

## **Title : The 1st Tangible Interaction Studio**

**Author : Nadine Couture**

**Teaser :** There are many applications of tangible interaction research: in music with the "reactable" used by the singer Björk, in cultural mediation to explain the stages of evolution in natural history such as cladistic, in archeology to reassemble archeological fragments, in manufacturing for assembling aircraft or car engine, and even more in energy to validate a geological model of subsoil, and many others.

**Details describing :** Tangible interaction is a research field addressing areas at the border of the physical and the digital world. It provides a new tool to facilitate the study of digital data. Indeed, it allows to interact with real objects and to manipulate easier 3D digital objects and to overcome the limitations of using our traditional mouse. For many years, researchers, designers, practitioners and artists around the world have worked on the theoretical and empirical foundations, technical frameworks, the realization of prototypes and the design of interfaces. However, there is a high potential for future work, and the European community could be more active on an international level. Researchers from ESTIA (France), the Bauhaus University (Germany) and the HES-SO (Switzerland) have organised the first Tangible Interaction Studio at ESTIA, in Bidart, heart of Basque Country, France from 26 to 30 of August 2013. The aim of this meeting was to gather young European researchers in the field of Tangible Interaction, to get them in touch with internationally renowned researchers and to establish networks for their academic future. We have to build the future of the discipline.

The TANGINT/FR group, supported by AFIHM (the Francophone Association in Human Computer Interaction) is behind the Tangible Interaction Studio. This French Speaking working group was created in 2011 on the initiative of Prof. Dr. Nadine Couture and Dr. Guillaume Rivière, from ESTIA. The remain of this studio follows a first Workshop held in June 2012, bringing together France and Germany. This year, on the occasion of this first Studio Swiss researcher, German, English, Italian, Austrian, Dutch, Chinese, Spanish and French will join the working group.

At the closing of the Tangible Interaction Studio, the Institute of Advanced Industrial Technologies ESTIA (France), the University of Applied Sciences of Western Switzerland – HES-SO (Switzerland), the Bauhaus-Universität Weimar (Germany), the Université de Toulouse (France), the Ludwig-Maximilians-Universität München (Germany), the University of Arts and Industrial Design Linz (Austria) sign a Joint Expression of Interest (on Friday, 30<sup>th</sup> august 2013). The purpose of this agreement is to facilitate student and staff exchanges and enriching cooperation by the organisation of summer-school and studios. Thereby, is devoting joint efforts for research on the European scale in the areas of research related to human-computer interaction, tangible interaction and smart environments. This convention is a first step towards the constitution of a network that could be apply to the creation of a European Network of Excellence (NoE) on Tangible Interaction. The program of the studio was led over a five days period by senior researchers internationally recognized and PhD students. On Day 1, we focus on laying grounds and theoretical foundation thanks to Eva Hornecker, Michel Beaudoin-Lafon and Emmanuel Dubois. During opening words by Nadine Couture and a video message

by Brygg Ullmer has been given. A “panel Session” moderated by Catherine Letondal closed the first day. On Day 2: we focus on applications and concepts thanks to Allan Dix and Martin Kaltenbrunner who gave a talk and a hand-on demonstration. The end of day 2 and the day 3 were devoted to student presentations by Young Researchers, Marie Schacht, Leonardo Angelini, Marvin Schneider, Nassrin Hajinejad, Renaud Gervais, Simon Stusak. On Days 4 et 5, 4 Workshops were led by Leonardo Angelini, Jochen „Jeff“ Rick, Arthur Vanpoucke and Marie Schacht. Exhibitions were submitted by Patrick Reuter, Simon Stusak, Stéphane Kreckelbergh and Guillaume Rivière. We decided of the continuation of the Tangible Interaction Studio in 2014 in Weimar and in 2015 in Fribourg.

As a conclusion we asked the participants to write down their “one word summary” and those words were cited: design, atmosphere, food, inspired, exchange, tangible, friend, motivation, thanks, fun, interaction, knowledge, *instructive*, *movement*, *creativity*, *arduino*, *interconnect*, *work*, *wonderful*, *perfect*, *rich*.

#### **Useful Link(s) (URLs separated from the references)**

[www.fgtis.estia.fr](http://www.fgtis.estia.fr)  
[www.tangint.org/fr](http://www.tangint.org/fr)  
<http://be-greifbar.de/>  
[www.estia.fr](http://www.estia.fr)

#### **Contact address with:**

- full name of the author : Nadine Couture
- phone number : +33 (0)5 5943 8467
- e-mail address : [n.couture@estia.fr](mailto:n.couture@estia.fr)