

A Touch of Code

Code:

Long gone are the days when computer code was exclusively used by programmers. Over the last two decades designers have mastered algorithms alongside visual thinking, and today we can witness the first generation of computational designers mature. The coming generation of designers sees code as a kind of material just as a potter sees clay. Only through the deep understanding of the material qualities of the clay, and the ways in which one can shape it, can one communicate through it and create relevant works. What started in the 1980s as the interdisciplinary coupling of designers and programmers, has today transformed into a specialized group of programming designers. Through interactive algorithms, they create forms, quite literally, beyond one's imagination. They develop behavioral applications and applications that enable the user to become an essential part of the work through their presence or interaction. Over the last twenty years the young field of computational design presents a new and emerging landscape the boundaries of which are far from being pushed to their limit.

Touch:

For a longer while now, code no longer has to be bound by screens, keyboards, mice, or terminal windows. After three decades of the development of the personal computer, and two decades of the expansion of the internet, a desire for more direct, "graspable" and physical phenomena is emerging as a reaction to this. Artworks have

left the screen, to manifest the virtual sphere in palpable spatial experiences. Today, alongside screen-based works, media designers are increasingly creating objects that communicate, installations, and spaces that are brought to life with the help of electronics and mechanical systems as their ingredients. Similar to computational design, the tools for this physical computing are developed, these days, by designers for designers, and are hence more accessible to everyone.

Code and Touch

The users of today are mostly computer literate, and have an exact knowledge of the qualities of the new digital medium, such as interactivity, collaboration and networking. They would also like to experience these qualities outside the bounds of the screen; in the physical world. Works that combine the immaterial code and the material mechatronics create objects, installations, and spaces that invite the user to engage in a dialogue, explore them, and communicate complex meaning in an embodied fashion. They challenge the audience to actively reflect on their meaning, whether it be informative or poetic.

Physical computing and computational design are the new design disciplines of the beginning of the twenty-first century, with code and mechatronics as their material, substance, and inspiration. *A Touch of Code* provides a comprehensive overview of iconic works within these disciplines and shows their combinations. It is a gauge that shows the impact of the wave that the digital medium has generated.