from TV screen for animated opener of World Festival of Animation.



ZAGREB 84

6. svjetski festival animiranih filmova
6th world festival of animated films

11-15.6.1984.

animarket
ZAGREB ANIMATION MARKET



**videes
graphics**

CHARACTER GENERATOR

by
**Tomislav Mikulić
Zagreb '83**

**videes
graphics**

CHARACTER GENERATOR

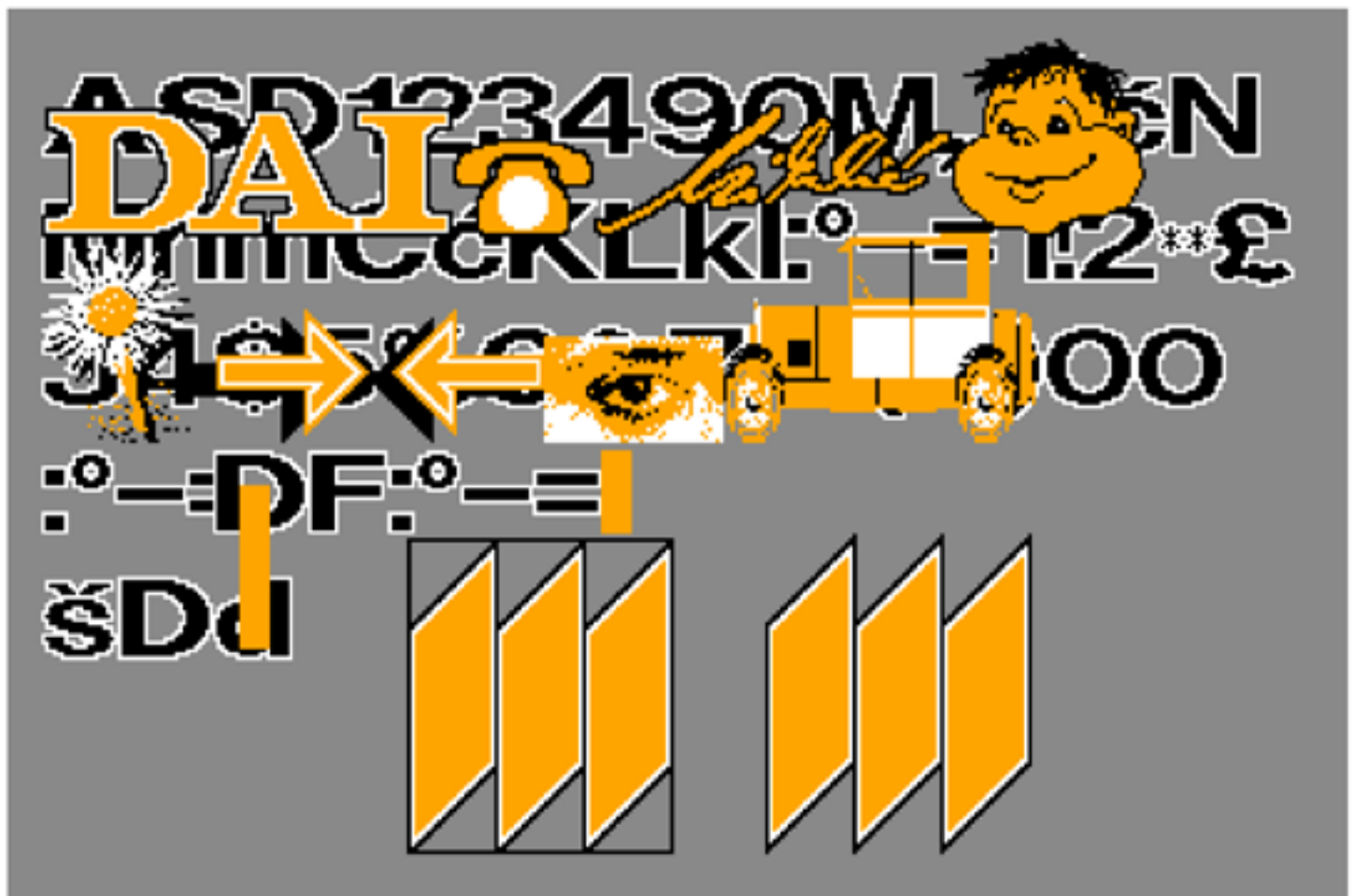
by
**Tomislav Mikulić
Zagreb '83**

**videes
graphics**

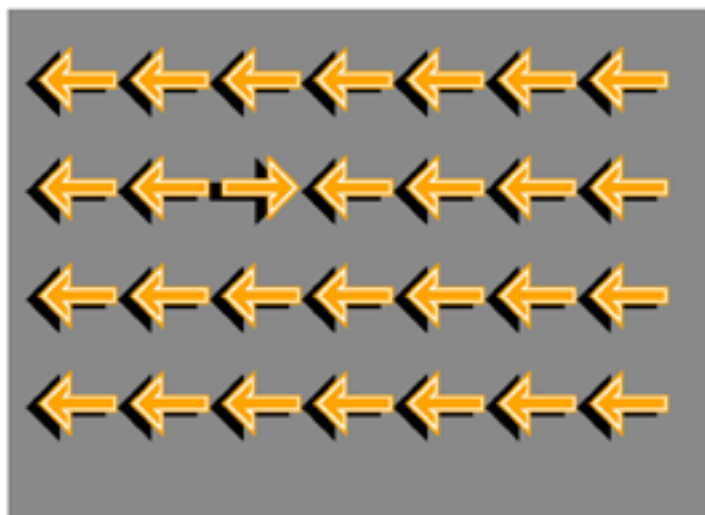
