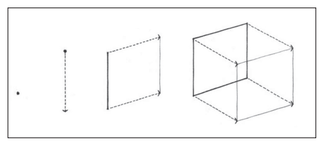
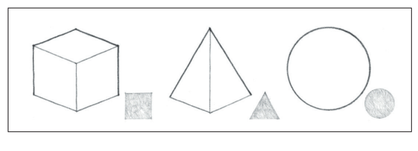
COMPOSITION and URBAN SPACE

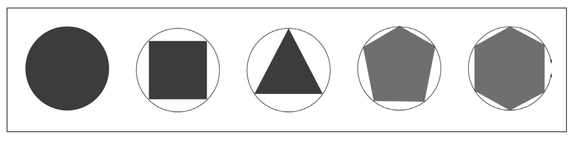
DESIGN ELEMENTS



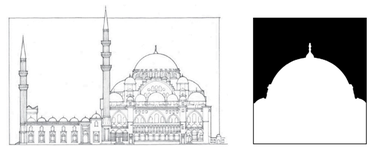
Primary Elements Derivation:
Point - Line - Plane - Volume



Basic Geometrical Forms:
Cube - Pyramid - Sphere



Basic Geometrical Shapes in a Circle:
Circle - Square - Triangle - Pentagon - Hexagon....



"Perception"
Form vs. Shape

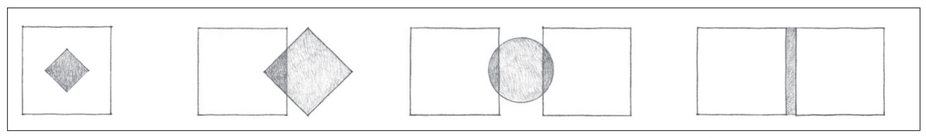
PRIMARY ELEMENTS, FORM and SHAPE

The basic elements of the design are respectively derived from each other; point, line, plane and volume. These elements can not be perceived unless they find a physical correspondence in space, only their projections occur in the mind. There is no physical criterion such as height, length, width in the definition of the point, it only determines a position in space.

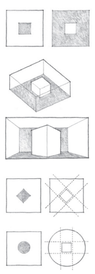
Form and shape are two intertwined terms. The shape is the plane defined by the contours of a form and visualized in the mind. Our rate of perception of the shape changes according to the relationship of the form with the area it is in and the nature of the contour that separates the form from the surface on which it stands.

COMPOSITION of ELEMENTS

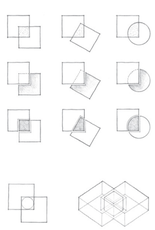
SPATIAL RELATIONSHIPS



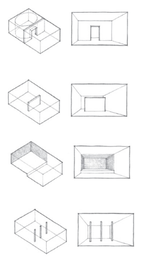
Space within a Space



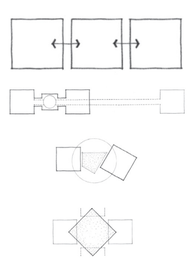
Interlocking Spaces



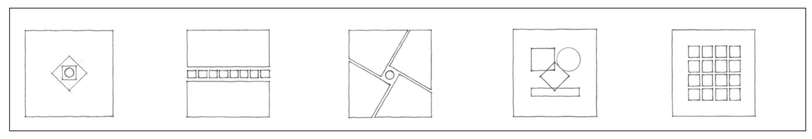
Adjacent Spaces



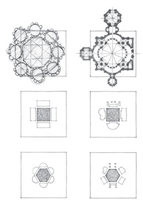
Spaces Linked by a Common Space



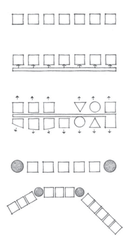
SPATIAL ORGANIZATIONS



Centralized Organization

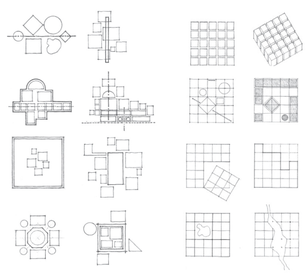


Linear Organization



Radial Organization

Radial Organization



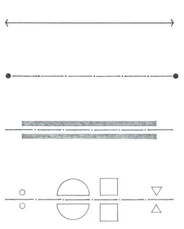
Grid Organization

RELATIONSHIP and ORGANIZATION

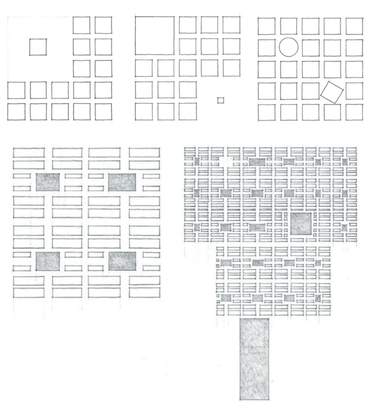
Space within a space: The larger, enveloping space serves as a three-dimensional field for the smaller space contained within it.
Interlocking spaces: Result in the emergence of a new space in the middle, as the two spaces are partially intertwined.
Adjacent spaces: Which is the most common type of spatial relationship, allows each space to be clearly defined and to respond, each in its own way, to specific functional or symbolic requirements.
Spaces linked by a common space: Occurs when spaces that are at a distance from each other establish a connection through a third space.

