

Tangible Bits: Beyond Graphical User Interface

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“Tangible Bits” is our vision of Human Computer Interaction (HCI). Tangible Bits allows users to “grasp and manipulate” bits in the center of users’ attention by coupling the bits with everyday physical objects and architectural surfaces. Tangible Bits also enables users to be aware of background bits at the periphery of human perception using ambient display media such as light, sound, airflow, and water movement in an augmented space.

The goal of Tangible Bits is to change “painted bits” of GUI (Graphical User Interface) into “tangible bits” to take advantage of the multiple senses and the multi-modality of human interactions with the physical world. Tangible Bits is intended to bridge the gaps between both cyberspace and the physical environment, as well as the foreground and background of human activities. In this talk, I will introduce a series of Tangible Bits designs including inTouch, metaDESK, ambientROOM, Illuminating Light, and Triangles.