**INTRODUCTION –THE URBAN GRID IN CULTURES OF PLANNING AND ARCHITECTURE:
BETWEEN THE GLOBAL SOUTH, TO THE NORTH, AND BACK AGAIN**

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The issue before you is pioneering in nature, bringing together the concepts and histories of the grid in a variety of urban contexts, both architectural as well as the design and planning of the space. It is also unique in the combination of geographical and comparative viewpoints with regard to the urban grid, both from both the global north-west as well as the south-east. In this manner the series of case studies and also the comparative studies, alongside theoretical and empirical thoughts relating to the urban grid, seek to shed light on the complexity and dynamism that are inherent in what appears to us, at first glance, as a Western and rational phenomenon in an exclusive, simplistic, utilitarian, frozen and rigid manner.

In addition, by promoting a richer and more comprehensive understanding of the urban grid by analyzing the interwoven histories of the two global hemispheres – the issue brings to the foreground a variety of cross-section themes. These include the correlation between the form of the urban grid and the flow of human movement within the space, and considerations of its purposes; the adoption of this form within the framework of various ideologies and religions throughout history, including by completely opposite political regimes; the relevance of tracking the functional genealogy of the grid versus adopting a more Lefebvrian approach to creating the space and the right of the city; the manner in which the modern grid plan, as the embodiment of the new universal urban order, is challenged by means of the intractable and almost ‘chaotic’ daily customs under the colonial and post-colonial reality; as well as the discourse between the grid plans and modernist architecture or neo-liberal market forces.

The participating scholars specialize in a number of disciplines which – alongside architecture – include urban planning, cultural geography, anthropology, urban history and the history of art and architecture. All of them are intimately acquainted with the cities and sites studied, and with a rich variety of the languages relevant to their fields of research – from Europe to Africa, and from Asia to America. We believe that collating their contributions as part of the theme of the urban grid illuminates in a renewed and inspirational light one of the oldest, most frequent, continuous configurations of human settlement, which cannot be diminished.

A simple but very important question that involves the geometry of the grid and urban design was presented by the geographer Reuben Rose-Redwood – a question that is not even raised in contemporary literature in this field: what if we align the Manhattan grid, with its numbered streets, and the Cartesian coordinate system? According to Rose-Redwood, “The Manhattan grid is a physical representation, or a ‘material replication’, of the Cartesian

coordinate system" (Rose-Redwood, 2002, 8). While planning and architecture historians tended to ignore this parallel, some mathematicians have referred to it explicitly (Bell, 1986; Motz and Weaver, 1993). This kind of interdisciplinary inspiration influenced the concept of the urban grid and contributed to a critical understanding of the phenomenon. Another inspiration is embodied in comments made by art historian Rosalind Krauss, who, for example, pointed out the ambiguity of importing the grid into the almost ritual space of modern art: "The grid's mythic power is that it makes us able to think we are dealing with materialism (or sometimes science, or logic) while at the same time it provides us with a release into belief (or illusion, or fiction)" (Krauss, 1979, 54). According to Krauss, it is in the power of the grid-myth to homogenize, by its ability to bridge, to separate and emphasize the opposition between the individual and the totality, the chaotic and the ordered, the natural and the industrial. The grid is far from being a simple expression of social control in the Foucauldian sense. In its regulated form it may mislead us because we tend to attribute to it features of permanence. In effect, as the visual historian Hannah Higgins has observed, "Grids and the material they contain are in a constant state of variation" (Higgins, 2009, 9-10). This dynamic conclusion emerges from each and every article in the collection, whether in relation to the flexibility of the grid plotting in light of the conditions of the topography (Kostoff); directing the movement of the human body in accordance with vanishing points (Ytterberg); the inclusion of gridlines in which there are a variety of creative solutions for variable conditions and memories (Azerrad); for orientation from the inside out and from the outside in (Zhang); for a challenging breakthrough beyond the boundaries-framework necessitated by the socio-spatial development of a community (Pellow); to the hybridity of local and foreign grids into an inseparable weave (Bigon and Ross); and, by using the grid, pushing the poorest people towards the boundaries of the constantly expanding city (Viegas and Jorge)

This dynamic is also historiographical: by studying the historical roots of the New York City grid plan, Rose-Redwood has succeeded in breaking down accepted myths (Rose-Redwood, 2011). According to most research literature on the subject, the almost iconic 1811 Commissioner's Plan for Manhattan ultimately embodied the destructive victory of considerations of economic utility over the broader aesthetic or national considerations [Fig 1]. This conjecture was glorified and became a myth according to relevant literature, without the need to refer to the original documents of the period, which had long since been eliminated from it. Referring to these documents, Rose-Redwood disclosed an array of moral and even religious considerations on the part of New York's grid designers. In the global perspective of the current issue there

Figure 1
Bird's eye panorama of Manhattan and New York City in 1873. Behind the grid was a spectrum of considerations beyond mere utilitarianism (source: Wikimedia commons)

Figure 2
Panoramic view of the "White City" of Tel Aviv (source: Wikimedia commons). "In the metropolitan order that Tel Aviv gradually imposed on Jaffa, the traditional geometry of the city was completely sacrificed in favor of the orthogonal order of the Jewish grid and its metropolitan array [...] All the spatial logic according to which Jaffa is the center has been replaced by the Tel Avivian order, which in its escape from Jaffa was designed as an orthogonal system and it actually lacks a center" (Rotbard, 2005, 146)

Figure 3
The remains of the Tenochtitlan grid, the Aztec capital founded in 1325, on whose ruins the Spanish conquerors established the grid of Mexico City, the capital of Mexico (source: Wikimedia commons)

is both a geographical and a historiographical renewal, which is that by revealing another body of knowledge about the urban grid that has been excluded and buried under the many layers of knowledge that we have inadvertently acquired, as it has been produced in the West – information that has undergone systematicization and mythologization. It is increasingly recognized that the urban grid is not necessarily a Western invention originating in the ancient times of Greece and Rome; and that it was not developed or implemented exclusively in the northern hemisphere, or only in Western contexts overseas [Fig 2]; just as it is not necessarily a 'modern' phenomenon. This recognition, as stated, is inconsistent with the 'traditional' historiography of the urban grid.

Against this background, one might raise an eyebrow, given that in the hiatus of more than 60 years between the chronological review of Stanislawski’s urban plan (Stanislawski, 1946) and that of Higgins (Higgins, 2009), only lip service was paid to two civilizations outside of the West before formalist debate was passed directly into the lap of Western culture. The two examples – the city of pyramids from the Middle Kingdom of Kahun, 2670 BCE; and the city of Mohenjo-daro in the Hindus valley in what is today Pakistan, dating back to 2154 BCE – became 'mythological' in the relevant literature. A review dealing with the connections between the sociopolitical regime and the shape of the grid in a global context only continued this line of thinking, by failing to mention Africa to the south of the Sahara, except for the well-known example of the Yoruba cities (Grant, 2001). This, of course, does not infer that at present or at any time in history the cities of Africa have necessarily embodied the material realization of the principles of Cartesian geometry; or that cities established on the grid were never created by indigenous traditions in Africa or the global south – studies reveal the opposite (for example: Ross, 2006; Low, 2000) [Fig 3]. But it is possible to infer an Eurocentric tradition of creating urban knowledge in a more or less conscious manner – a tradition whose contribution to this issue is, among other things, fading.

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