CHARACTER GENERATOR

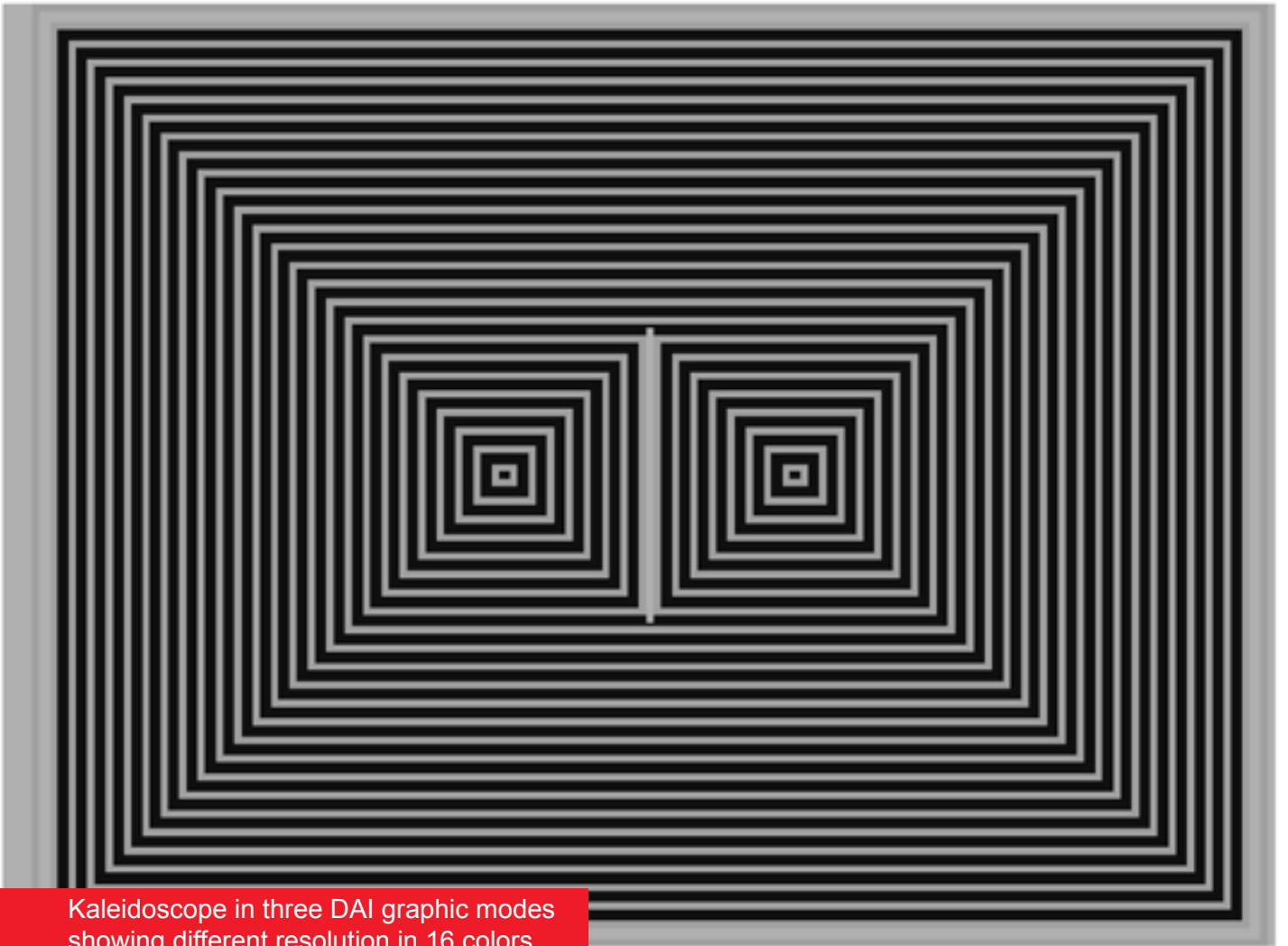
by
**Tomislav Mikulić
Zagreb '83**



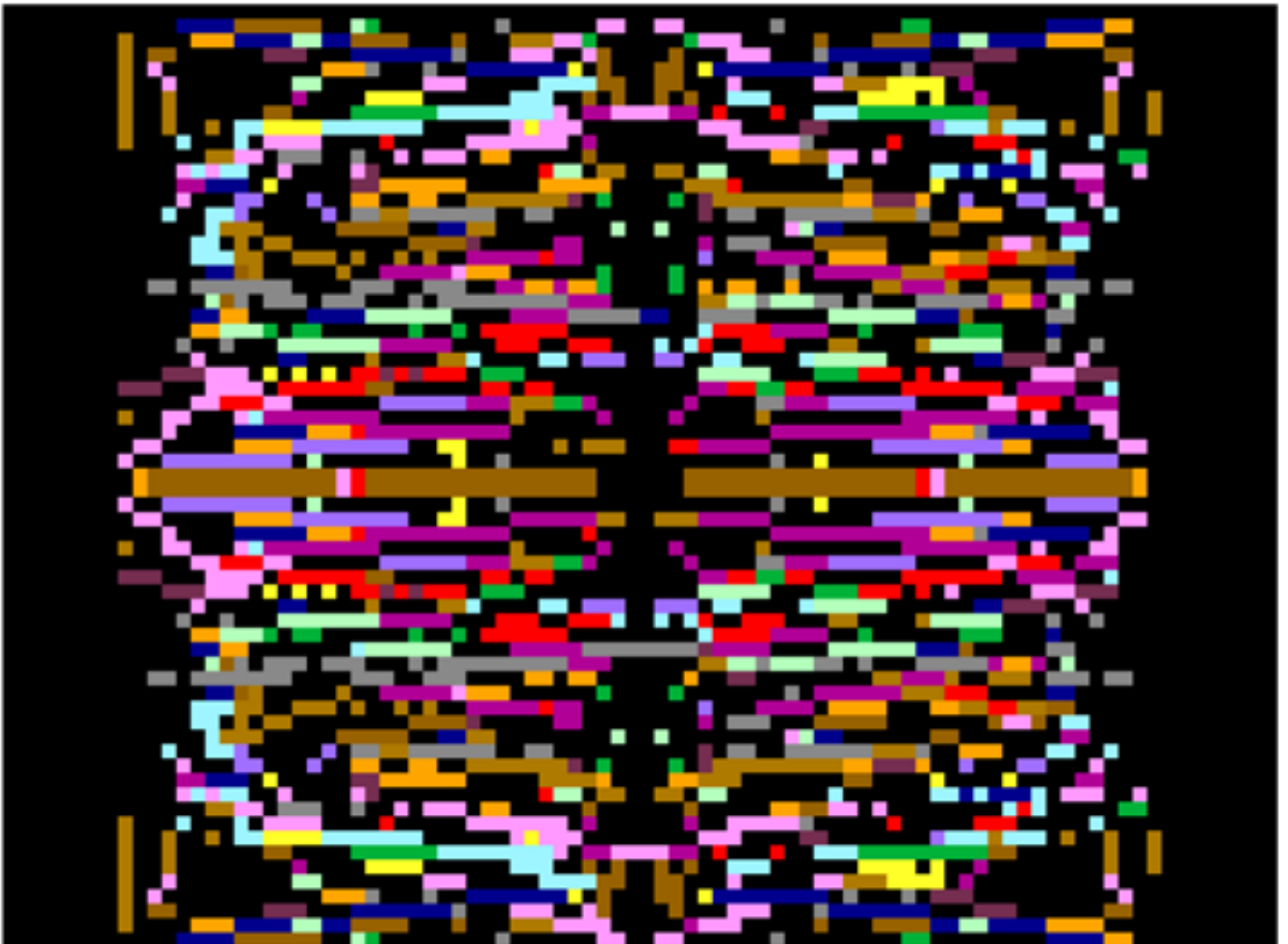


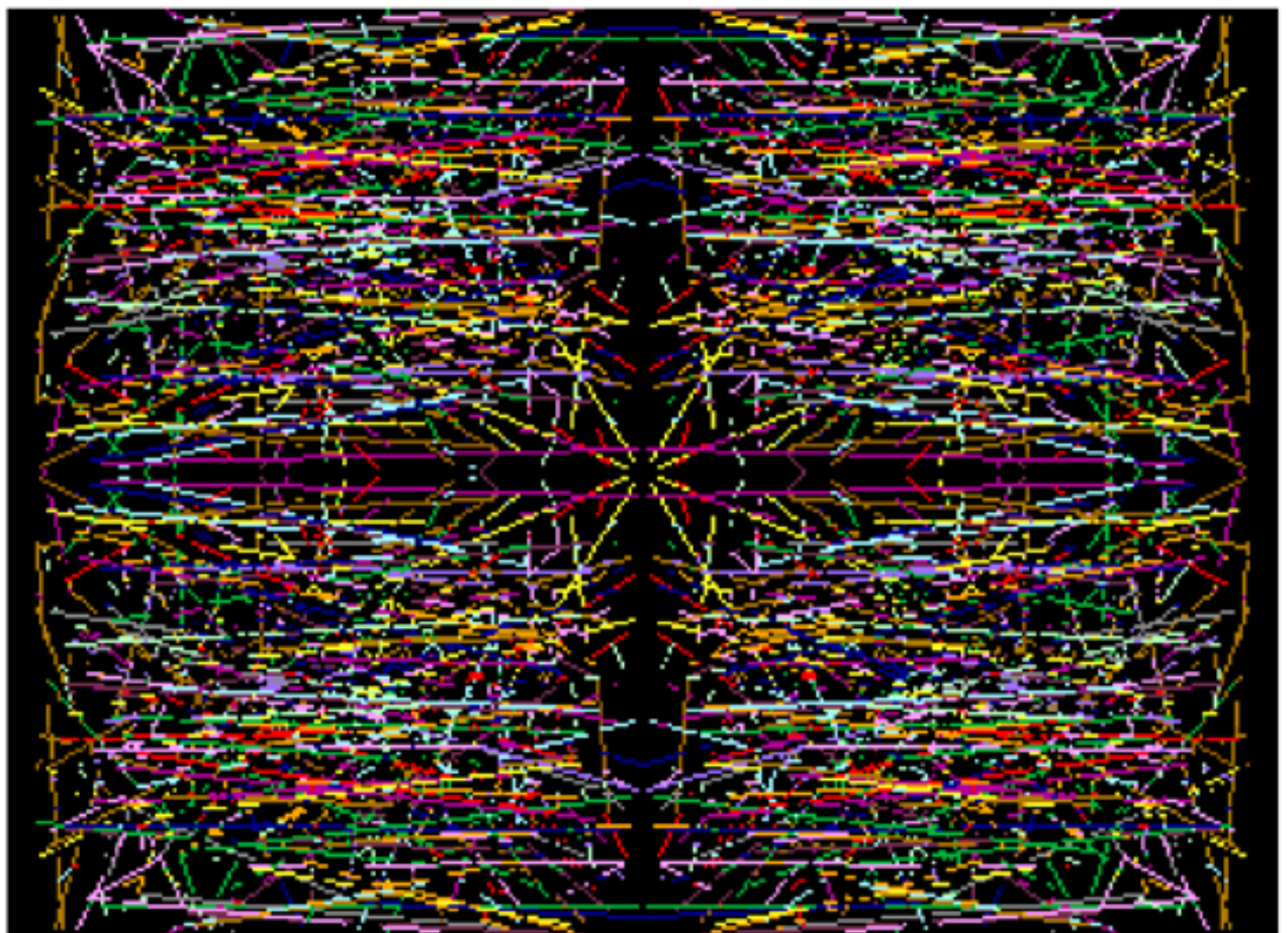
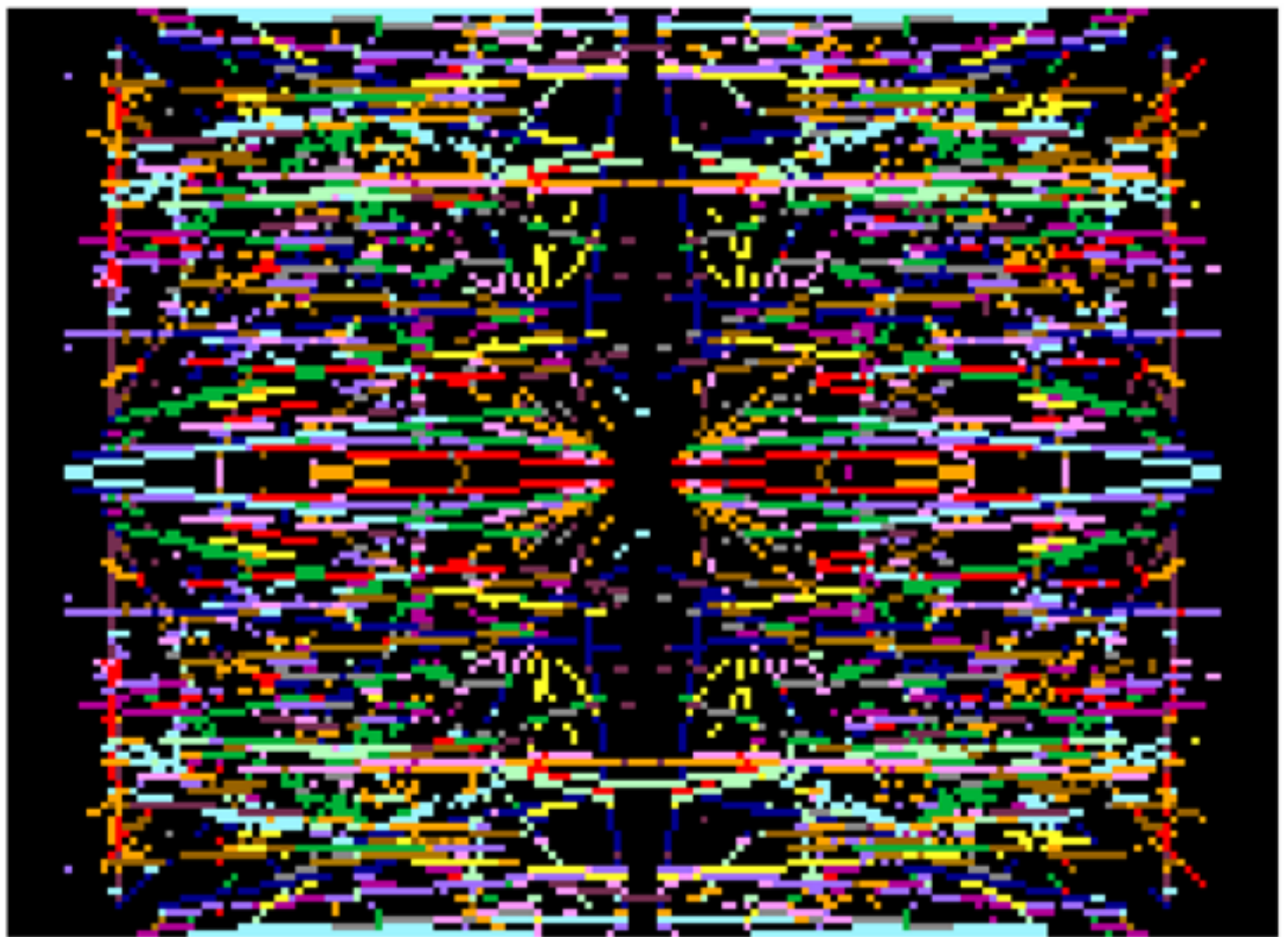
Any segment of a graphic on the screen could have been saved as an additional character in Pictorial font with transparent background. I created Helvetica medium fonts in various sizes. Extra characters needed two-key entry e.g. "Tab+S" for "Š".

