Architecture Education - initiating a Change! - SchulRaumKultur Symposium 2012
Pihla Meskanen, architect, director of Arkki

Since the built environment provides all of us with a framework for our actions, all citizens should have an active understanding of it. Every one will at some point have to take a stand on matters related to the built environment and thus have a say in the quality of our own lives and the lives of others. AE provides tools for responsible and active citizenship.

In this speech held at SchulRaumKultur symposium I presented a summary of governmental actions in Finland in order to promote AE for youth. I also introduced Arkki School of Architecture for Children and Youth, and several participatory planning cases from Arkki, where young people have participated in the planning of the real built environment in different scales; a school, an office building, a whole housing area and a virtual architecture map presenting viewpoints of reality and visions of the future..

"The built environment provides all of us with a framework for our actions and our personal fulfillment. It forms the bulk of our national wealth and belongs to all of us, both builders and users. All citizens should have an active understanding of the built environment, irrespective of age, occupation or educational background. Every one of us will at some point have to take a stand on matters related to the built environment and thus have a say in the quality of our own lives and the lives of others."

Minister of Culture, Suvi Lindén (in her foreword for “Discovering Architecture” report in Finland 2001)

Government actions in Finland related to architecture education:

– 1993 the national Board of Education published a national core curriculum for civic education in architecture.
– 1998 The Finnish Architectural policy was issued.
   It contains a part which stresses the importance of architecture education for children.
– 2001 the new Land Use and Building act was passed, stressing the importance of public participation.
– 2003 architecture was included in some subjects in the national core curriculum of secondary and upper secondary schools as a separate topic inside visual arts
– From 2004 to 2010 the Government had a job called “Childrens Architecture Education Consultant”

Architecture in the national core curriculum of secondary and upper secondary schools:

There are six cross-curricular themes that are supposed to integrate the teaching of all subjects in the lower and upper secondary school. In my opinion these give a great possibility in integrating architecture in teaching, and using it as an integrative subject combining:

- Cultural identity
- Participatory citizenship and entrepreneurship
- Responsibility for the environment, well-being and a sustainable future
- Safety and well-being
- Technology and Society
- Communication and media competence

The national core curriculum contains architecture and built environment education integrated in subjects such as:

- MATHEMATICS (geometry, 3D figures, mass, volume, scale…)
- ENVIRONMENTAL AND NATURAL STUDIES (immediate environment, map, home region, built environment …)
- BIOLOGY (diversity of human living environments, sustainability and the importance of environmental protection, sustainable development,)
- GEOGRAPHY (the built environment and traditional landscapes, analysis of Finland’s constructed environment, opportunities for influence in the planning and development of one’s environment…)

The Finnish national core curriculum for basic education to grades 1-9 consists of 65,2 % theoretical subjects and 24,8 % arts and skills subjects. Out of the 24,8 %, visual arts is altogether 3,7%, consisting of visual expression and thinking 0,9 %, artistic knowledge and cultural expertise 0,9 %, environmental aesthetics, architecture and design 0,9 % and media and visual communication 0,9 %.

The amount of 0,9 % of environmental aesthetics, architecture and design means 72 hours/ 9 years = 8 hours/ year = 1 hour / month.

And what should be learned in this time according to the curriculum is:

- introduction to and description of nature, buildings and building heritage, recognition of change in the environment
- examining, designing, and making objects, three dimensional constructions, making environmental plans and miniature models
- examining the interaction of nature and the built environment, studying the building heritage, and examining and evaluating various environments from the aesthetic, ethical, ecological, and planning perspectives
- introduction to the means of expression, stylistic features and traditions of architecture and design
- observation, planning, and constructing of space; introduction to the design process; examination of the connection between material and intended use
- introduction to the most important representatives
- of Finnish architecture and design

Teacher education:

Teacher education in Finnish universities contains obligatory studies of visual art 5 points out of 160 points, which is 3.1% of the total, and in addition it is possible to choose voluntary studies of visual arts a total of 9 points.

"Architectural (and also design education) has the most notable and independent role in the objectives and the core contents of ART EDUCATION in Finnish education system. The school subject is entitled "VISUAL ARTS" (see both curricula for basic education and upper secondary school). Also in instruction in other subjects such as history and geography architectural education is taken into account to variable extent. But, this said, each teacher's competence will naturally have effect how these contents of art education are being processed on the separate school level. “ -Mikko Hartikainen, Counselor of Education

Civic (basic) Education in Architecture since 1993

Basic education of architecture supports and extends the arts education and the environmental education at the elementary school. The basic education of architecture is offered as an after school activity in many art schools for children throughout Finland, and also two architecture schools, Arkki and Lastu.

In Finland children’s architecture education as part of the civic art education has already established its place. The Act on Basic Art Education was passed in 1992. Based on the act, the National Board of Education published the national core curriculum for teaching architecture as one of the art subjects 1993 along the other arts. The other arts are considered to be music, theater, dance, high arts, cinema, handicrafts, circus and audiovisual arts.

