

B. ARCHITECTURE
URBAN DESIGN (AR6711)
INTRODUCTION OF INTERIOR DESIGN
Lecture – 6

Introduction to urban Form:

What cities are and how the urban form fixed into the whole thing.

Then we will understand the terms.

urban form.

urban morphology.

historic urban form.

Then we will look at the

organic and planned cities

And we will look at key approaches, How to analysis Urban Form.

- (a) Determinations of Urban Form.
- (b) Growth of Cities – Urban Form.

Whether it is the determinants of form or whether we look at you growth the cities, as it is an idea. how do these cities form verb has urban form got to do with this and then we will look at open form through time and evolution of form actually so we will first look in western examples and in that we looked at two parts, the first part, we look at ancient city is moving on to the pre-modern period then we will look at the modern period till the contemporary of present world we are in and whatever she's really look like the next part we understand Indian cities but in Indian cities the division is done more on pre Independence and post-independence and how the cities actually evolved then we will summarize and talk about some salient points at the end of the each session then some outcomes what were

the basic learning outcomes of the sessions. Then some questions to take away with us that will help us to think and understand what the urban form is. That particular image summarizes all the idea that we will look at whether it is form of morphology shape of cities is also particular image that you are looking at currently. The next set of course is he start with an introduction and in an introductions what I want to talk about it what is a city that is not an easy question to answer if someone asks us to what is a city what I will looking or what I would argue really is that city are some of the greatest achievement of humanity. A city is an artefact it is man-made and this artefacts has a cultural and historical significance city is probably one of the greatest achievements humanity has ever made and cities and the built environment are actually a reflection of who we are all peoples aspirations, who will live, dwell and settle and talk about the city actually. Here I'm looking at a particular Court Where am going to read out and talk about this particular Court

"The form of the cities has always been and always will be pitiless as indicator of the state of Civilization."

"The form is determined by the multiplicity of decisions made by the people who live in it."

"In certain circumstances these decisions have interacted to produce forces search clarity and from that the Nobel city has we call it, has been born."

This quote by Le Corbusier in the designer of cities probably sums up what form is all about for us, when he says that is an indicator of the state of affairs. let's look at this that indicate where civilization is today, whether you want to talk about slums you want to talk about hierarchy or you want to talk about public spaces. The urban form of the physical form around us is really what indicate, where we are is a Civilization, and then we will look at the definition of the Urban form since the whole session talk about her urban form. What is the urban form? How to readable urban form, let's first understand what the definition is. Now the definition of urban form is that, it is about the physical characteristics of a city within a large or Framework which would be to environmental, socio-cultural, political and religious contexts. Now just simply means that when you look at the physical on

the built environment you are trying to understand that built whether the buildings with other elements made up in a context, which is very important event in architecture. We never talk about buildings out of context. Context is very important in this case, the context don't talking about we will not always be the physical environment around but also the social cultural or maybe the political views.

Then urban form cannot readable to isolations world to remember whenever you look at urban form is scale. The scale at which you want to read form. Now there are three scale, at which urban form can be right.

Now I can look at a very broad regional scales, which defines

The spatial configuration of the fixed elements. In this case what I mean as you are trying and looking at the larger region this is Paris the city of Paris and you are looking at a very large regional scale. Whereas understanding districts what suburbs what districts are the next scale is not local we getting closer and closer to architecture. Now we are saying more local city level where I'm talking about people how we live water urban blocks are, what edges are, what boundaries are finally and extreme localizedscale almost like detailing where I look at first odds and then I will look at fenestrations I will look at paving.

Urban Morphology and Historic Urban form:

Now the next set it lets continue some more now that is established that it is all about the belt in a setting for a context with environmental or social political. Let understand what is a urban form.

The urban form has the physical and non-physical components, together what they give you in these parameters, now the urban form has shape, it has size, it has density, and it also has been land-uses, urban block and distribution of green space.

They probably some of the most important element you should know that will together in compatible for urban form and then there all the non-physical entities, why are non-physical entities important at all because it has non-physical entities. Whether let's talk about the social economic conditions, let's talk about the political process that shape out and these manifest in the physical form, how you been Hospital,

why we building housing in certain areas by there and networks transportation that are designed in our cities. All that manifest station that probably political decision somebody took over probably an economic decision somebody took.