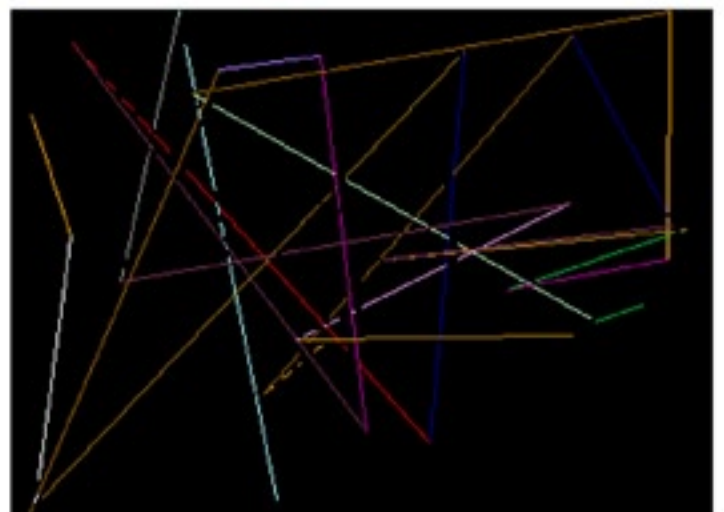
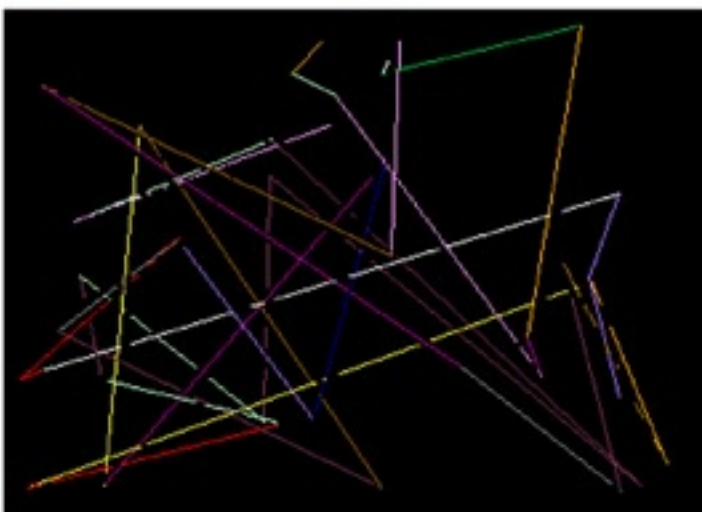
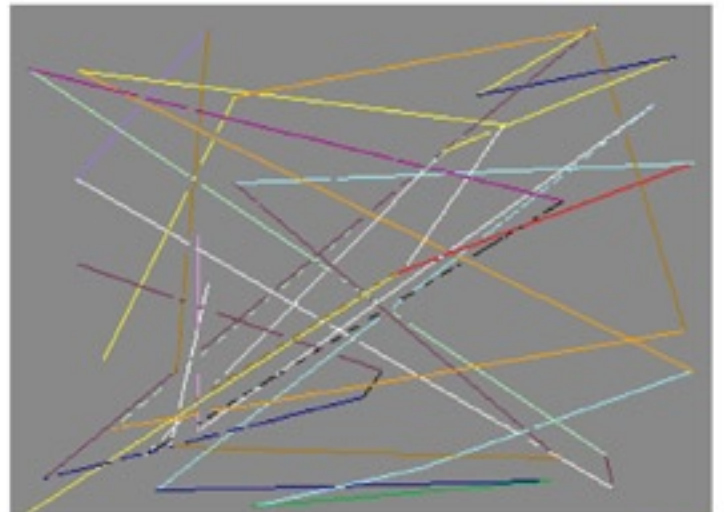
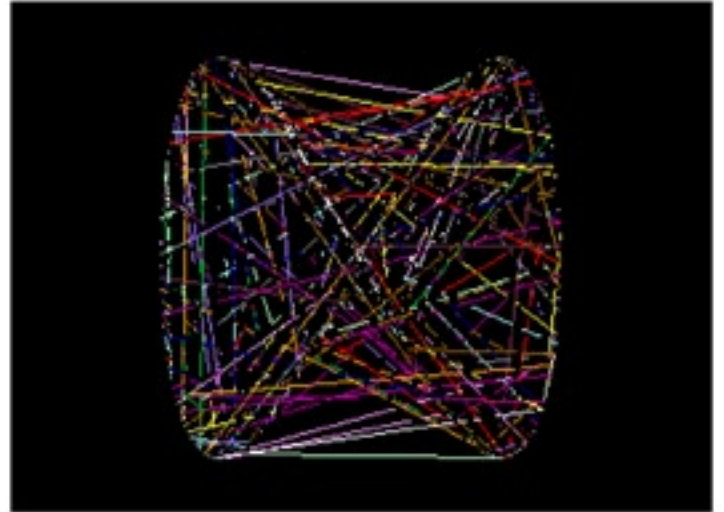
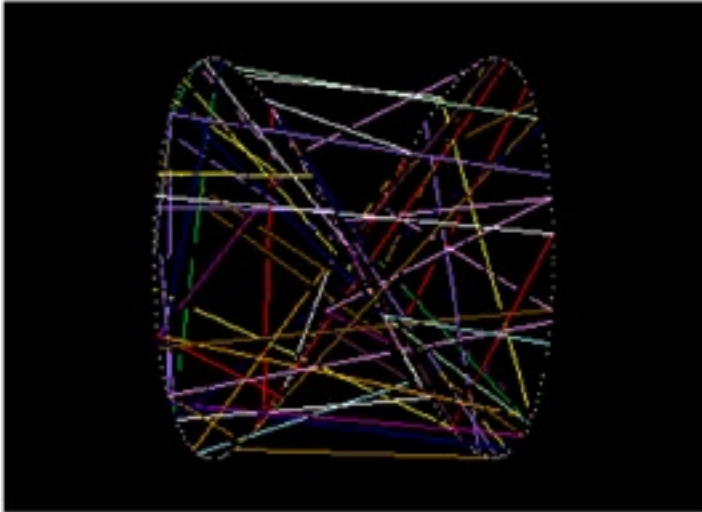
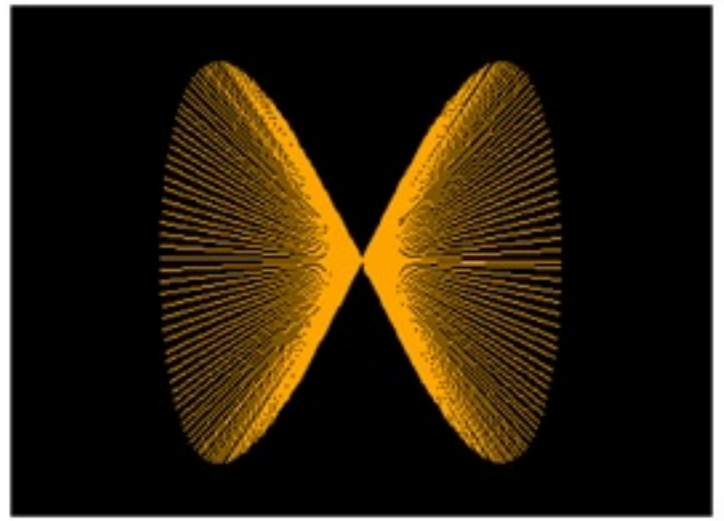
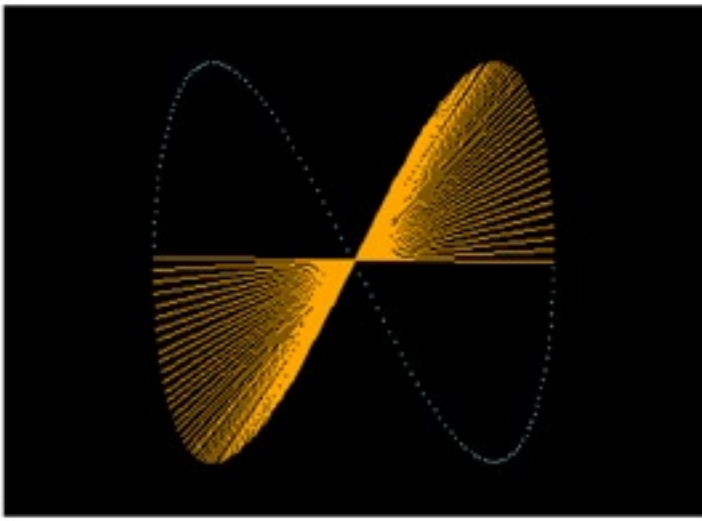


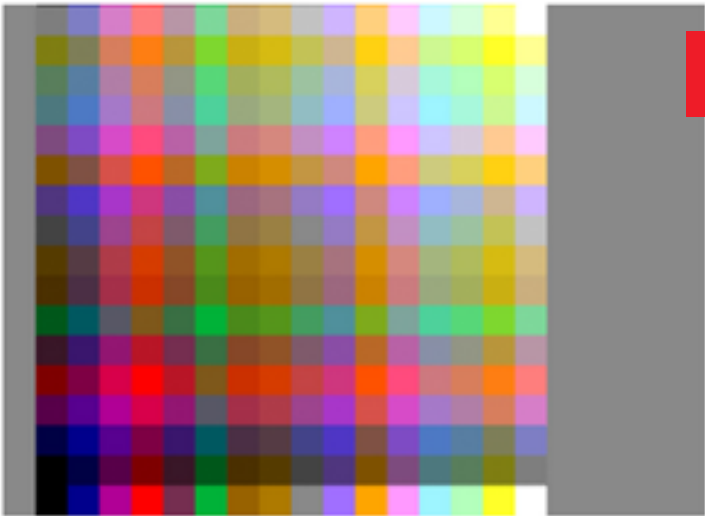
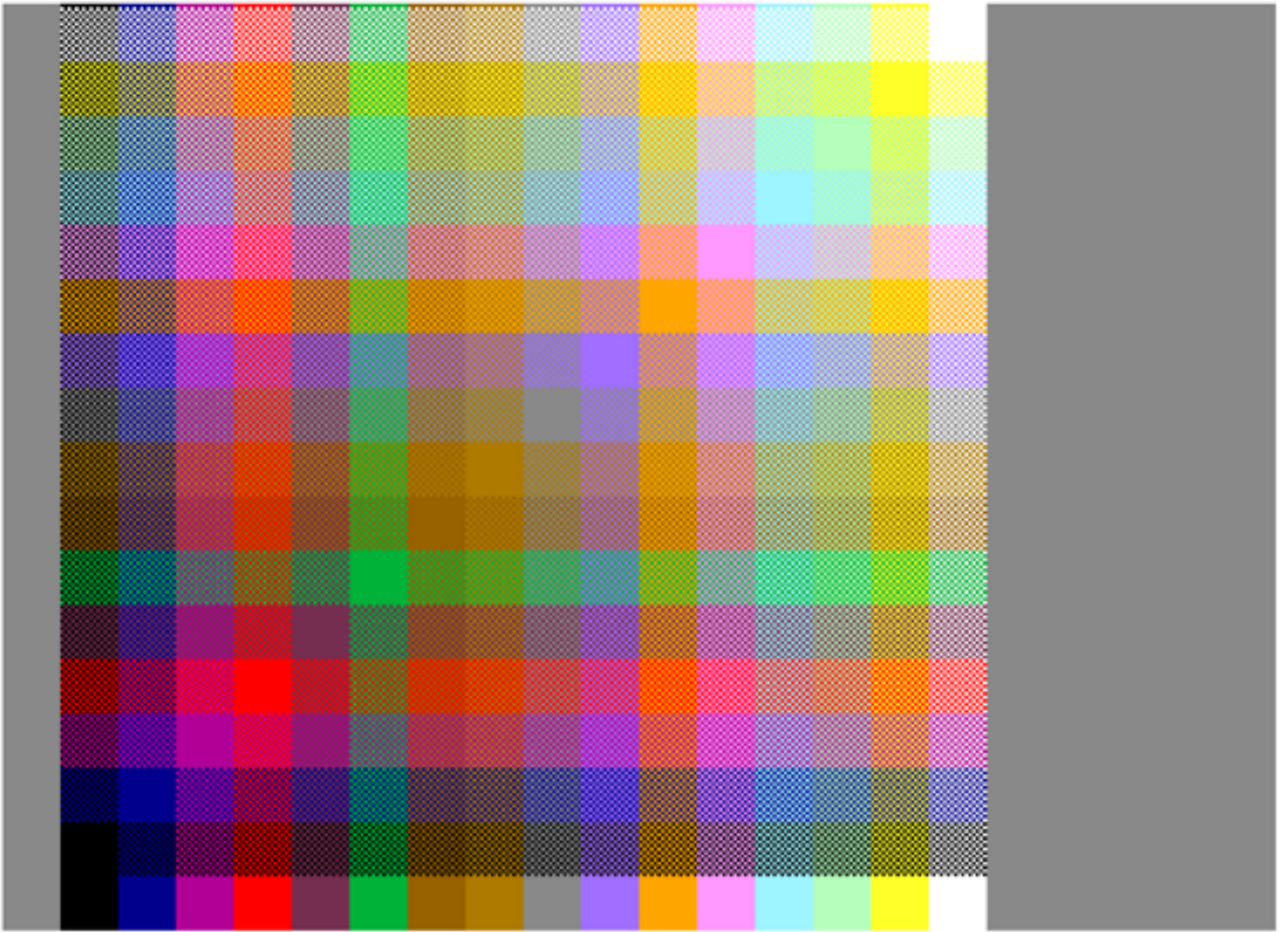


Kaleidoscope in three DAI graphic modes showing different resolution in 16 colors.

