Experiential Design – Rethinking relations between people, objects and environments

• Paper / Proposal Title:
Architecture and Disability: The Individual Experiences of People with Mobility, Visual and Hearing Impairments in Sport and Leisure Buildings

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• Abstract (300 words):
On the one hand, personal characteristics – physical and cognitive abilities – influence the way that people perceive and relate to the environment. On the other hand, environmental characteristics – physical and social settings – affect the way that individuals perform within a space. This complex individual-environment interplay determines not only the degree to which the built environment fits with personal needs, but also the degree to which the individual is able to perform and thrive within a space.

This paper presents a qualitative study of how architecture can enable and enhance the functioning, performance, and ultimately the well-being of people with mobility, visual or hearing impairments. The focus of the study is on how people with different visual, kinesthetic, tactile, and auditory abilities perceive and relate to architectural features – materiality, dimensions, proportions and organization – and,
accordingly, how this relationship affects the individual’s usability of spaces during physical and social activities.

The research approach, based on the phenomenological investigation of disabled people’s spatial experiences, examines both individual and environmental factors to understand disabling and enabling mechanisms that arise during contextualized activities. In-depth interviews, carried out in two Danish sport and leisure buildings, investigate the influence of the considered architectural features on the usability of spaces during activities – entering, orienting, moving and engaging – performed by disabled people.

The analysis of individual-environment interplays leads to the identification of the most influential architectural features on enabling/disabling mechanisms in relation to the different individual abilities. Moreover, the findings deepen the knowledge of individual-environment relationship articulated through examples of contextualized spatial experiences and the related individual assessment of usability. With the increased awareness of user-environment relationships, this study will offer new insights for architects, which enable design solutions to be more responsive to individual differences and thus more inclusive for all.

• Authors Biography (200 words each):

ROBERTA CASSI is a Ph.D. student at the Royal Danish Academy of Fine Arts, School of Architecture and Conservation (KADK). In 2011, she graduated in Architecture at Milano Politecnico University, Italy, with the thesis “Rethinking the urban area of Città Studi for a wider pool of users”, where she analyzed how the physical context of the university campus affects the livability of people with disabilities. In 2015, she completed a II level master degree in “Planning, programming and design for health buildings”, with her final thesis “The acoustic comfort in hospitals”, with which she investigated the importance of hospital’s soundscape design for a satisfying experience both for patients and operators. Her main interest is about the influence that architecture has on the quality of people’s experiences and lives.

MASASHI KAJITA, Ph.D., Architect MAA is Assistant Professor at the Institute of Architecture and Design, the Royal Danish Academy of Fine Arts, School of Architecture and Conservation (KADK). He is co-founder of Bureaus, a platform for spatial research, design and strategies. His research focuses on body, disability and, space in architecture. He was formerly a seniorlecturer in architecture at University of East London, researcher at Danish Building Research Institute, Aalborg University and Visiting Scholar at the Royal College of Art, UK. He has practiced architecture and interior design in London and Copenhagen, and has taught architecture since 2005.

OLGA POPOVC LARSEN, PhD, MSc Eng. Architect MAA, Professor at the Royal Danish Academy of Fine Arts Schools of Architecture Design and Conservation, KADK is a
research/education leader of the architectural technology group. She is engaged in education at all levels, teaching students at BA, Masters and PhD level. To date Olga has supervised 14 PhD students and examined over 30.

Olga’s research is cross-disciplinary and closely connected to practice, with projects exploring the crossover between aesthetics and structural/material efficiency. She has a strong interest in innovative use of both traditional and new materials; also, technologies, seeking ways of how the artistic and technological can inform each other to create new objects, products, structures and buildings. Olga works with the tactile qualities of materials and structures bridging aesthetic and performative aspects. Her work covers different research approaches including evidence-based methods, case-study investigations, physical testing and parametric tools. Olga’s research is deeply rooted in sustainable approaches as design for disassembly, transformability, adaptability and reuse.

Prof Larsen is a frequently invited speaker at scientific and design events in Denmark and abroad. She has led and participated many research projects and published more than 60 publications, including several books.