THE WILD, THE PUB, THE ATTIC AND THE WORKPLACE: A TOOL FOR NEGOTIATING A SHARED VISION ON CREATIVE LEARNING SPACES

Bruno SETOLA¹ and Bas LEURS²

¹Willem de Kooning Academy, Rotterdam University of Applied Sciences

²Creating 010, Rotterdam University of Applied Sciences

ABSTRACT

A learning space can be configured by either defining use through design or through use. When a creative learning space is *defined through use*, its configuration and use conditions need to be negotiated. In this paper we present a tool that helps *define the use* of a creative learning space *through use* in terms of coordinating the negotiation process. This tool is composed of four metaphors: The Wild, The Pub, The Attic and The Workplace. Each represents a stage of a learning journey. These metaphors help establish a common ground among a multi disciplinary group of students. Twenty-five art and design students used this tool during an eight-week elective course that investigated the configuration of creative learning spaces. From their experiences, students identified a number of principles and it helped them reflect on what constitutes an engaging learning space. Notably, the dynamics that come along with the *use* of the space *through use* are also reflected in the negotiation process. When the use of the space is changing, the rules of the game need to change as well. Moreover the dynamics of use stimulate participants to "define rules through use".

Keywords: Learning spaces, metaphors, shared vision, negotiation tool, user participation

1 INTRODUCTION

A growing body of research shows that the physical properties and configuration of learning spaces have a significant effect on the creative achievement and overall performance of design students [1, 2, 3]. Moreover, a learning space is a change agent, it influences its users and their activities, which in turn have agency as well [4]. In its use, a learning space is primarily configured by "defining use through use", rather than "defining use through design" (see [5]).

In our view the notion of *defining use through use* underscores the importance of a user centred bottom-up approach where ever-changing creative practices are the driver for ever-changing creative spaces; this is in contrast with traditional top-down decision making that aims to set fixed design standards. This means that the configuration and conditions of use constantly have to be negotiated with a variety of stakeholders (e.g. students, teaching staff, management, planning and support staff). These stakeholders however, may stem from different domains, speak different jargon, hold disparate representations of the world, or have different – and perhaps even conflicting – goals and interests. This leads to the question that is addressed in the current work: how to facilitate such negotiation process in terms of developing a shared vision on learning spaces in design education?

The occasion that opened up avenues to more explorative research came when the director of facility management asked us to develop a solution that stimulates students to clean up their classroom. When we inquired students why they littered the classroom, they frankly answered: "it's not our space". This led us to believe that the focus should not be on providing extrinsic motivation to clean up their litter, but rather on intrinsic motivation by developing a sense of ownership. This much larger scope would clearly benefit from research into what constitutes a learning space that is recognized by students as their own.

2 MODEL DESCRIPTION

What constitutes an ideal space for an engaging learning experience? Kolb observes: "learning is best facilitated in an environment where there is dialectic tension and conflict between immediate, concrete experience and analytic detachment." [6]. So we studied Kolb's four stage learning cycle to elaborate on his observation. While scrutinizing Kolb's learning cycle, it occurred to us that his abstract terminology would inhibit our efforts to share a more experiential view with other stakeholders. In our practice, as design educators, we use a lot of visual thinking and storytelling. It made sense to us to let go of Kolb's terminology: concrete experience, reflective observation, abstract conceptualism and active experimentation. Instead we reframed the learning cycle as a learning journey in which each stage is represented as a metaphor: "The Wild" (Concrete Experience), "The Pub" (Reflective Observation), "The Attic" (Abstract Conceptualism) and "The Workplace" (Active Experimentation). The metaphors represent a learning journey that can be described as follows:

In the real world we experience our environment first-hand in The Wild. What better place than The Pub to share our experiences and compare them? This is where stories are told and nobody judges us because all experiences are equally valuable as a starting point for reflection. Once we are in The Attic, we analyze what was shared and compared in The Pub. On a more abstract level we evaluate what is generally valid about what we have seen and heard. With these observations we develop mental models of the real world. After The Attic, it is time to go to work in The Workplace. This is the place where we prepare ourselves for our next trip into The Wild. In The Workplace we make plans and create prototypes. These plans and prototypes help us cope with the wilderness that the world holds, while they also allow us to initiate a change in it. And when we bring our new mental models and prototypes into The Wild, we are ready to observe once again the effect we have on reality. We record the new experience, so we can share it with our peers in The Pub.