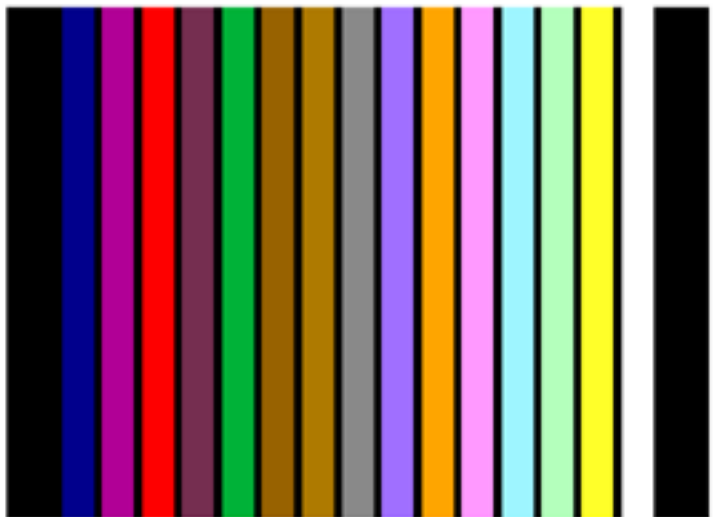
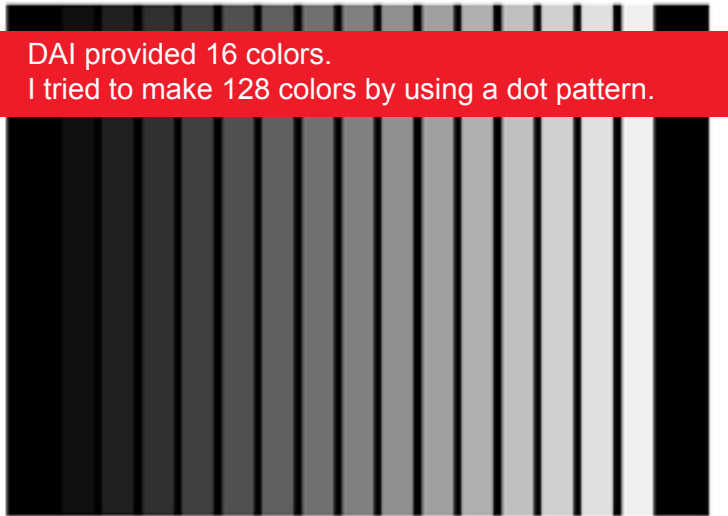






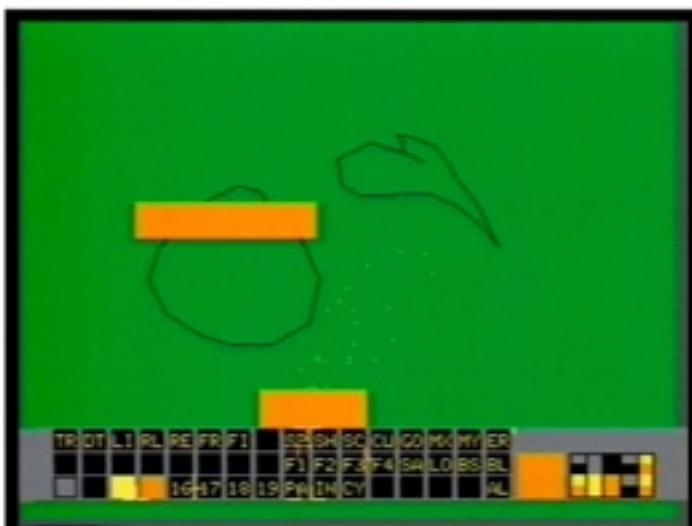


DAI provided 16 colors.
I tried to make 128 colors by using a dot pattern.

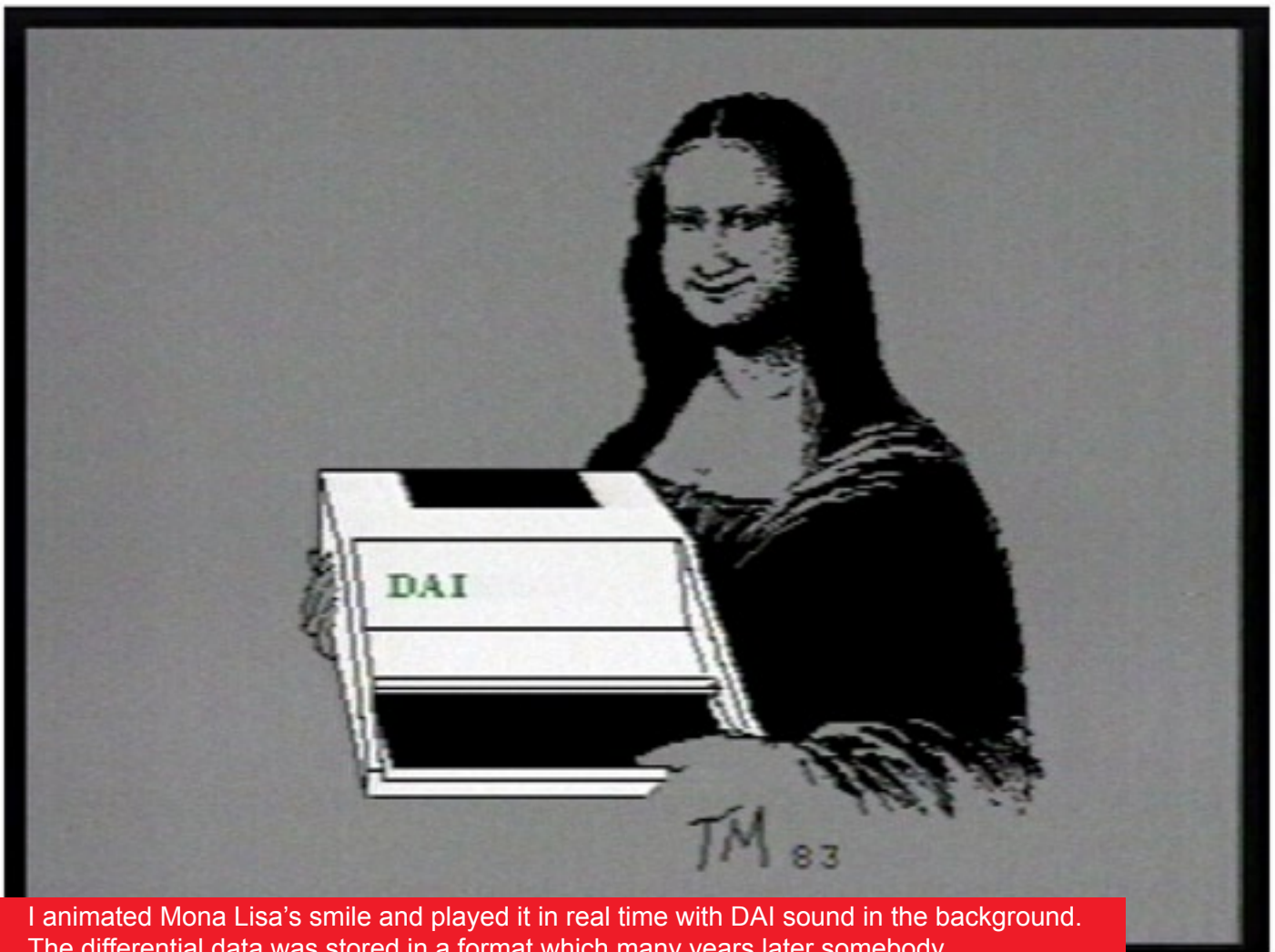




Connecting a graphic tablet (HIPAD by Houston Instrument) to DAI enabled me to create hand drawn images. I had to write my own driver for DCE-Bus and a Paint program. Adding the drawing functions was an ongoing process.







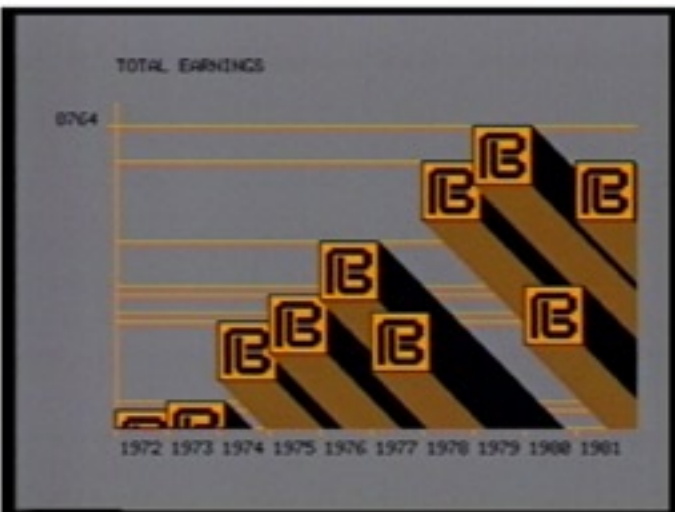
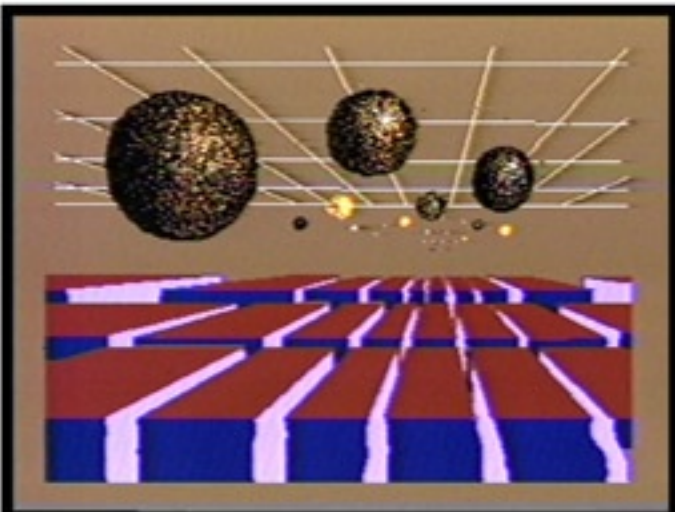
I animated Mona Lisa's smile and played it in real time with DAI sound in the background. The differential data was stored in a format which many years later somebody patented as "Animated GIF"

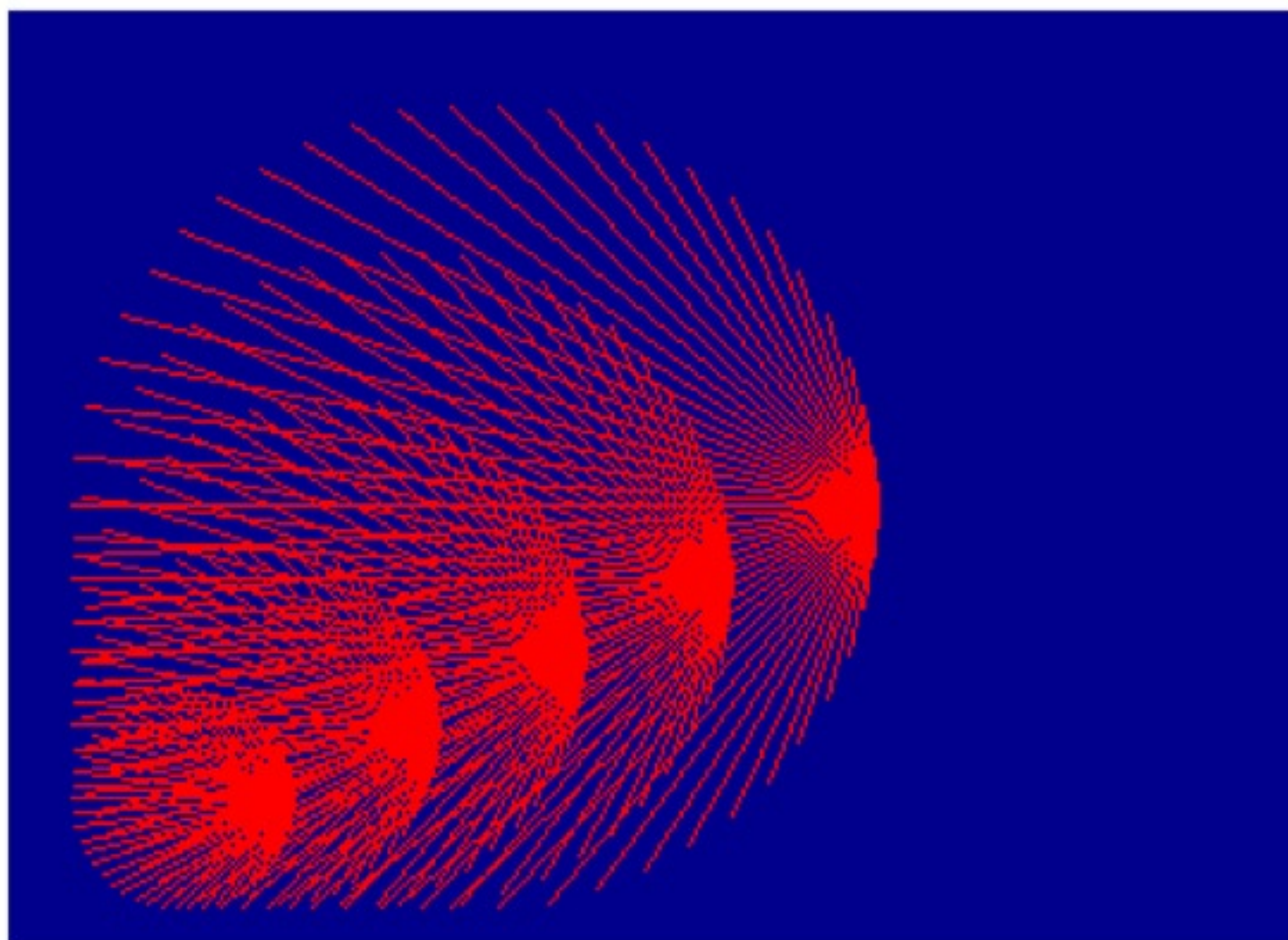


My portrait of Leonard Cohen who influenced my work a lot since his first album.