Centralized Organization: A central, dominant space about which a number of secondary spaces are grouped.
Linear Organization: A linear sequence of repetitive spaces.
Radial Organization: A central space from which linear organizations of space extend in a radial manner.
Clustered Organization: Spaces grouped by proximity or the sharing of a common visual trait or relationship.
Grid Organization: Spaces organized within the field of a structural grid or other three-dimensional framework.

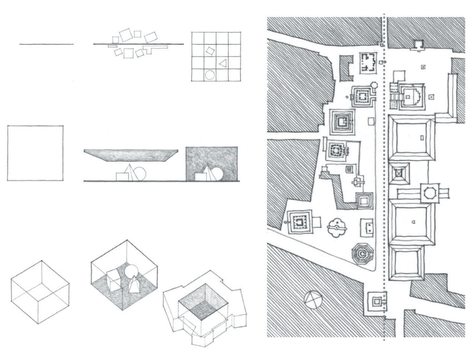
AXIS



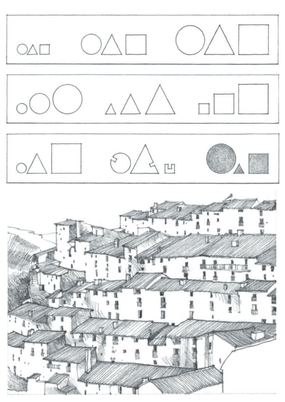
HIERARCHY



DATUM



RHYTHM and REPETITION



ORDER

Axis: A line established by two points in space, about which forms and spaces can be arranged in a symmetrical or balanced manner.

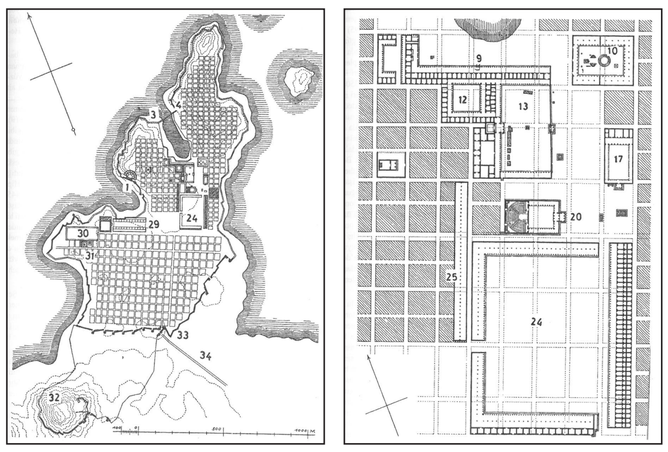
Hierarchy: The articulation of the importance or significance of a form or space by its size, shape, or placement relative to the other forms and spaces of the organization.

Datum: A line, plane, or volume that, by its continuity and regularity, serves to gather, measure, and organize a pattern of forms and spaces.

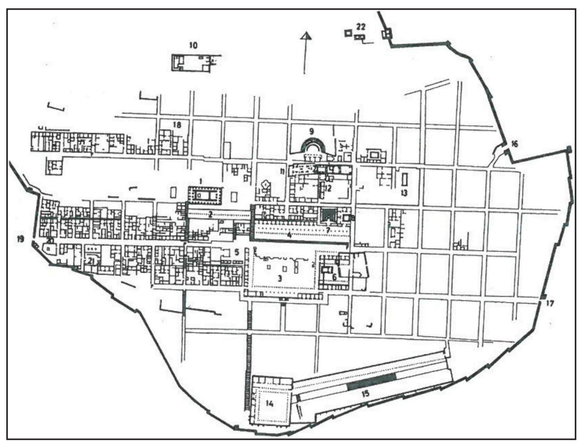
To explain **Repetition**, defining the **Rhythm**: A unifying movement characterized by a patterned repetition or alternation of formal elements or motifs in the same or a modified form.

URBAN SPACE and DESIGN

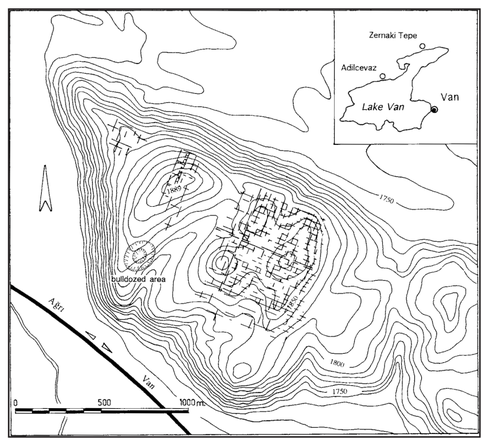
Miletos



Piriene



Zernaki Tepe



ORIGINS of URBAN DESIGN

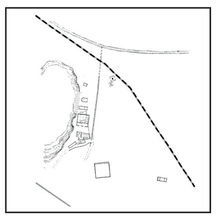
Hippodamos (498-408 BC) is known as the first city planner in history, with the application of the grid plan system in the city of Miletus, where he was from. The implementation of the grid system was carried out as a result of the destruction of the city by Persian attacks in 479 BC.

