## HISTORY OF ARCHITECTURE &CULTURE -II

## Lecture 7

## Hoysala Architecture

Let's start with Hoysala architecture this particular style of architecture came into existence during the Hoysala Empire basically started in the state of Karnataka it reached its peak in around 13th century, it is a very unique style of architecture which was not very similar to the South Indian temple architecture.

Let us see what are the various features of the Hoysala architecture? Just have a look at the floor plans of these two temples that you see on your screen. These two Temples are the Temples at halebidu and Belur. There is one thing that is very strikingly different from what we saw in the southern India temple architecture. It is very obvious from the floor plan, is nothing but the star shaped planning of these temples. As you saw in the previous image, the various temples in Southern India but those were all either square or rectangular in nature but this particular style of Hoysala architecture they have this unique star shaped planning system. This was very unique in terms of exterior appearance you can see in this image. It is very intricately carved; this was mainly due to the fact that the material that was available in this particular Deccan region is called as soap stone. It was suitable for intricate carvings and as compared to the temples in Tamilnadu these temples where very unique in nature both in terms of exterior appearances. They had a very unified appearances. This is one of the Temple tanks; here you see the image of the star shape platform. These temples were usually raised on a platform, this platform is called as Jagati, it served as the circulatory passage around which people worshiped the Temple, inside the Garbagraha there wasn't any particular circulatory path so it was along this platform the people had to move about. As you

can see in the image the platform is around 5 to 6 feet high. This image on your screen is the temple at halebidu, the plan is again a star shaped planning and internally it is connected via these two arms, in front of the Main Garbagraha you have these assembly halls, through this we approach the main shrine, you have another hall here and the main shrine is inside. In this particular temple, the soaps stone that they used was grey colour, you can see the nature of the appearance in the image and also the base of the platform is very finely carved usually they carved images of elephants or horses or other celestial images. So these works was done on all these base.

This is the temple at Belur, in halebidu we saw two similar shrines located next to each other, but in Belur as you can see this plan the main shrine that was actually built on an open Courtyard. Later on, in this courtyard these other shrines started to be built. Even smaller shrines replicate the planning of the main shrine, this is the main shrine part and around this you have the similar pattern off stetted as the circumambulatory path. Again similar to the temple at halebidu, this Temple also has very intricate carvings in the base portion, this platform not only gives a very Majestic look to the temple with the raised level, also it gives Canvas for very interesting art works and sculptures, you can see the kind of carvings done even the brackets are very finely carved the celling and various sculptures been depicted on all the surfaces.

## **Temple Architecture – Northern India**

Next will be seeing about Northern India, what is the major difference in any architectural style the Geography plays a very important role. Geography decides the kind of material that is available and also the knowledge of the skilled crafts

men. In terms of its surrounding places the kind of influences on that particular styles various from region to region, obviously you have a very unique style within India. If you see in Northern India, this Temple architecture is called the Indo Aryan style or the Nagara style. Basically Aryans, they are people from Central Asia who migrated into India and in this image you can see the yellow portions are the regions in India and in which the Aryan domination was predominant, so various regions like Orissa, Khajuraho, Rajasthan, Gujarat, Maharashtra, Gwalior these are the regions in which the Nagara style of architecture was predominant.

Architecturally if you take the salient features of Nagara style temple, basically the temple was divided into two parts the Garbagraha and the Jagamohan. The Jagamohan is nothing but an assembly hall that was kept in front of the Garbagraha and they were aligned along a straight axis symmetrical in nature. You can see the kind of projections and recession along the surface of the temple, all these projections and recession were placed for very intricate carvings and freeze works within the recess surfaces, later on apart from these two components they added two more components called as the Natya Mandir or the bhogmandapa. Natya Mandir was dancing hall and bhogmandapa was a place where people made offerings like food etc. In terms of elevation if you see the various parts of the temple, you can see this is the Jagamohan and this is the main Garbagraha, the base portion is called the Pista that is nothing but the plinth of the building, then the cubicle portion is called the bada and the step pyramid portion of the Jagamohan is called the pida. If you see the Garbagraha portion again the base is called pista, then the bada but here above it instead of stepped pyramid structure you have a very parabolic kind of a structure that is called chhapra and on top of the Chhapra is a circular disc kind of a structure called the amla, on top of it you have the finial structure which is called the kalasa. These are the different parts of a typical Indo

Aryan temple in Orissa, in terms of both plan and elevation. In these various parts of the temple, there is the theory that this can be compared to the different parts of a human body from the kalasa as the head to the pista as the foot, so this is one theory that exist. These are different images of temples in Orissa you can see how both the jagamohan and Garbagraha has very distinct variations in terms of the treatment how they are both treated very differently and uniquely. This is the Mukteswara temple in Orissa; this is a very famous temple and one of the largest temples in Orissa called the Lingaraja Temple

If you see the plan of the temple as I mentioned earlier in older temples there were only these two parts jagamohan and Garbagraha, later on they are added this Natya Mandir and the bhogmandir (the dancing hall and the hall of offerings). You can see within the plan, inside the hall there are just these four pillars of pious, in all these halls you can see a similar patterns, these four pillars are the main load bearing structure that carry the weight of the pyramid roof structures. Even you can see the kind of thick walls that surround the halls and you have openings on sides, entrances. Sri Mandir is nothing but the Garbagraha portion, in this image you can have a better idea of how these projections and recessions are treated, you can see the Amla circular disc is all fluted and even from the bottom to the top you have the fluted horizontal flutes that run all the way up till the kalasa. Hence these types of temples mostly the exterior is very intricately carved than the interior is left plain, this is one feature that is very common in most of the north Indian temples. Here you can see all the five halls.