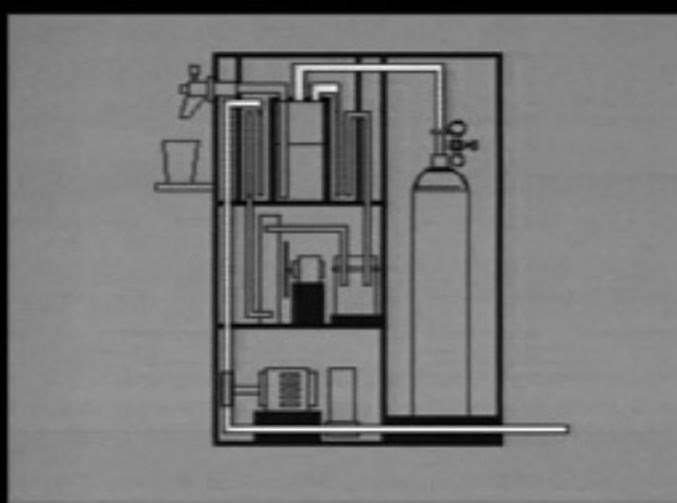
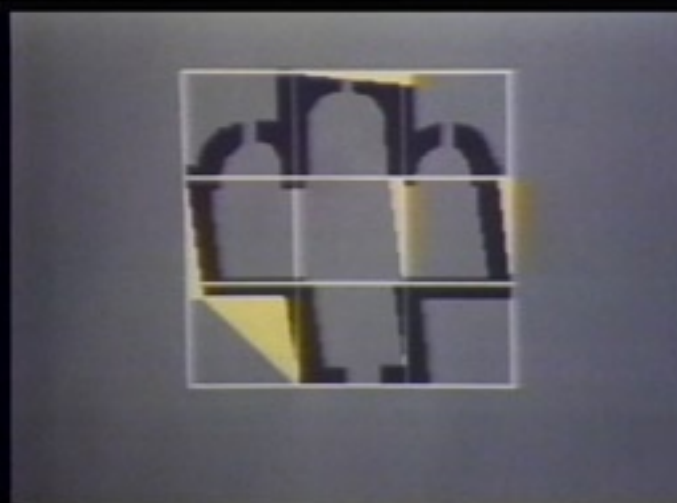
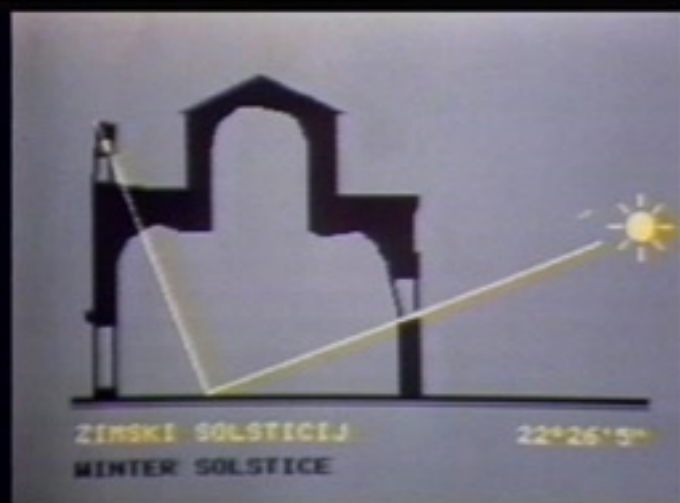
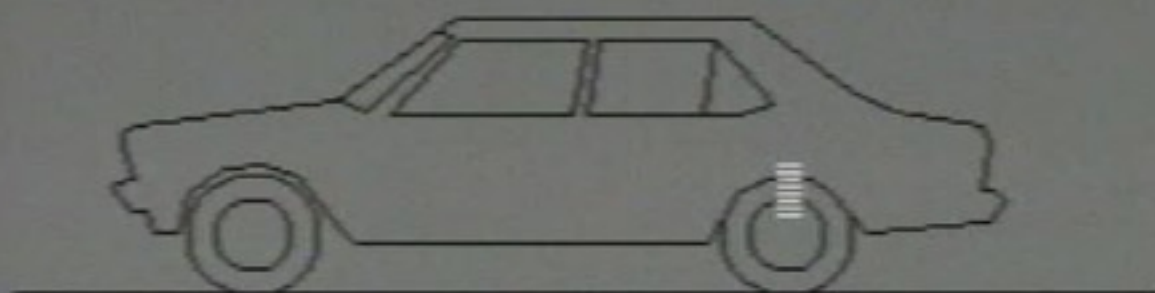


Can you spot four countries which changed borders since early 1980s until today (2019) on the map of Europe below?





AMMORTIZZATORI ALFEO MORET

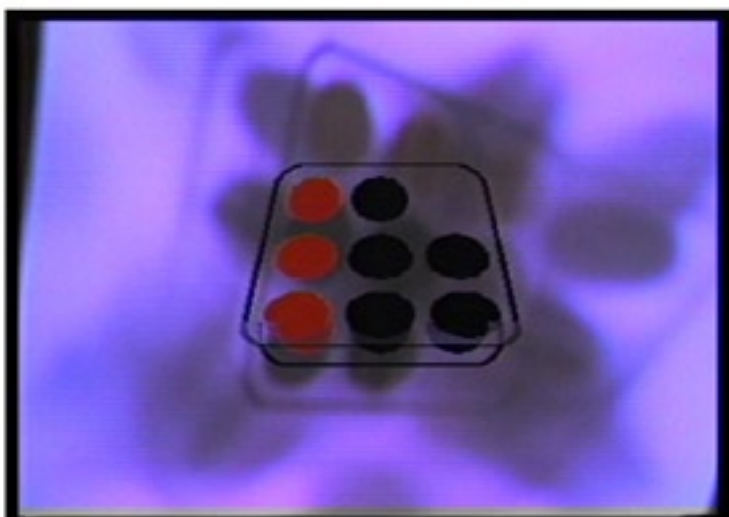


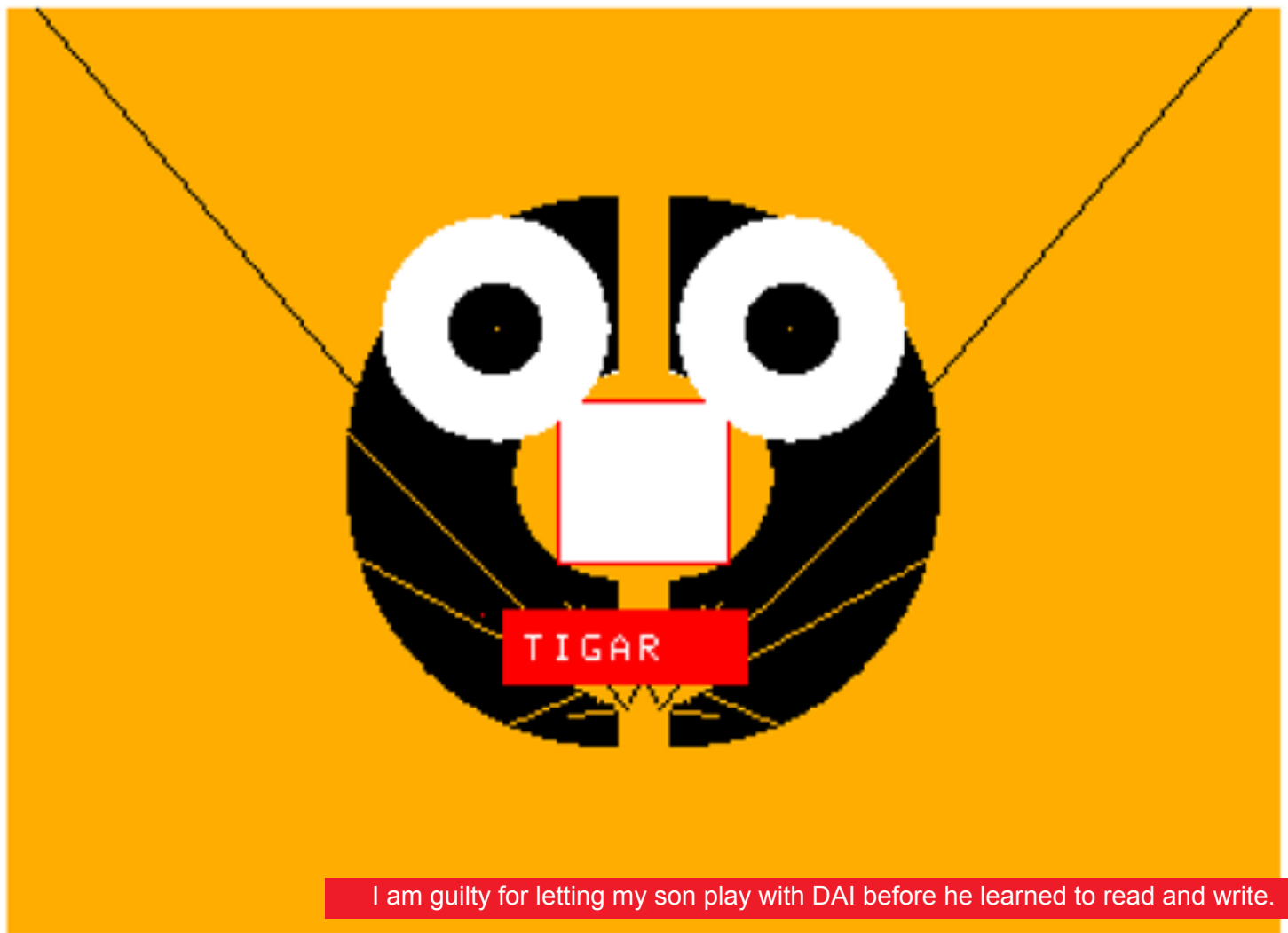


I was using very frequently the wipes and animated masks in real time in broadcast TV production.