Proceeding several times clock-wise through this learning journey (see

Figure 1) reveals an iterative upward learning spiral that also allows for crossovers in other directions. We can imagine how The Pub serves as a meeting point for peers that come from both The Wild and The Attic, to compare their experiences with their mental models. This crossover in particular has proven valuable to Kolb when he found that "bringing together the immediate experiences of the trainees and the conceptual models of the staff in an open atmosphere where inputs from each perspective could challenge and stimulate the other, a learning environment occurred with remarkable vitality and creativity" [6].



Figure 1. The model of the learning journey: The Wild, The Pub, The Attic and The Workplace

The metaphors we used are open to interpretation. It should be noted that this learning journey does not intend to be a representation of Kolb's model, despite its resemblance. The workplace metaphor for instance goes beyond application of abstract concepts to the real world and incorporates the production of prototypes, products, services and even designed experiences. This stage, which is common in iterative design processes, seems to be missing in Kolb's definition of *active experimentation*.

3 APPROACH

Equipped with these metaphors we could now convey our approach to both students and staff. Through the use of the aforementioned story and the idea of a creative adventure, we opened up a dialogue about what kind of learning space would best facilitate the activities in each stage.

An interdisciplinary group of twenty-five art and design students enrolled for the elective course for undergraduate students. The course ran from the beginning of September to the end of October 2013. At the beginning, the students were provided with a completely empty classroom (i.e. demo space) of forty square meters, a budget of 1,000 Euros, a tutor (i.e. the "tour guide") and the learning journey model. We confronted them with the following question: "What constitutes an ideal learning space and what are the necessary accompanying house rules? Note the only legal constraints are that the space should be safe and hygienic."

Facility management and their staff were banned from this demo space. As a consequence our safety or hygiene was to be assessed by ourselves and by consulting the fire brigade or hygiene inspectors. No preset rules were defined. Instead, we stimulated student to use common sense, and discuss what written and unwritten rules should apply in such a learning space.

The students' research, development and results were captured in their final presentations that include texts, images and video. The process of the course has been occasionally registered during class with video. The students' work and video footage was further analyzed to identify recurring themes and patterns.

4 RESULTS

4.1 Shared Vision

What resulted from the first discussion about the ideal learning space was a clear conflict of interests and goals. This conflict was amplified by miscommunication caused by incongruent jargon of different disciplines. After the initial controversy, we introduced the model of the learning journey to convey a general idea of what learning is about. Since metaphors are open to personal interpretation, all students easily recognized the four different stages. Regardless of their background or discipline, the model allowed them to describe and compare their individual and unique creative process and illuminate their experiences. The model turned into a tool that supported the development of a shared vision on the creative process, which in turn proved helpful in subdividing the idea of a learning space into more specialized types of learning space and their interrelatedness. We then formed groups, each one with a focus on one of the four metaphors.

4.2 Roadmap

In addition to using the learning journey as a mental map of the learning journey, we also used it as a roadmap for the design process, starting in The Wild. The students were asked to observe and register creative learning spaces "in the wild" (in and around the University campus). The twenty-five students were divided into groups of various sizes, which mean that some stages of the learning journey produced considerably more results than others. Each group selected a research method from the book "Universal Design Methods" [7]. This resulted in a wide array of types of registration, ranging from diaries, interviews, fly-on-the-wall observations, love letters and break up letters to photo studies and shadowing. Within popular types of learning spaces, like The Pub, different research activities yielded a rich diversity of aspects to consider. In addition, one workplace-group visited creative agencies to examine in what kind of spaces creative professionals usually work.