This is the Sun temple in Konark this is another interesting type of planning you can see that you have the Garbagraha, the Jagamohan and this dancing hall Natya Mandir is separated from the Jagamohan. Earlier we saw that how in Lingaraja Temple all the structure were connected but here you have detached Natya Mandir

and this temple is very famous for the kind of decoration that is done on the base. This was built based on the base being a Chariot being pulled by horses, as you can see in the image you have 12 such giant wheels on the base of the platform. Each wheel measures around 3 meters in height, so as you can see a detailed version of the plan. This entire base is the Chariot base, you have the Jagamohan here and the Dance Pavilion here. Another interesting feature is that this temple was built of laterite stone and they were built based only on Gravity and balance and there was no mortar used in construction of this structure. Again as similar to other temples, this temple also has very rich carvings you can see the scale of the base in this image as compared to human scale you can see how tall the base, part of the portions has been left incomplete now of the Natya Mandir.

This is another temple in Gujarat called the Somanath Temple this temple was destroyed many times by Islamic rulers and then again it was being reconstructed this is just one example of a chalukyan style of architecture this has a very unique style when compared to the other temples that we saw again based on the region.

We will just see small examples this is another sun temple in Modhera Gujarat dedicated to the Sun god. This has another unique features hear you have 3 different parts of the temple this is called the surya kund or temple tank then you have a Sabha Mandap that is assembly hall and then the guda mandap that is the main Garbagraha portion. The most interesting feature of this Temple is the surya kund as you can see in this image, it is almost 53.6 metres by 36.6 metres and it is one of the finest examples of geometry, you can see in this image how these steps are beautifully arranged, all these steps are arranged in a very pyramid kind of pattern. There are landings at four levels and from each landing you have pyramidal shape steps so over all if you look at this composition it's a very perfect example of geometry and organization. This is another view, these are the various

terraces that are formed in between, this is the sabha mandap after the surya kund this is a place where this is again a kind of an assembly hall where people use to gather. You can see a very typical of these bans of sculptures from the base till the end. This is the main Garbagraha, this particular Temple is designed such that the rays of the sun on the summer solstice that is on 21<sup>st</sup> June fall directly on the idol of the sun within the temple.

Another example of temple architecture in Northern India famous one is the khajuraho group of temples in Madhya Pradesh so these are actually a group of temples you can see in this image only few of them remaining now. It is divided into 3 zones western, eastern and the southern group of temples. The most important temples were gathered around the western part of the site. Khajuraho group of temples are very famous for the sculpture work all over the world, it was accidentally discovered by a western explorer, then they announced all these beautiful monuments, one of the main reasons why it is famous for sculptures that is entirely made of sand stones and it was very intricately carved.

Again similar to the Sun temple here also the builders did not use mortar the stones were put together with the mortise and tenon joint. You can see the picture this is mortise and tenon joints. It is nothing but you have a groove which is called the mortise and the stoner shape such that it fits exactly into that groove. This is the technique that they have used in this construction, there's no mortor used in this temple. You can see the various sculptures that are been depicted on various surfaces you have these intermediate bands and again you have sculptures that continue all the way till the end.

Finally we will see one more Temple this is near Mount Abu in Rajasthan these are a group of Jain temples. If you see the plan again in contrast to the temples in Orissa these are very rectangular in nature. These were built during a very later

stage these are a group of 5 temples and they called Vimal vasahi, Luna vasahi, Pithalhar, Khartar vasahi and Mahavir swami, of these only the first three temples are very important and the first two were built entirely of white marble. One of the unique features of this temple is that you have the Garbagraha and then you have this circulatory passage all around it. This circumambulatory passage forms the one of the unique features of this particular Temple, you can see the image in the bottom so this is how the circumambulatory passage is very intricately carved the ceilings, the brackets, the columns so this temple is made entirely of white marble, can see the amount of work done on the interior, this was one of the main temple in the site.

This is the Luna vasahi Temple this is the second most important temples again similarly you have the shrine and the circumambulatory passage. Here you have a group of elephants, sculpture along the path. One important feature is that these columns and they form a kind of celling called Novchowki. Novchowki is nothing but they form a grid kind of pattern in the ceiling, based on 9 grids, in each grid if you see the ceiling they have very interesting pattern. You can see in this image this particular ceiling has a different pattern as compared to the one before. Other two temples are very small nature, again you have a square or rectangular base and then you have a circle, so different kind of celling pattern get repeated.