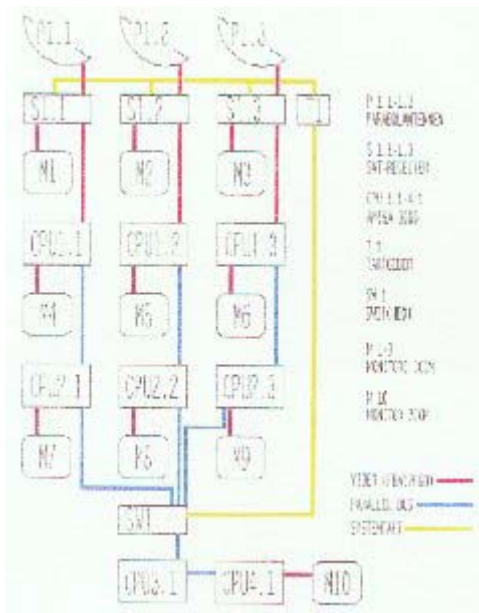


TV POETRY GEBHARD SENG MÜLLER



SET-UP FOR EXPERIMENTATION 1/93

"TV Poetry" is an experimental set-up which can be put together at any location. Combined with precisely adjusted receiving equipment, it rapidly scans the various television transmissions it receives (commercials, news, quiz shows, etc.) for text passages visible on the screen. In an ongoing, real-time process, the text is recognized, filtered out, processed, and output as an endless stream of text, generated by TV programs and CPU programming. Through imponderability, inaccuracy, video noise and misinterpretation within the system, the source text is radically transformed, giving rise to new meanings. Very powerful content (headlines, slogans ...) "shines through" and tends to remain intact.

Signal processing takes place in parallel process on separate machines and only comes together in the final stage. The quality of the results in terms of density, continuity, and recognizable content is in a direct proportional relationship to the available power and capacity of the equipment (number of TV channels, number and operating frequency of the CPUs, bus width of the connections).

FUNCTION / STRUCTURE

Three parabolic dishes receive the transmissions of all TV satellites serving Europe, constantly tracking from one to the next. Three satellite tuners (S1.1—1.3), synchronized by pulses (synch pulse generator T1) select a new channel each second. CPUs 1.1—1.3 (Framegrabber) capture one frame from each selection, convert it into a black and white image and send it as a data file over parallel interfaces to CPUs 2.1—2.3. Optical Character Recognition (OCR) is then used to extract some of the text from the picture and convert it into ASCII text data files. At this stage of the process, electronic video noise in the signal and elements of the video image itself are also interpreted as letters, creating a sort of "text noise". CPU 3.1 receives the ASCII text streams from CPUs 2.1—2.3, alternated by a parallel switchbox (S1) controlled by pulse generator T1. The text is then sorted and selected according to certain rules (see below) and output from CPU 4.1 to monitor M10 as an endless stream. Receivers S1.1—1.3 and CPUs 1.1—3.1 are also connected to smaller monitors (M 1—9) which display the raw data. ARREX scripts represent the control process which governs the running of the program and ensures communication between the equipment blocks.

TEXT FILTERING RULES IN CPU 3.1:

(one possible selection; the system is completely programmable)

- erase all isolated text characters
- erase all characters not in the alphabet (control characters, numbers)
- add to / replace incomplete blocks of words with similar words which are known to the system.
- fill gaps in the text of length greater than xx with available material.

TV-Poetry — a project by G. S. Collaboration:

Günter Erhart / Clemens Zauner (Systemdesign), Bruno Klomfar (Fotografie), produziert von Pyramedia Wien.