The next session was The Pub, where the students then shared their various observations of their chosen type of learning space. By sharing and comparing the results, we could now see similarities and differences between various types of learning spaces.

In The Attic phase, the students were asked to individually reflect on these results and find commonalities both within each type of learning space and across learning spaces. They were asked to present these findings to the group in a digital presentation format in the next session.

After that followed The Workplace stage in which students were asked to come up with plans or prototypes for their chosen part of the learning journey and showcase these in a final presentation. Since we only had forty square meters available, we unanimously agreed that The Pub team would turn our – still empty – space into an effective space for sharing and comparing. It also gave the students the opportunity to immediately test their ideas. The director of facilities management and two of her associates attended the final presentation as well.

4.3 Principles

The students have discovered some preliminary design principles for their selected types of learning space. They found that sharing in The Pub is ideal when sitting in a circular setup without tables. This setup maximizes a sense of equality and, as one student stated: "looking each other in the eye instead of watching fellow students' backs, makes one feel more pro-active while listening or discussing in class". Another principle they discovered is that objects that afford more than one type of usage, are preferable to single-use objects. Students also discovered the principle that it was healthier to sit in a chair that allowed for three different postures (normal, backwards and sideways) that keep the body in motion. Instead of an ergonomic chair that only allows for one passive posture.

Another outcome was what the students called the "Persistent Pen Principle". This started with the experiment of providing creative students with free materials to sketch, (e.g. paper and markers), which considerably increased the use of these. When they contemplated the possible stealing of these materials by students, they found that a constant resupply of these readily available materials resulted in a paradigm shift from owner to user, from "this pen is my property" to "I can use a pen whenever I feel the need to".



Figure 2. Beanbags discourage the use of laptops and online chatting

The most striking result was the "No Table No Laptop". Unintentionally, the use of a circular setup of lower seats and beanbags created a user experience that discouraged online chatting (see *Figure 2*) that was previously made comfortable by use of a tabletop to keep a laptop in place. In addition, the circular setup also created an intimate sense of connectedness that – according to students – outweighed the temptation of social media. Students unanimously voted this circular low seat presentation space favourable over existing classrooms because of this increase in mutual attention.

4.4 Prototypes

A concept called "Your Own Box" was custom made at a local wine case producer. The idea behind it was to give every new student his or her own box to customize freely and use for any purpose, for instance sitting, storing, or building walls when combined with other students' boxes. A campfire setting was created with three-terraced height levels made out of customized chairs with tree trunk designs and beanbags. In addition students purchased candles with the scent of burning wood to enhance the "campfire" sensation of the space. This way, a setup consisting of self-made artefacts, repurposed objects and existing products resulted in the design of an environment for a new learning experience.

5 REFLECTION

For the director and staff members of facility management using the model was a valuable experiment, since they are in a transition phase with a shift of perspective from basic maintenance of facilities towards a more user centred value creation within the context they operate in. Reflecting on the process of our learning spaces experiment we noticed that their focus shifted from "managing facilities" to "facilitating learning", which they embraced as the vision for their future way of working. Also the reflections of the students show how it changed their perspective on learning spaces and learning activities; as one of the students observed: "When I am in the canteen for example, I see how the configuration of space has an impact on how the space is being used. How it affects the dynamics. Now I see it everywhere." Apparently the model of the learning journey served as a new frame, stimulating students to take a new perspective on the situation: "We soon concluded that creating one ultimate space for all disciplines is impossible. I personally found this difficult, since I could not see how we could proceed beyond this point. How could our interdisciplinary team possibly collaborate on this? Fortunately Bruno provided us with a structure that completely changed our approach. The learning circle offered an entirely different perspective."