Now what is an example in New York where you are trying and understanding the physical and non-physical entities also that is a large area where you look at the shape, size, density, land-uses, urban block, and distribution of green space? Everything can join and I'm very large regional scale like I said before. Scale is so important to us to understand, what is a urban form.

Next word that you want to look at is a urban morphology. Now why do we have urban form in the world and urban morphology as a world and even though in urban design a lot of times we use them synonymously there are some minor differences that you have to know about the two separate entities do a lot of tough times in the session and this lecture series I will probably talk about a urban form, urban morphology is almost interchangeable there are differences that you need to understand, so let's understand the terms now urban morphology is primarily concerned with the structure of urban form and the processes that transform and Shape it actively or possibly overtime. so what do you mean by these, now when you understand the structure of urban form which is the physical structural now understand like in architecture. I'm not talking of a building or the space in front of the building I am talking of building spaces between them and the structure put out for us that's what I am really looking at and then there are lots of processes. What are these processes, how and why to transform urban form. Now let talk about process and let's try and understand a Simple process May be a political process. Now just political process is something like saying we are now going to try and introduce a new transit of transport Network and the City. what could that Be There new Metro something the city doesn't have to know that is partly political decision or partly economic decisions, partly social idea. That is to help people in the cities community better and these are processes.

Now the manifestation of this process is what would be the physical entity of a transit line that will connect district in the City and district

being in the city, it should be a simple example then there is also an alternate definition to this.

The whole purpose of whether you learn form or morphology or historical urban form Indian urban designers are in this discipline you are looking to design. So with that in mind let understand an alternative definition.

Now we can say that it is an approach to studying in designing urban form. Now how and why do you design of urban form? We will consider whether it's the physical and the spatial components and we will not do only one and we will do both together.

Now what is a physical component like we discussed before it is everything that is built. So I am looking at block, plot, streets, buildings, open Spaces but then when I talk of the spatial concept is a space between all of this, as I said before the process the pictures and I am saying you are looking at history evolutionary process of development of that particular City under consideration at any given time. So summing up quickly urban morphology is all about the structure of urban form and the process that shape it so you're trying and understanding transformation basically means the minute is the urban morphology and then largely urban morphology deals with two worlds, we should remember because in my session as I continue talking about that I will use word like fabric and tissue.

Urban morphology deals with the fabric of bit now what is a fabric deals with built it open Spaces and the City. What is tissue is your ideal environmental factors the word itself for the term it says reminds you and understand the bill to open and all the functions and activities at a part of it. Now this particular image that you are looking at his understanding urban fabric but with the process of economy pitch didn't do it and understanding how and why the grain changes scenes across the city.

The second set of course is a three-dimensional evaluation of form in the city and it is trying to see how the form comes about all evolves overtime. As a process the next word that you are going to look at a historical urban form which is of course the new subject on the title of the sessions having understood what is an urban form having

understood urban morphology under process. Let's not try pitching and understand what history has to do in the urban form for making. now the definition of that would be

"It constitutes a spatial expression and the testimony of all the social geography and political parameters that contribute towards establishment and development over time."

Not really understand a look at this you have to know that between the three words, we talk you will see a lot of overlapped. The overlapped primarily because they are largely dealing with form and how the form evolved in the city without it is a historical urban form. I am using history as the lens to read it when I say morphology, I am looking at overall transformation. When I am saying just form I am looking at a physical built of the city but remember each and every one of these is always shaped by processes social, economy, and cultural.

So coming back to historical urban form.

Summary and Salient point:

Let's continue this and I am going to say that its focus on the tangible as the world says

Tangible is that which you can look at understand a very physical entities that is the built environment. So its geometrical features and the organization, intangible. You know that which you don't really see but you sense for experience, so what is that that would be the social content, the cultural characteristics. Now the question is why are tangible and intangible apart of historical urban form are because it is the tangible and intangible that help us given overall image of a city what is this image is the identity when you talk about Paris. You would probably try and remember Boulogne and champs Ely sees, maybe you will remember the famous iron les miserable Museum. Similarly you would also remember the large the faints, which is the nearly district that has come about know what are you really remembering there you are understanding remembering the memory the world memory is what I would use an image that image is a larger identity of a city. Similarly I said New York remembering something else in this

case what an example I am using his historic form because we're talking about historical urban forms.