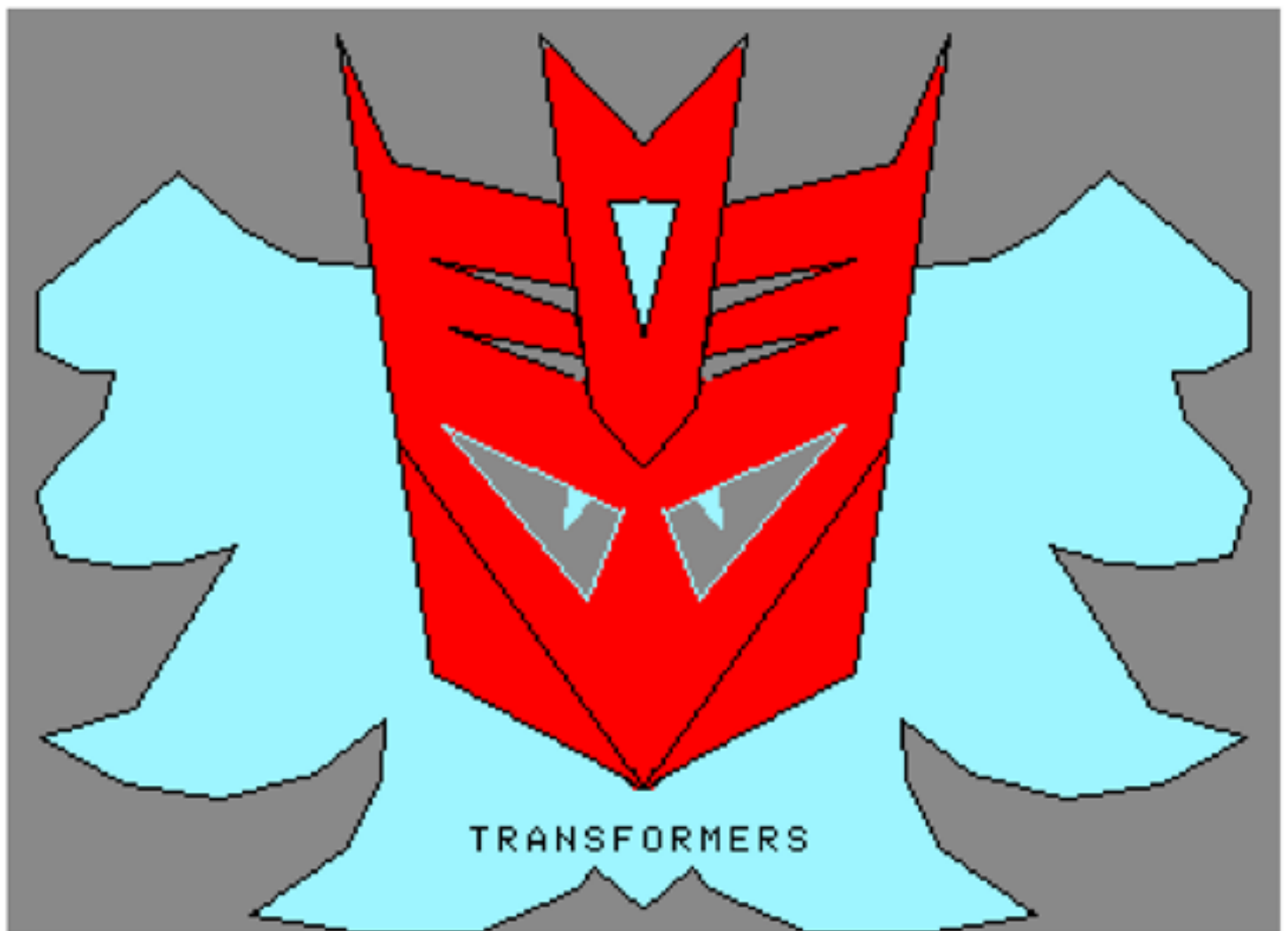
ATLAS
tour

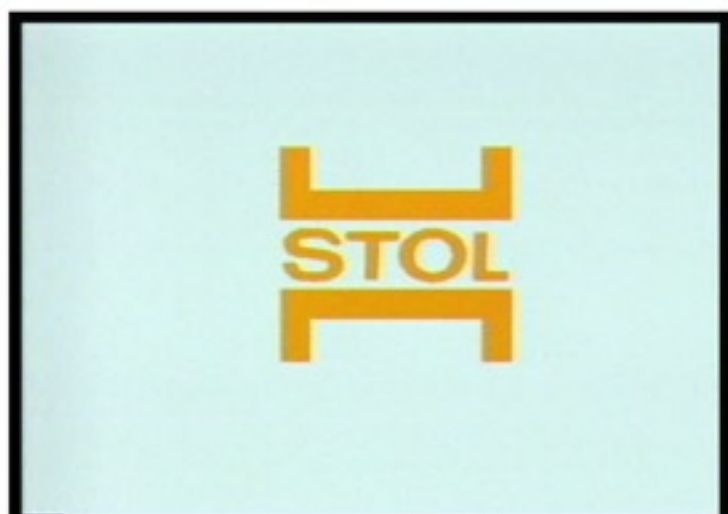
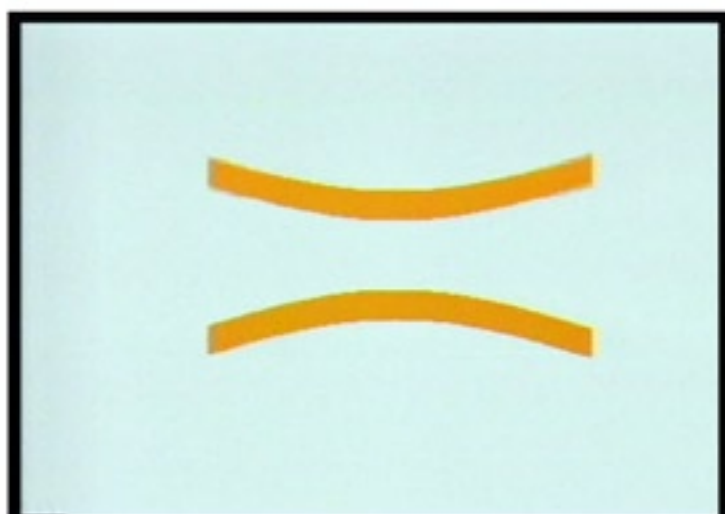


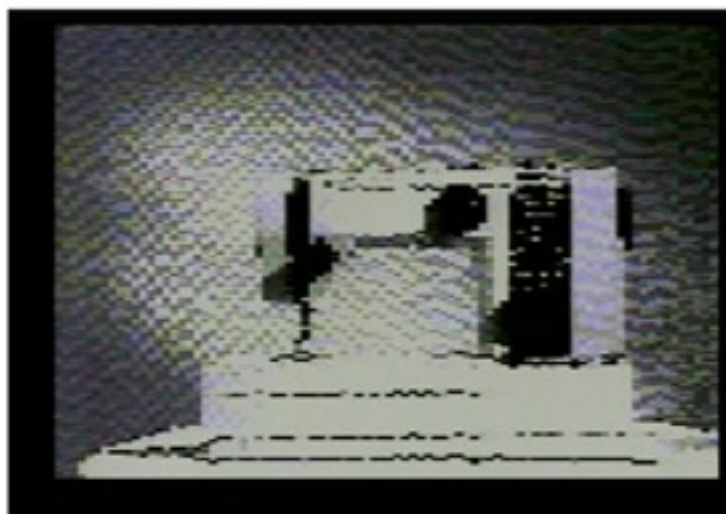
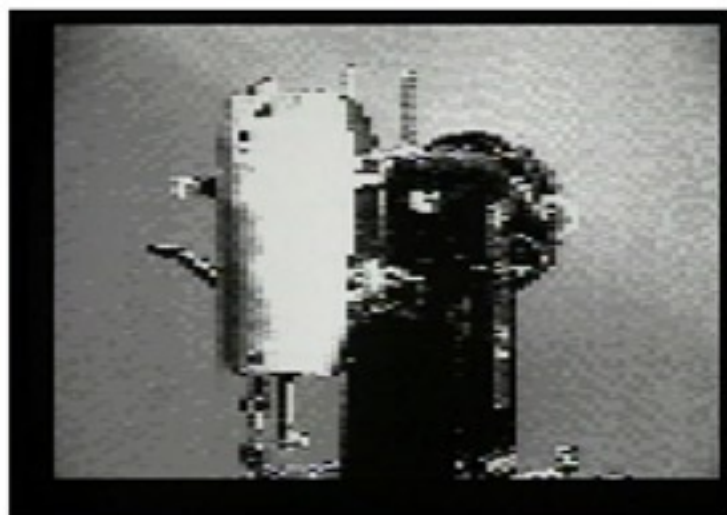
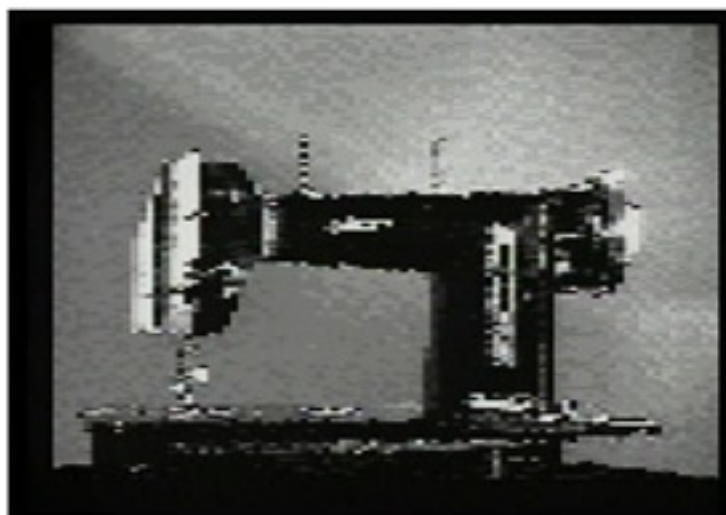




I am guilty for letting my son play with DAI before he learned to read and write.