6 DISCUSSION

From our observations we can derive three key insights: (1) the reframed learning journey and its metaphors offer a tool to create a shared vision on learning spaces for various collaborating creative disciplines. Metaphors in particular serve as powerful frames that bridge communication and generate new understanding [8]. (2) The learning journey offers an effective roadmap for an iterative process that can be used for co-design of learning spaces. (3) An ongoing co-design process of learning spaces that defines use through use seems to imply a similar process of defining rules through use.

The process brought to light that this process enhances ownership of students. The students' final reflection documents show that they were surprised by the unexpected effect of space on their learning. Students stated that they would never be able to go back to being unaware of the impact of space on their activities. Also they described how the model of The Wild, The Pub, The Attic and The Workplace helps them to differentiate their various learning activities and the need to find the best suitable spaces for these activities.

It was the approach of *design through use* that offered unexpected additional benefits that we could not have imagined. This is most apparent in the current issue at the university that concerns the abundant use of social media in class. Had we followed a process of *design before use* it is unlikely we would have thought of the combination of using beanbags in a circular setup without tables to solve this.

This brings us to another interesting outcome. Coming up with "rules of the game" for new types of learning spaces benefits from first interacting with various demonstration space setups, before actually defining these rules. *Defining use through use* has the advantage of allowing for the emergence of behaviour principles. As opposed to a prescribed set of official rules that attempts to prevent every possible kind of abuse, the emergence of *rules through use* better suits an ever-changing learning environment. This minimizes restraints for learning and maximizing the possibility of rules becoming obsolete, since —as in the example of the beanbags — there is no need for rules to counter abuse in an environment that does not afford this abuse.

7 CONCLUSION

We started out with the question: how to facilitate a negotiation process in terms of developing a shared vision on learning spaces in design education? When considering the challenge to come up with the written and unwritten *rules of the game* for a new learning environment, we think that what we have learned is that it is not so much about coming up with a fixed set of rules that one can hang on the wall or publish online. We consider allowing users to *define use through use* assuming they will also *define rules through use*. Since we are developing ever-changing learning spaces with multi-affordance objects, the way students use these is constantly changing and therefore the rules keep changing as well. This means, as suggested in the introduction that conditions of use constantly have to be negotiated, for each group and situation. We suggest taking this into account in the next iteration and exploring if and how emerging rules, conventions, rituals and principles in this ongoing spacemaking process should be facilitated or stimulated. Some questions that for further research include:

how will other courses perform in this demo space that is continuously changing and where the house rules will be submitted to the ongoing negotiation between all parties that use the space? And how can teachers – as users – take part in this co-design process in such a way that they will not overrule or otherwise dominate the negotiation process?

REFERENCES

- [1] Cannon, D., & Utriainen, T. (2013). Spaces supporting creative design work. In proceedings of The 15th International Conference on Engineering and Product Design Education Conference, Dublin, Ireland.
- [2] Jankowska, M., & Atlay, M. (2008). Use of creative space in enhancing students' engagement. Innovations in Education & Teaching International, 45(3), 271–279.
- [3] Leurs, B., Schelling, J., & Mulder, I. (2013). Make Space, Make Place, Make Sense. In proceedings of The 15th International Conference on Engineering and Product Design Education Conference, Dublin, Ireland.
- [4] JISC (2006). Designing Spaces for Effective Learning, A guide to 21st century learning space design. Retrieved from: www.jisc.ac.uk/uploaded documents/JISClearningspaces.pdf
- [5] Redström, J. (2008). RE: Definitions of use. Design Studies, 29(4), 410–423.
- [6] Kolb, D. A. (1984). Experiential Learning, Experience as the source of learning and development. Prentice-Hall.
- [7] Martin, B. & Bruce Hanington (2012). Universal Methods of Design, 100 Ways to Research Complex Problems, Develop Innovative Ideas, and Design Effective Solutions. Rockport Publishers
- [8] Bethanis, S.J. (2006). Language as Action: Linking Metaphors with Organization Transformation. In S. Chawla & J. Renesch (Eds.), Learning organizations: Developing cultures for tomorrow's workplace (pp. 185-195). Boca Raton, FL: Productivity Press.