So I am looking and understand evolution of mediaeval city where you foresee a small scale City surrounded by probably I ball and the City growth, finally it is the fortified City now this is Historical urban form by using the evolution of form. Then the next idea is a study of the form, if you want to study historical urban form.

What does it involve, it involve two basic parts do it now

The first part is understanding of the city of settlements overall history and evolution now over all history and evolution would largely mean you are looking at what I called determinants of urban form what is a determinant when I say natural man made local it is basically something that influence the urban form.

The second part is a process is just like we've discussed for some time now it would be social economic and cultural influence maybe even political influence.

Now the next in identifying geometry structure relationship between all these elements lastly it is about the experiential quality of space what is experiential how you perceive space how you perceive a city now that is a large part of this so quickly summing up I am saying that if you want to study Historical urban form, it involved now overall history of the settlement then it involves understanding the geometry of the settlement and in geometry you are looking at design but Architects always do we understand design growth what is a part of the city is there larger diagram, it was created with or probably ideas of an image and identity or character. The character the word you will always see when we talk about urban form what is the character of the city. What is the character of Paris? What is the character of New York and what is the character of Lisbon and what is the character of the city always the character is not something as simple as a whole series of building, it is a complex thing, it involve the people their activities the built as a backdrop probably along with processes that shaped it, continuing on we want to talk about the largest summary of the three worlds I discussed with you, which world urban form, urban

morphology and the History of urban form now but take away that we should remember having discuss the three words and the definition is

"Whenever you study the civilization, Settlement or City what you should know about this urban form study is, it involves two things.

1. What is urban form in itself which is a shape and structure of the form? then the processes better shaped it that in the first part and second part is what is an urban process that is the focus image for the first part where I'm talking about the idea maybe this is Vienna in Austria and I am saying that you are looking at probably the form which is the shape and structured the evident to seen the image you looking at.

Organic & Planned Form:

Now this second is the process now the first part is how people have acted on the city or on the form overtime and changed it. Now the example I have is from Rome, and always to remember the Rome famous for the theater and for the Circus for probably the four, public space it had.

Now there is images of it now at first glance you will probably not be able to save the same thing but this is what we're studying understanding how the form shape and structures has evolved as a process with people intervention over time.

Now that is a connector with two parts that I was looking at that is a second part of this connector. This is one more examples this one is Bagdad and you are looking at understanding how the simple form has changed with people and processes.

Now we will look at another idea which is what are organic and planned form in cities are.

As the name itself tells you know and organic form

"Is something that evolved without pre-consumed of planned intervention?"

Now that simply means that you are trying and understanding a city form that involve through time with various people processes of working on the form, its socio-economic, cultural, political know

account of the opposite to this would be Planned one which is the result of a predetermined intentional.

Now that would be maybe a Suburban extension renewal to the city now the second part there is let's quick at example to understand what I mean by the two words now that is a the first one of course is the organic pattern the second one is the planned City trying and looking at.

An example of this would be the new planned for Barcelona by corda. Where you see that is an old code which is evolved world over time and that is what happens in make extension or planned extension, which is a combination of geometry here it is great and radial pattern that is combined to give you two different form of cities. That is object to pose for are standing with each other here, are together here rather.

Determinants of Urban form:

Now we will come to very quickly understanding what the determinants of an urban form. Now what are the determinants is a simply that these are more like a key to understanding how to analyses form. Now we are looking at the key approaches, to analyses the determinants of urban form. Now what are the determinants is a question. Now the first determinants it's probably natural then we are going to look at Man-made determinants for finally local determinants. Now natural determinants in themselves can be we split into three basic parts now which are Topography, Climate and Material & Technology. Now Man-Made determinants on the other hand on many varied and complex because the human interaction happens in cities changes and alters them in a variety of ways.