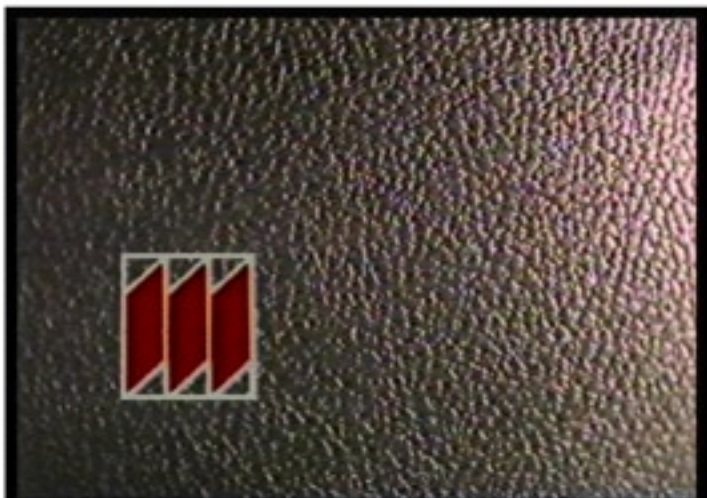


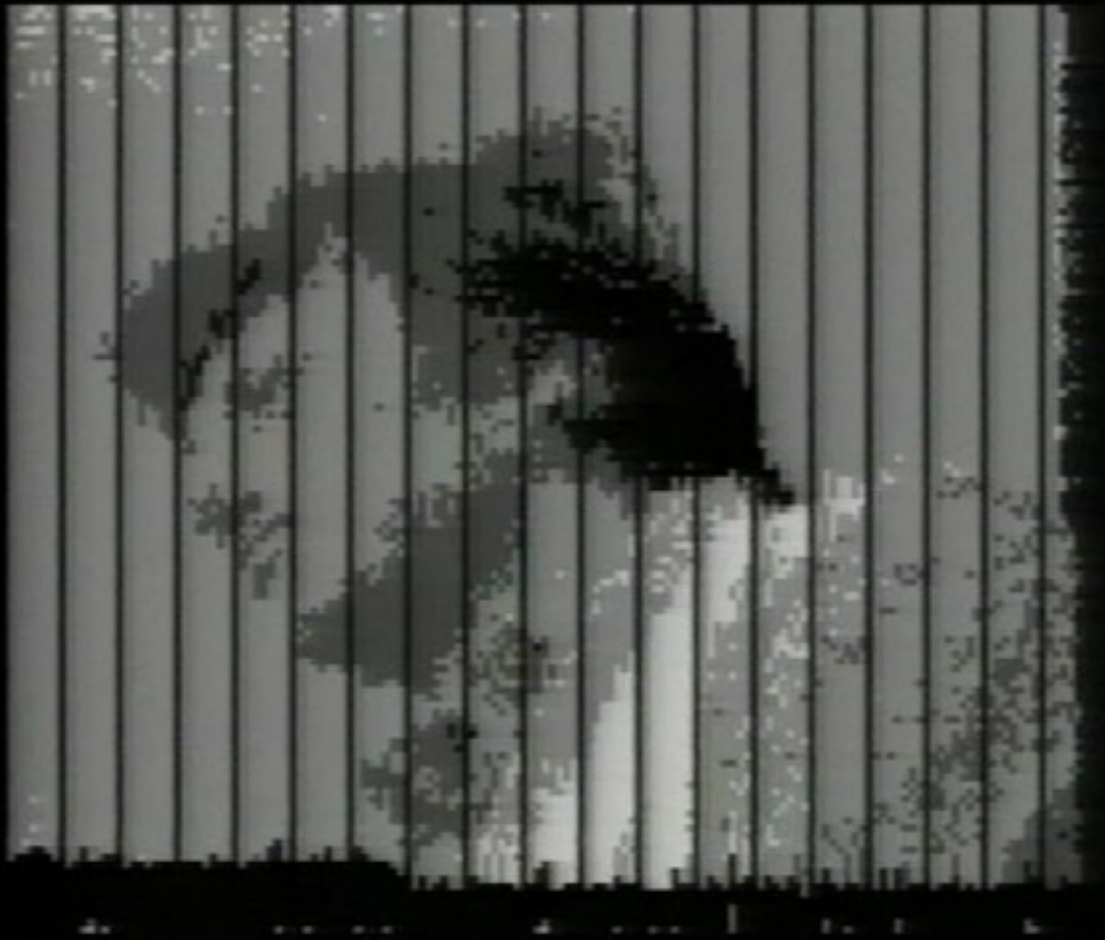




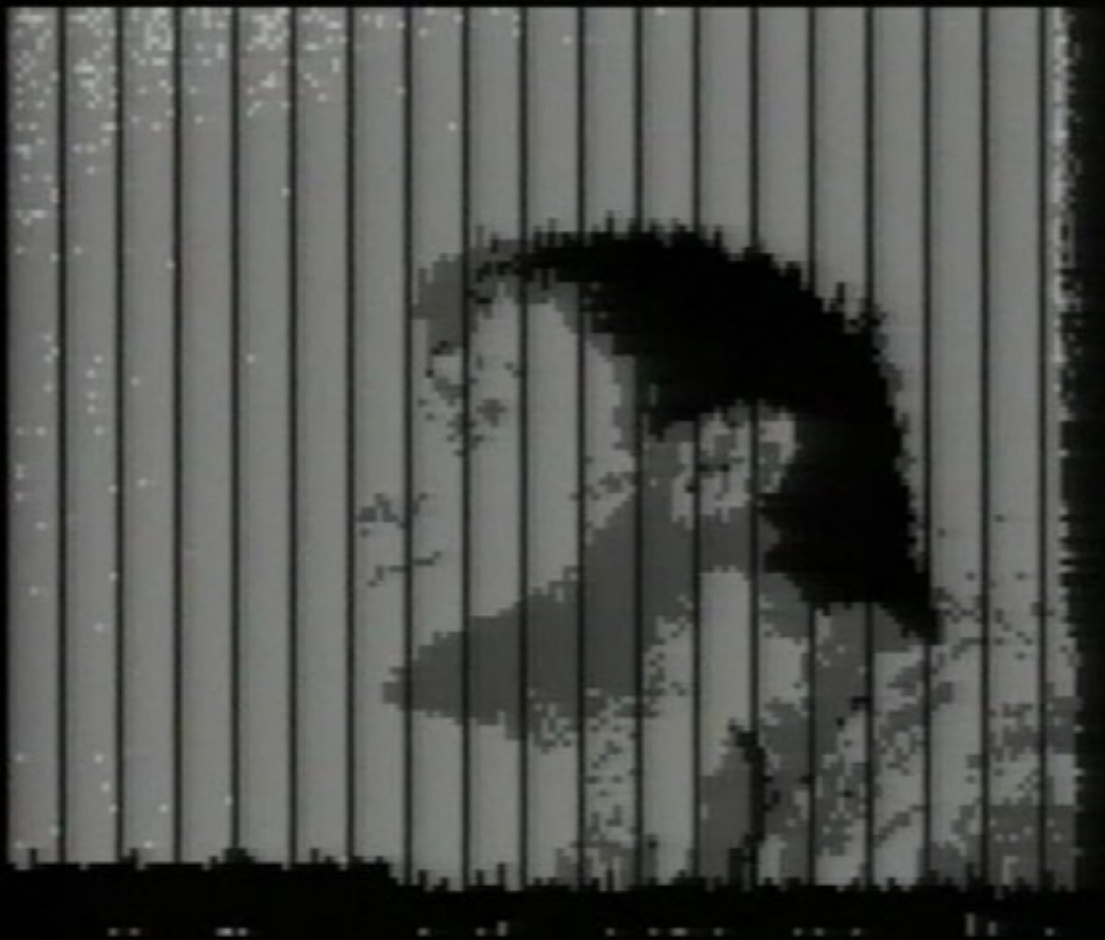


With my DIY video digitizer I captured a random face from a magazine and displayed it in alphanumeric on the football stadium at the huge Rock concert "Omladinski Mirodrom" ("Peace-yard") in Split on 28. SEP 1985. The concert was politically important in a delicate time of political turbulence Yugoslavia was already experiencing. My graphic must have looked so "obscure" that an official in grey raincoat came in panic asking me to disconnect computer immediately.





First test of video digitizer. Timing was coarse and 8th bit was skipped. The hardware guru Kruno Penezić who designed the digitizer is shown above and TM below. We used a voltage metering card based on S-100 bus for Cromemco. Kruno added some RAM and I wrote the software.



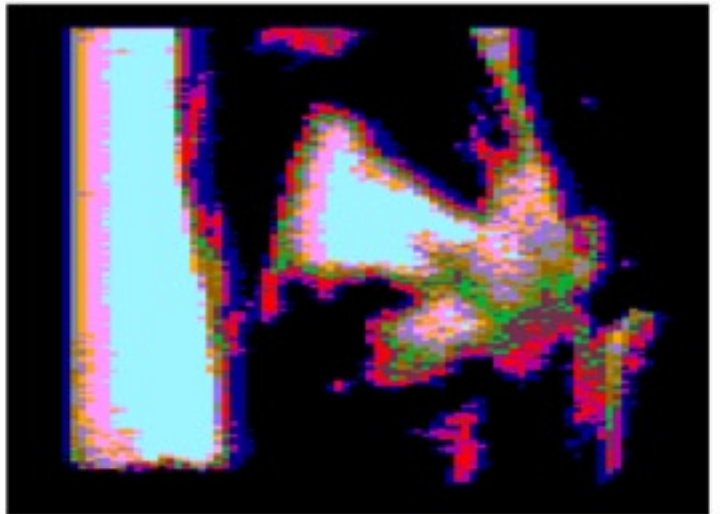




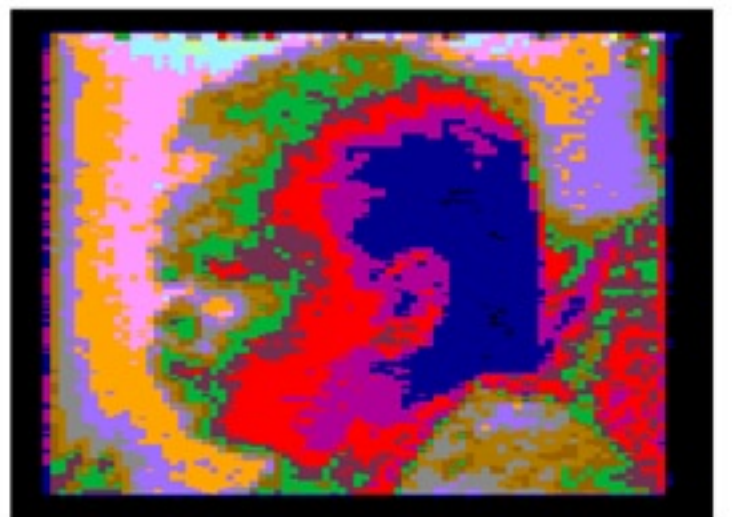
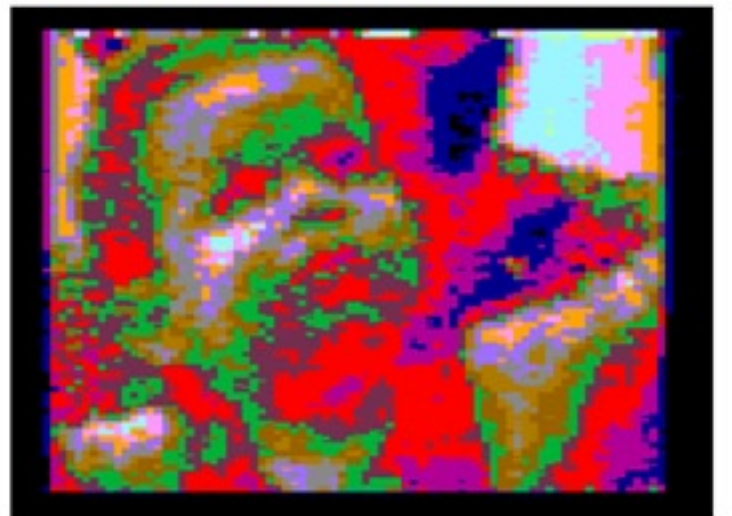




A video still was captured from top to bottom and from left to right. It took about 20 seconds to capture full frame. It allowed playing with the zoom and object position to achieve distortions.













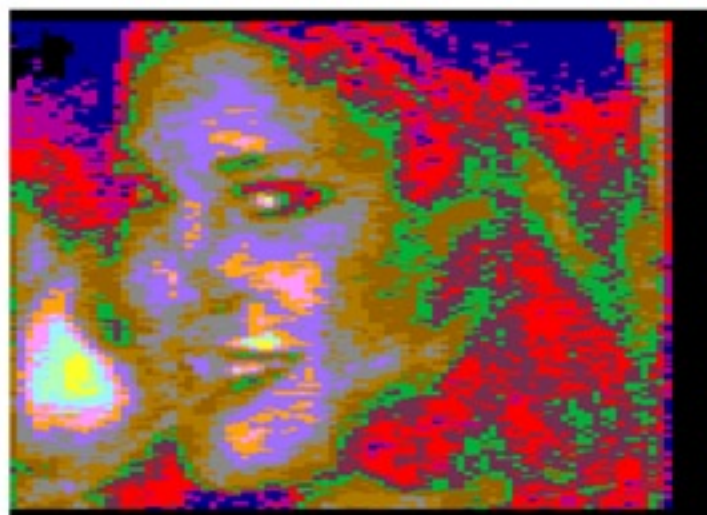






When capturing from video was added to the features of programming graphics and hand drawing it improved the commercial potential of DAI graphics greatly.