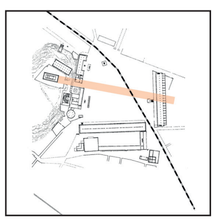
Another ancient city in the same geography where the grid plan system is seen is Priene, which was rebuilt in the 350 BC. Although Priene is not attributed to Hippodamos but it is thought that the plan of the city were influenced by Miletus.

Although the title of the "first city planner" was given to Hippodamos with the grid plan system he applied, it is seen that this system was applied in settlements older than his time. Zernaki Tepe is one of the examples.

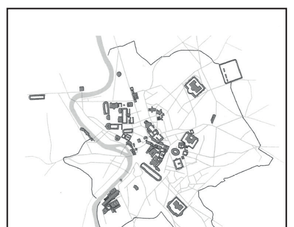
Zernaki Tepe, which was attributed to the Urartians until a certain date, is thought to belong to the pre-Urartian period as a result of later archaeological finds.Based on the existence of the Urartians in 1000 BC, it can be said that the grid plan system applied at Zernaki Tepe was long before Hippodamus. It is possible that the grid plan system was applied in different places at different times. However, until the finds were fully elucidated and the plan system there was attributed to a single person, Hippodamus took his place in the literature as the first city planner in history.

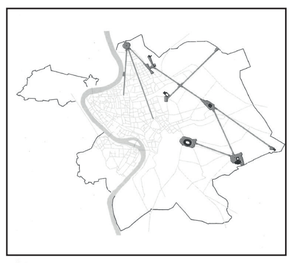
Athens Agora

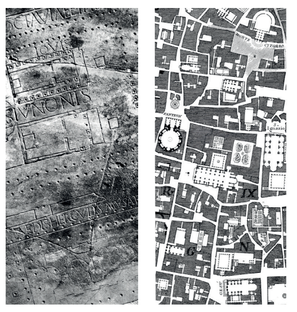




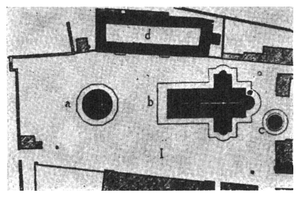
Design Order of Ancient Rome

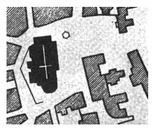


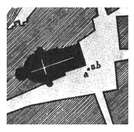


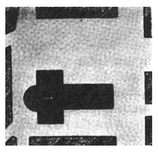


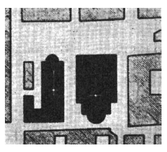
Old Squares

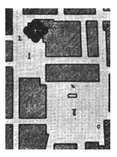


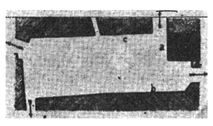


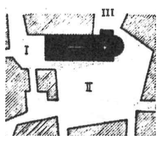


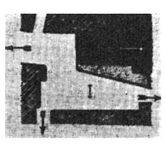




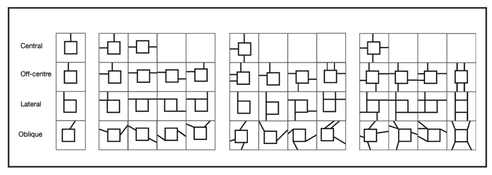








Formulations for Streets, Squares and Urban Spaces



Composition at Block and Building Scale

COMPOSING in URBAN SPACE

The development of Athens was shaped along the Panathenaic Way. The Panathenaic Way was designed more as a road connecting regionally sacred places than an ordinary city street. It was the central backbone from which commercial, industrial and political activities formed the basis of the life of the city. The location and size of the Parthenon can only be understood in relation to the entire Panathenaic sequence.

While the Greeks were constructing the flow of life as an organic unity and building their cities in the same direction; The Romans divided their cities according to their functions and divided their cities into separate units and established them in a rationality. Just as the Roman Empire was administratively divided into cities and provinces, the urban design structure of classical Rome was not based on a unity, but a city was formed by the accumulation of individually designed buildings.

Camillo Sitte, in his book The Art of Building Cities which is published in 1945, examined the relations of squares with buildings, monuments and other squares in their immediate surroundings. Also he examined open centers enclosed character and form and expanse of the public squares through European cities.

Krier, in his book Urban Space which published in 1991, talkes about typical functions of urban spaces and he argues that "the activities of a town take place in public and private spheres. The behavioural patterns of people are similar in both. So, the result is that the way in which public space has been organised has in all periods exercised a powerful influence on the design of private houses." (Krier 1991, 17)

Ron Kasprisin, in his book Composition of Complexity, exemplifies the principles of composition over city blocks and buildings.

Kasprisin, defines design elements as "the nouns" which are which are basically dot, line and shape; design principles as "the verbs" which are alternation, angle of view, axial movement, balance/symmetry, bridging, datum, dominance, gradation, harmony, merging, transformation, repetition, rhythm etc.