URBAN ASSEMBLAGE: THE CITY AS ARCHITECTURE, MEDIA, AI AND BIG DATA.

• Paper / Proposal Title:
Could Virtual tourism of Augmented Reality (AR) reduce greenhouse gases?

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• Abstract (300 words):
This paper investigates how stakeholders respond to digital feasibility study images to augmented reality (AR), with the purpose to determine if AR could be the right practical application to create Virtual tourism. Based on the visitors' perspective via qualitative interviews, the goal is to explore whether a digitalization in a realistic way, manages to mediate the concealed time layers and other intangible aspects of historic buildings, which is vital if ever to compete with a real visit. The concept of Virtual tourism (VT) intends to mitigate Overtourism and avoidable travelling, thus reduce today’s CO2 emissions of greenhouse gases. Furthermore, VT could signify the necessary paradigm shift for the tourism industry since its promoted work pipeline, the City Scan Procedure (CSP), intends to give local authorities better control of their tourist destinations’ unrestricted development. CSP thereby could increase the locals' share of profits as today the upkeep of historical sites depends on tourism. The pilot study at Fredriksdal Open Air Museum is the first in a series of upcoming cross-border studies to map the essence and potentials of Virtual Tourism (VT). This time, the museum’s relocated buildings Stadskvartret were transformed digitally as illustrations and videos through Pharo scanning into Point
cloud and Photo Scan processing via Mega shape to GIS, to assess the digital media’s storytelling capacity, their *Indiana Jones Effect* (IJE). Using a qualitative and exploratory approach this study conducted fourteen interviews with a diversified group of respondents of different ages. Interviews were evaluated using thematic and a quantitative analysis. The outcome indicates that the acceptance of Augmented Reality, or scanned reproductions in general, vary more depending on age group than media form. This study pin points that for Virtual tourism (VT) ever to affect CO2 emissions, augmented reality productions need to be more diversified to escape the computer game stamp.

• **Author(s) Biography (200 words each):**

**Dr. Ingela Pålsson Skarin** arch. MAA is a Senior Lecturer in Architecture and Building Conservation at Lund University-LTH, Institution of Architecture & Built Environment (architect students) and at Campus Helsingborg-LTH Helsingborg (building engineer students). Her licentiate study 2001 “*Building Preservation around the Baltic Sea, a study of the work process based on case studies from Lithuania, Poland, Germany, Denmark and Sweden*” widened the insight of international value perception. Pålsson Skarin’s doctorate thesis 2011 “*A finance model for the built cultural heritage- Proposals for improvements of future heritage economics*” gave foundation for the future research. She is a practicing architect (new construction and building conservation) in Sweden and Germany since 1988 and is partner in the Architect office Pålsson Arkitekter.