What are they?

Those listed your economic, political, religious, whether its land division, defence(might and power), grid-iron, aesthetic, legislation, mobility and infrastructure but its social religious or ethnic grouping.

Now we will quickly looked at various examples the images that are with example will help you understand what I mean by the world it is very graphical, to focus on the images here. The first one is a river and

settlement and the second one is a natural Harbor the example I have there is a Naples in Italy 2001 and the third one is a defensive site where the site itself contributes to creating a fortified City the next of the set is variable linear ridge. Then the next one is a hilltop Town from an example in Italy that I put up for you last see looking at sloped Terrain.

Now the second determination is climate now what about climate becomes a question now climate as we all know vary according to the geography it also varies according to the position of water bodies and then the character build as an architecture for Vernacular architecture the way we could understand it simply is used in vernacular architecture and see how climate is a determinant in the way Vernacular architecture evolved overtime. Now whenever a series of these dwelling coming together for agglomeration of these dwellings is what gives you the urban form.

Now the image have for you Courtyard house and this is an example of a city called IsFarah-In-Iran. Which is the one of the best climatic responses, because it has a covered Street Network and public spaces, which are all the roof spaces in the city. The Last of the natural determinants is materials and Technology. The Materials and Technology as we know has taken a dramatic turn post industrialization largely in historical urban form, you are looking how local materials, local Technology influences urban form making.

Now the example I have re-construction of the ancient city of food in Mesopotamia the next of course this city has been, which the post industrialization you are looking at Dubai and the fast place in which the form of the city is getting built.

The next is Man-Made determinants, we will look at each with probably an image to go with it as an example now the first one of course is economy and trade example I have is Istanbul which is on trade routes, Ancients trade routes and the second one is when of course you're looking at political the world's host civilizations in Paris.

The Paris were was redesigned with man-made or conscious political intentions the next of them is religious which were looking at Santiago is an example where I am looking for church being the centre of how

the city is organized around it then we looking at Defence as important criteria the image there looks at a series of Defence mechanism around cities and how they evolved what for technics and what for evolved through history.

Next of the determinants is land division now while land division because we're trying in understanding what I'm how I agriculture which is of course primarily important factor that created civilizations has the shape the way we doing land divisions and then we are looking at patterns that are impost whether it is great but it is radial how the patterns give rise to the form of cities. Then you looking at aesthetic consideration. The view or a beauty or an image, that we carry with the wise certain cities are considered to be more visually appealing than others. In this case example I am looking at the San Francisco and then you are looking at might, power aggrandizement. What is might and power you know when some important structures public buildings, religious buildings are highlighted Vs others that what you're looking at.

And then you are looking at the last set of which is a urban Infrastructures the word itself says you're looking at transport systems, networks maybe it could even be pipe services and then you are looking at the next one which is legislation which is how long controls a urban form make another process this example comes from Portland and then the social economic grouping or ethnic grouping. This examples from Sao Paulo in Brazil, Is it almost should Avoca memory of the have it's and have not in the City and how found. Let the first discussion we had an introduction reflects the status where we are as the city of Civilization today.

Then the next one of courses mobility the example of there is a boon of concept of a street been shared by the vehicles and people and then the local determinants know the example appear is simply looking at the Marketplace. How the marketplace evolves with the local constraints, for the immediate context around it.

Next of course is a very design oriented analysis, the previous one was more influenced this is more design related very we looking at form and a relationship of individual forms to each other. Now the first of

the slot is looking at accretion (spaces as connector) commonly seen in Greek form.

Next one is at axes as connector as the diagram explain where you are looking at Roman urban form. The third one is mass as connector this is the late Roman urban form. Next of courses interlocking of spaces this is mediaeval form then you see the lines of tension, bitetics the connecting line between various important monuments, this is baroque form first.

Finally you looking at extension which is and access which helps the growth of the city. The city of Paris is a very good example for this. Now I will not dwell in detail on these but rather as we go through the analysis of historic forms in the next session. We will see and application of all these ideas whether it was the determinants, whether you looking at designers growth and we'll see all this in the next sessions.