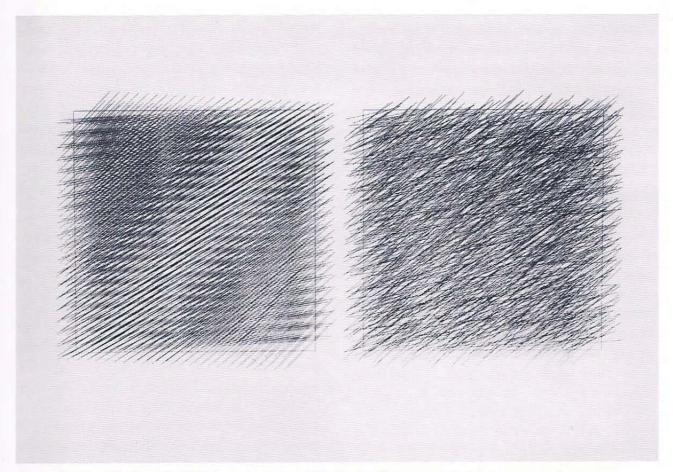
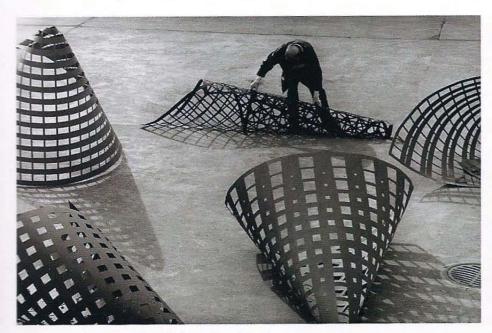
Roland Jung



Mixed 6 (1993) and Random 3 (1993). Both works were created by the Jung Programme and printed on paper as drawings.



Spiraltrichter/Spiral cone (1985/86), reinforced iron, laser cut. correct: aluminium, punched, protective color



Detail of sliding door designed for the institute of musicology at the University of Zurich. Photo: Cristina Urchueguia.

These works have been influenced by what is known as the 'paint box era', which starts with the Apple Il computer and categorises these pieces under the (second-)generation of computer art that stopped producing vector-based picture elements, but were able to resort to graphic user surfaces and tools. However, the excerpts from the series Composition verticale/ horizontale à 3 éléments (1993/94) reproduced here are a later recollection of classic first-generation computer art: the structure of its composition is written down word for word on paper. In contrast to Graumann's installations that may be extremely ironical when addressing the computer and its environment,31 the illustrations reproduced here, despite their special status in the overall work, can be associated with what the artist says about his beginnings:

At the time, I was making engravings, doing linocuts, a typographic technique. I tried to reproduce the point the pixel by taking as my model the screen with its vertical and horizontal axes. Taking two sheets of linoleum of the same size, I cut a vertical line into the first and a horizontal one into the other. The first sheet was printed and it shows a white vertical line on a black ground. Then I took this same sheet of paper and printed on it with the second line, which produced a horizontal line which now was not white because it was printed on black. The result was a double layer of black over the whole sheet, except in the horizontal and vertical lines, where there was only one coat of ink and a white dot. The white dot was where the two lines intersected.³²

This completes the examples of computer art that had emerged only slightly earlier. In the case of Hervé Graumann, while a direct connection can be established in terms of style, form and, above all, intention, to the more recent computer-based art forms described in this year book, the work of Roland Jung (*1941) finally allows Swiss computer art to be metaphorically (re-)coupled with the historical precursor of the computer: the Joseph-Marie Jacquard

(1752–1834) loom of which Charles Babbage (1791–1871) is supposed to have said:

The fact is that with a Jacquard loom one can weave any conceivable pattern. In the factories there are artists who design such patterns. Based on their designs, a special machine is then used to punch holes in pasteboard cards. By combining these cards, the loom weaves an exact reproduction of the pattern. Even if the colour or shade of the threads is different, the designs on the fabric remain the same, distinguished only by colour.³³

In fact Roland Jung first learned weaving not on a Jacquard loom but from scratch, before establishing contact in 1985 with the integrated gallery belonging to the NOKIA office (previously Riccho) in Zurich. NOKIA immediately recognised the potential for design not only in the computer but also in the artist and supported Roland Jung by allowing him to use some of the technical infrastructure for project purposes. The artist, in collaboration with an engineer and prospective computer scientists, was therefore able to expand his visions of structure-based art by using his own computer programme. A 'Jung programme' was developed which for years facilitated the creation of vastly different illustrations that were printed on medium-sized paper, examples being Mixed6 (1993) and Random3. Initial (1993) that are displayed here. They have been created with a 1986 programme version. Or the programme was used as a basis for sculptural objects, reflected in Spiraltrichter/Cone spirale (1985/86), also reproduced here.

In contrast to Gottfried Honegger's monolithic sculptures in the 1970s and 1980s, Roland Jung's sculpture stands on thin metal and steel plates or industrially manufactured grills in which precisely calculated imperfections have been cut or lasered before being fully mounted. Fitted into the setting, objects emerge that seem to be light, almost transparent, despite the heavy materials used. The lines worked out on the computer are recognisable as sections or vacant forms. The range of forms

³¹ For instance, in *Hard on Soft* (1993) Hervé Graumann placed an ink jet printer on a sponge pedestal so that the movements of the print button during the print process caused the entire installation to shake.

³² Laurence Dreyfus, interview with Hervé Graumann, in: Herve Graumann, Baertschi-Salomon (eds.), Geneva 2005, p. 51.

³³ Charles Babbage, quoted in: Irene Meichsner, Vom Webstuhl zum Computer, in: Deutschlandfunk, Kalenderblatt 7 August 2009, http://www.dradio.de/dlf/sendungen/kalenderblatt/1007887/.

has expanded over the years as has the spectrum of materials used which now include glass used for instance for facades or interiors.³⁴

Conclusion

If we again pose the question of the visibility or presence of first-generation computer graphics in Switzerland, we encounter some extremely interesting aspects. An impressive array of art forms has developed in the country in which graphic computer art continues to exist. In addition to work that is graphically plotted on paper, there are manifold innovations in the field of sculpture, ranging from plotted paintings to architectural surface design.³⁵ Besides the forms of expression outlined here that belong either to the abstract tradition (classical modern) and Concrete

Art, or are committed to electronic art (music and video), there are additional sources of inspiration that produce hybrid forms, particularly in later work, after 1990 to be precise. Work of this period is shown to increasingly integrate aspects of everyday culture as well as narrative elements. This computer art rests on a basic, ambivalent stance that falls somewhere between euphoria and criticism, enchantment and disenchantment. It is not uncommon for what artists perceive as the conflict potential of the computer, to be expressed in or compensated for in the production of artwork, giving rise to an associative, cybernetic self-indulgence in which computer art addresses, processes, and articulates not only the technical and economic aspects of the media, but also social concerns. And perhaps this is where the particular charm of this form of art is to be found.

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³⁴ By way of example we can cite the large glass plates in the institute of musicology at the University of Zurich which function as a sliding door dividing a room into two parts and one plate at the entry to the seminar room. Both are decorated with geometric patterns; or door elements in the renovated interiors of the ETH observatory.

³⁵ Examples that can be cited include the HRS office building in St. Gallen, Switzerland and the facade of the school complex in Halden, both designed by Bernard Tagwerker.