The basic education in architecture supports and extends the arts education and the environmental education at the elementary school. The basic education of architecture has also plenty of connections with technical, mathematical and social subjects. Architecture is defined as a qualitative concept related to the built environment, particularly concerning the planning and realization of the environment. Architecture has to do with the integrated unity of aesthetics, utility, functionality, technology and ecology.
Arkki School of Architecture for Children and Youth

Arkki is a unique school in Finland providing architecture education in the system of basic education of arts. It is run by a non profit organization founded in 1993. Arkki provides long term architecture education Helsinki, Espoo and Vantaa cities. In this area lives 20% of the Finnish population. Arkki provides weekly courses in architecture to 4-19 year old children and youth. Around 500 children attend the courses weekly. 4-6 year old join the courses with their parents, adding up to 130 adults / week. Arkki provides 3600 teaching hours /year and offers children and youth a possibility of altogether 16 years of architectural studies, and a total of 1800 hours of continuous teaching.

In addition to this continuous Basic education of architecture Arkki provides summer courses to 400 children and workshops to 2000 children / year. Arkki also collaborate with museums and schools, offering workshops and collaboration with exhibitions, architecture teaching material etc.

Aims of Architectural Education in Arkki

Architectural education aims to develop a child’s ability to perceive, consider, understand, conceptualize and evaluate his or her environment. Architecture education supports the development of individual cultural identity, which helps us belong to our local surroundings, to our country and to humankind. This sense of belonging is an important factor in cultivating the desire to participate and influence the shaping of our surroundings. Local identity is one step on the way to global awareness and sustainable development.

In Arkki, the children are initiated to the different aspects of the built environment, the natural environment and the relationship between the two. The basic elements of architecture; space, light and shadow, colors, shapes, materials and structures are studied as well as visual presentation techniques, design processes, and matters related to ecology, sustainability and construction.

Good architecture and a pleasant environment are a basic right of all human beings. Today’s children are the citizens and decision makers of the future. Architecture education helps us create a deeper understanding of our surroundings and a demand for a better environment in the future.

In Arkki we believe that architecture education gives children new possibilities, means and mediums to influence the creation of our future environment. Through different activities Arkki wishes to light a spark in young people’s minds so that they want to influence and participate in the development of the built environment in the future, whatever their occupation is.

Participatory Projects

During the last 19 years, Arkki has participated in numerous participatory projects involving children and youth. We have experienced participatory planning in urban design, house design, interior design, playground design, working with competition briefs, judging competitions, etc. Here are a few examples of recent projects.
Hernesaari Local Masterplan – Helsinki City Planning Office involving children (2006-2007)

This project was an invitation from the Helsinki City Planning Office for the pupils in Arkki to make a “competition entry” in an invited competition in the centre of Helsinki. In addition to the 3 chosen architect consultants, three groups of citizens were asked to enter their proposal to the given task. Two were groups of local residents and the third was a group of children, students from Arkki. It was not a competition in the traditional sense, since no one was selected a winner, but instead all the entries were displayed in public to evoke public discussion among citizens and to gather even more ideas for the development of the city plan of the area. In June 2007 all the six proposals (3 by architects, 3 by citizens groups) were all exhibited to the public in Helsinki. In several presentations also children explained their proposal and viewpoint, and all citizens present could ask questions and comment the different proposals. Also in the internet people could send their comments to the city planning department. This way of participation really evoked fruitful discussion among citizens.

This is the first time in Finland that any city planning office has asked children to participate in a competition or planning of a new housing area. It is a fascinating journey, though extremely challenging to support the participating children in their planning process and at the same time to contribute to the process as expert architects sharing our professional knowledge. It is extremely important to remain objective and not to influence the children in some prearranged direction.

The children’s participatory city planning project was a great success. It really succeeded in finding out the viewpoint of the young. It also showed, that children are interested about the questions concerning city planning, and perfectly capable of discussing the important issues and evaluating different solutions. This working method proved to be very successful, and many new projects in collaboration with Helsinki City Planning Office and Arkki pupils have been realized since then.

The project was realized with 5 facilitating architects and altogether 100 children and young people working in groups of 10 in spring 2007. Project coordinators were Niina Hummelin and Sini Meskanen. Altogether around 500 hours were spent in the planning process gaining understanding of the complex task of city planning piece by piece.

After this participatory process, Helsinki City Planning Office continued to develop the area plan according to the citizens and architects proposals and comments.