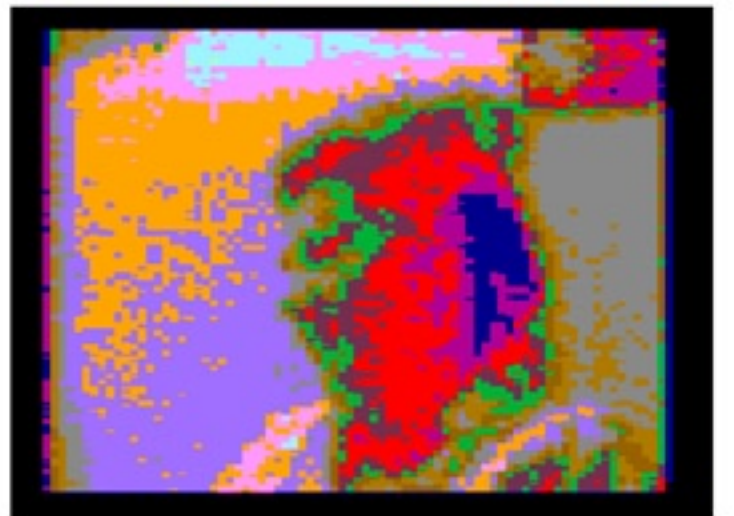




I developed some image manipulation subroutines like mirroring and zooming in and out.











Wedding in December 1979 in Zagreb, Croatia





.... and 40 years later in December 2019 in Melbourne, Australia.







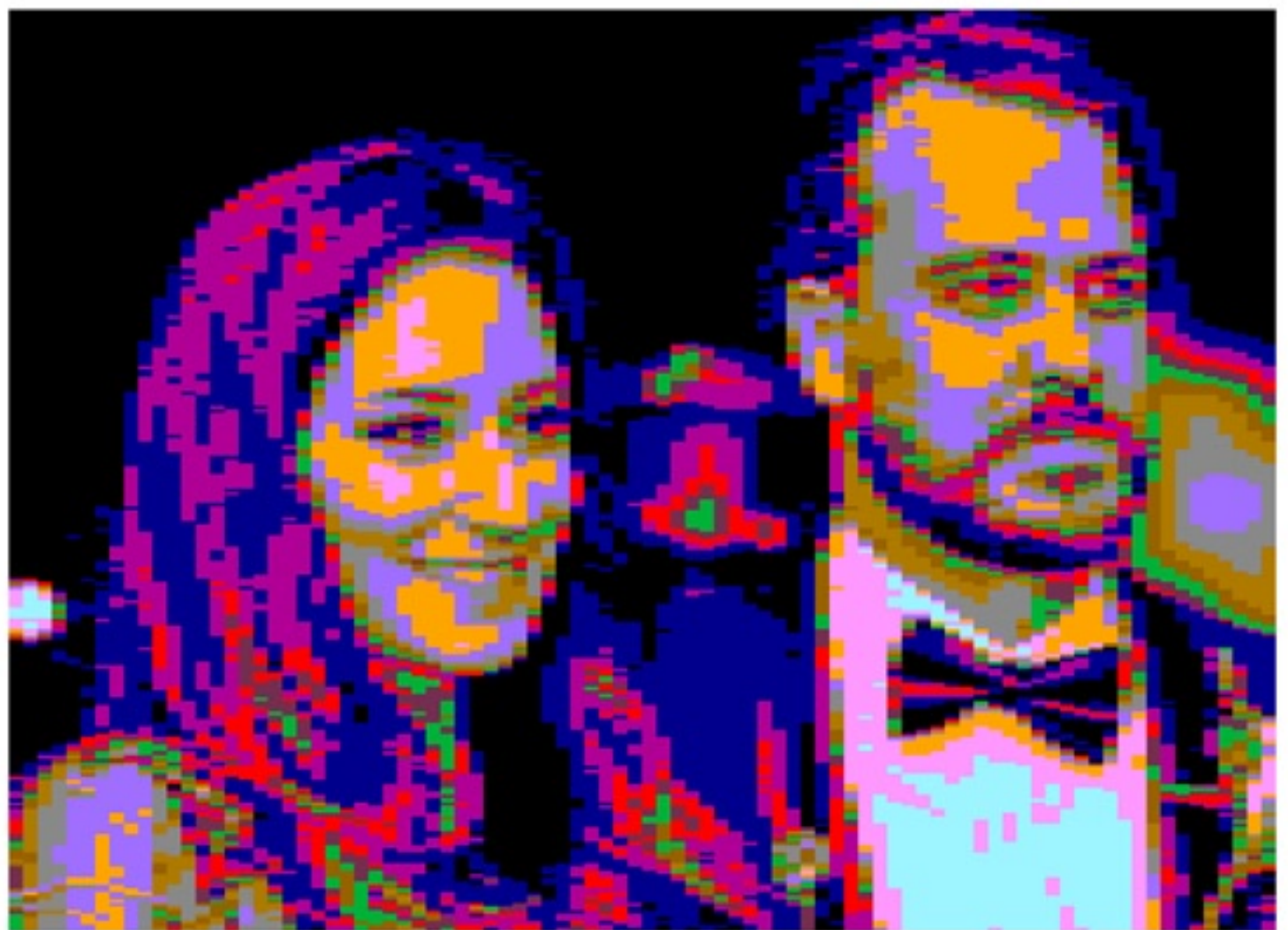
Thank you Emil for developing software to get images from DAI and to DAI.

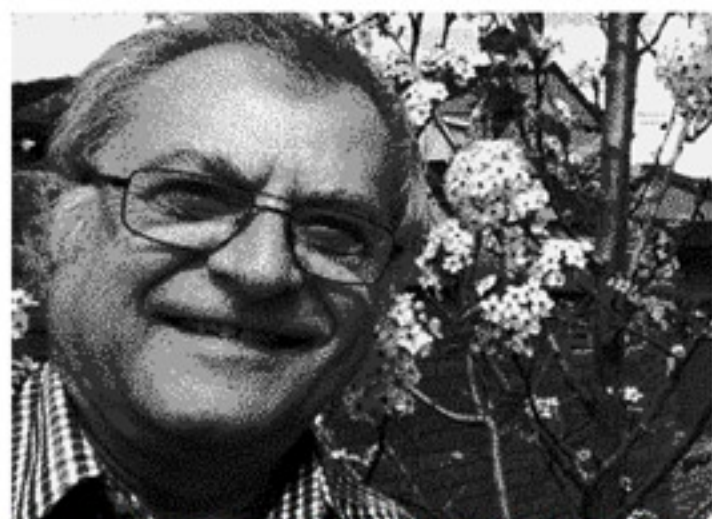




My dear Ana, I am so glad to see you and Dan and family and friends on the DAI screen although you were not even born when I struggled to buy it!



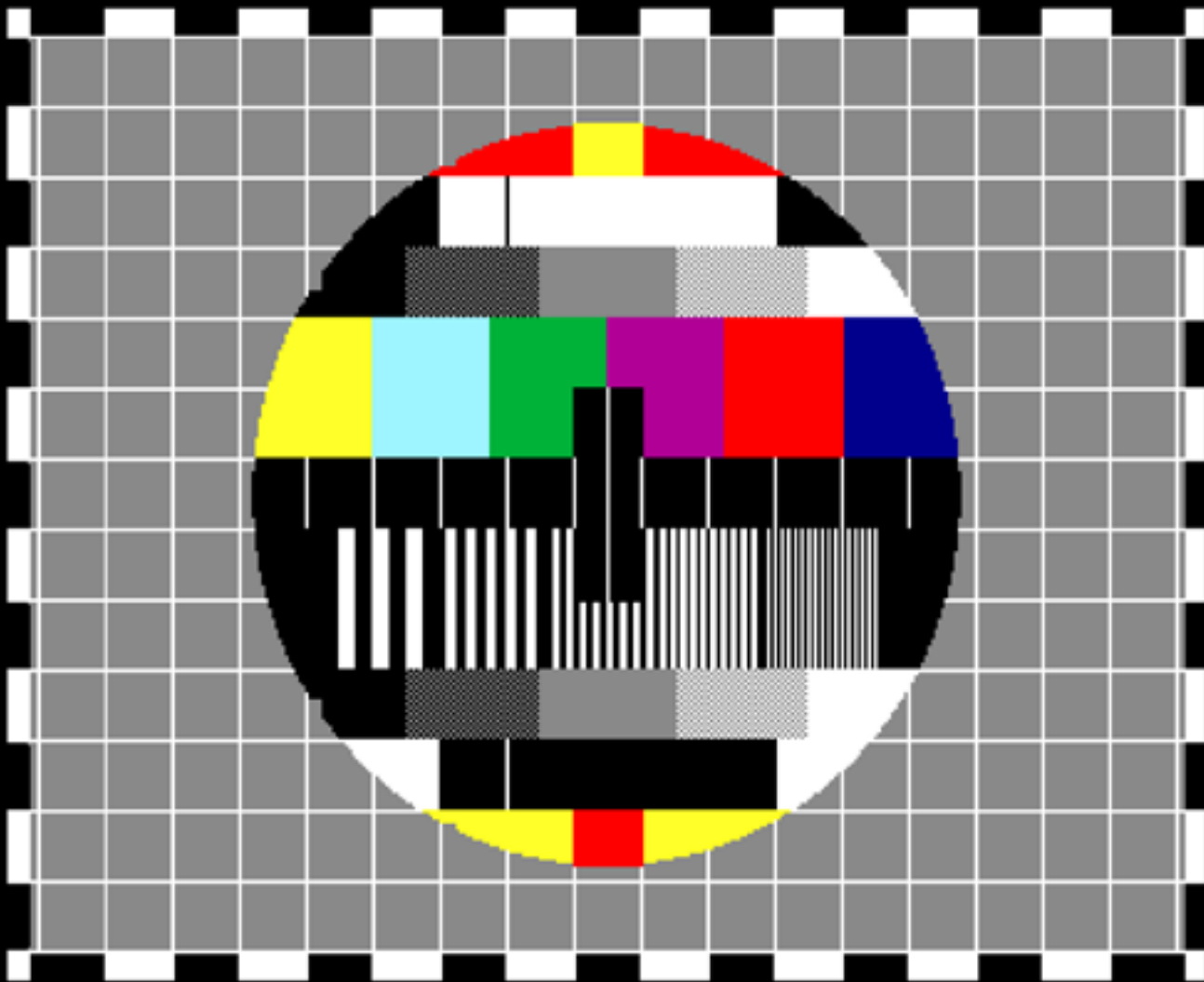




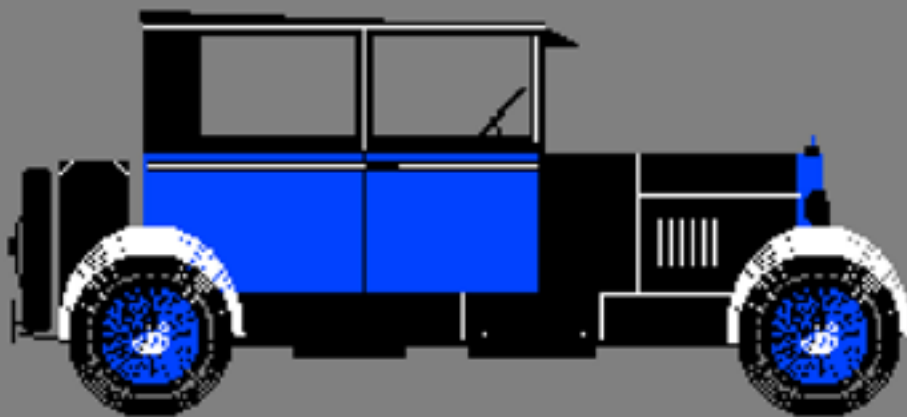


If you like this cartoonish selfie for DAI you may also wish to see my photo impersonations:
<https://www.tomislavmikulic.com/PDF/impersonations.pdf>





I am not the author of these two images. I merely typed the code from DAInamic magazines.



DA I
COMPUTER

ZAGREB

26.10.1981

TEST PROGRAM BY Tomislav Mitulic