In November 2012 the Hernesaari area plan was finished, and Arkki children who participated in the project were given a presentation of the final plan at the Helsinki City Planning Office. In 2013 the building of the area will start.
Save the Children Foundation new Headquarters in Helsinki (2003-2005)

Architects: Architects Hannu Jaakkola, interior design: children of Arkki school together with architects

Save The Children is an organization that fights for the rights of children to make their life better all over the world. When Save The Children constructed their new headquarters in Käpylä, Helsinki, they wanted children to participate in the design process of the building, since it was to be a building for children.

Arkki was chosen as a partner for the project, since in Arkki there was pedagogical knowledge of participatory planning processes. Two groups, altogether 24 children and youth participated in the interior design project. In the beginning they were between ages 10-14. The project lasted actively 6 months, but the whole building process lasted two years.

During the two years of the project, the students participated in a wide range of activities including following the whole design process of a building, participating in interior design, visiting the construction site and all main events through the building process. The architecture & design workshop included a variety of drawing and painting tasks, games and excursions, each intended to further the design process towards the real project.

A group of Arkki’s young students had this exceptional chance to take part in this design project. Sea world and underwater life was chosen by the participants to be the leading theme in young artists design. In fall 2003 the design-group started to examine the underwater life and draw visions of sea world and its life and animals. The youth took part in three design projects; the art-mosaique of the main hall floor, the art-mosaiques of the common sanitary space walls and the art-printings on office walls - all of them under the sea world theme.

Along the way there were many memorable events connected to the emerging building. The young designers participated in laying the foundation stone together with Finnish President Tarja Halonen’s husband, the roofing celebration in 2004 and the grand opening party in 2005 accompanied by the president. At the end the young designers were very impressed of the artworks they made.

The project was led by architects Anna Bevz and Sini Karelia Meskanen, and c. 100 working hours was spent for the children’s participatory planning process.
C My City –Children’s Virtual Architecture Map (2011-2012)

www.cmycity.net

How do children and young people perceive our built environment? The virtual architectural map allows children and youngsters to tell us about it. This project was selected as an official program of World Design Capital Helsinki 2012.

C My City presents the child’s and young person’s view of buildings and other features of the built environment from their viewpoint.

C My City also showcases children’s ideas about the cityscape and buildings of the future.

C My City website contains photos, drawings, animations, videos and stories.

The project aims to encourage children and youth to explore the built environment, to investigate it and get acquainted with it, to observe and share their discoveries with others and comment other viewpoints on this website.

C My City is a project aimed at capturing youth perspectives to city surroundings and engaging young people in community development. C My City wishes to foster civic engagement among urban teens and help them voice their perspectives through the use of different means and methods such as photography, storytelling, animation, video and poetic expression.

Young people will learn about the different aspects that constitute the built environment by investigating, and combining visual techniques such as photographing and video, as well as verbal expression to form an artistic expression.

Locally relevant cityscape, the specific areas of the city that reflect youths’ daily lives and lived realities can provide young people with understanding of the greater phenomena.

This project involving children and youth was part of InnoArch and InnoSchool research project (2006-2009), a multidisciplinary research project. The goal of the research project was to develop a concept of the future school in Finland. It was coordinated by the Helsinki university of Technology (Aalto University). The goal of InnoSchool was to develop the Future School Concept: a set of research-based good practices, processes, models and designs, and recommendations for their successful combinations in the Future School. The research results are to act as a basis for the architecture competition and the design of an exemplary future school. The competition was held in 2012 and the school will be built in Espoo and called Opinmäki.

The Future School study with pupils aimed to answer following questions: In what ways can the collaborative planning and design process with children act as a tool for active citizenship and cultural learning? In what ways does children’s environmental local knowledge enrich urban planning? Architect student Sini Koivisto conducted this sub-study with Arkki pupils and published the results as her Master’s thesis in Architectural studies (2008).

In the sub-study “Future School” at Arkki, several planning and design workshops were organized for children to examine their visions for a better future school. Students in two age groups (7-11 and 12-18) were producing ideas in scale models, texts and drawings for the school building and the environment. The main idea of the workshops was to ask: What would children do, if they had a chance to design a school building?

The children’s projects lasted six months, and were designed so, that they moved from smaller details to bigger entities. During the whole project the pupils were building up their knowledge; knowledge from previous workshops were be utilized in the next ones.

Workshop themes with pupils were: analysis of different existing schools, personal spaces, learning spaces, personal learning spaces, combination of spaces, places for interaction in school, common spaces, public spaces, imaginary new subjects and learning places for new subjects, outdoor spaces, combination of spaces, connections, school as an entity and designing a school building.

Important things for children in the future school building were: natural light, open spaces, changeable spaces, indoors connecting to outdoor spaces, individual private spaces, smaller intimate spaces, spaces for interaction and meeting others, outdoor learning spaces and covered outdoor spaces. At the end of the project the pupils of Arkki came up with different forms, "typologies" of school buildings.

The whole project is available for download as a pdf at http://innoschool.tkk.fi/innoarch/dokumentit/tkk-future-school-web.pdf