Review of the last session
-the architectural development of France during the 17th century
1. the influence of the Italian church architecture of the Counter- 
   Reformation.
2. two incidents that made the French aware of their high cultural 
   status:
   the design of the Versailles
   the episode around the design of the East facade of the Louvres.

Claude Perrault, an amateur architect.
-architect of the East facade of the Louvre
-his scheme was considered by his contemporaries superior to 
   Bernini’s schemes.
-Perrault wrote a book on the proportion of orders
-He discovered inconsistencies in the proportions of orders 
   proposed by many authoritative authors.
-With this survey, he concluded that dealing with proportion as 
   something absolute and unchangeable was a blind and excessive 
   veneration.
-Proportion, if it is beautiful at all, it is so because we have been 
   educated to see it beautiful. Its beauty is arbitrary, customary and 
   relative.
17 century in England
1. Inigo Jones (1573-1652) – influence from Andrea Palladio (1508-1580)

Giacomo Leoni: First English translation of Palladio’s Four Books of Architecture (1715)
Issac Ware: another translation more faithful to the original (1738)

2. Christopher Wren (1632-1723) – influence of the Italian Baroque starts to be felt

(18 century in England – the baroque influence, Nicholas Hawksmoor (1661-1735))

Rococo Architecture
17 century in England
1. Inigo Jones (1573-1652) – influence from Andrea Palladio (1508-1580)

-the architectural development in England took a little bit different course from that of France
-It was still influenced by Italian architecture.
-But, what influenced the English architecture was not the Baroque architecture, but Palladio’s more classical architecture and writing.

-This course of development came with a historical incident.
Palladio’s fame for his classical architecture led the English to admire his works such as the La Rotonda
-Palladio’s book *Four Books of Architecture* published in 1570 was also highly respected
-His book was continuously republished in 1581, 1601 . . .
17 century in England
1. Inigo Jones (1573-1652) – influence from Andrea Palladio (1508-1580)

- During his visit to Italy in 1614, inigo Jones acquired a number of original drawings by Palladio (from Palladio’s pupil Scamozzi).
- He also acquired a copy of Palladio’s *Four Books of Architecture*.
- He studied this book carefully and added his own annotations.
- Palladio’s original drawings and the copy of his treatise that was retained and studied by Jones at Worcester College, Oxford University.
- Inigo Jones studied diligently Palladio’s treatise and drawings
- He left a strong imprint on the development of English architecture.
17 century in England
1. Inigo Jones (1573-1652) – influence from Andrea Palladio (1508-1580)

-The copy Inigo Jones read was written in Italian.
-The first English translation of Palladio’s *Four Books of Architecture* was made by Giacomo Leoni in 1715.
-However, Leoni had a personal preference of architecture, which was Baroque.
-Accordingly, Leoni’s translation was not faithful to the original, which was very classical.
-Leoni added a lot of Baroque embellishments to the illustrations and misinterpreted or distorted Palladio’s classical design intent with Baroque spirit.
-Because of this problem, there emerged a need to conduct another translation.
-The man to accomplish this task was Issac Ware. This edition came out in 1738.
17 century in England

1. Inigo Jones (1573-1652) – influence from Andrea Palladio (1508-1580)

- Inigo Jones was one of the very first Englishmen to make a detailed study of the buildings of ancient Rome.
- He introduced the Classical canons of Italian Renaissance architecture to England.
- Palladio’s *Four Books of Architecture* and Palladio’s drawings were a constant source of ideas for Jones.
- His buildings were formative for the Palladian revival in the 17th century England.
Queen’s House, exterior elevation (1616-1635)  Greenwich, England

Inigo Jones
- This is the first English villa in the Italian style (1st Palladian Ideal)
- Following Palladio’s (mistaken) understanding of the villa during the Greek and Roman periods, Jones creates a villa with a Roman motif in the middle
- The upper story of the middle section is a temple front without a pediment
- The division of the façade into three sections with the center projected is also a typical feature of Palladio’s villas
Queen’s House
plan (1616-1635)

Inigo Jones

Greenwich, England
-There is a public road between the two blocks of the villa.
-Jones placed 2 blocks on either side of the road and joined them at the second story by means of a bridge.
-The elevations facing the road are flat.
-In contrast, the elevations on the opposite sides are Palladian.
- In particular, Palladio’s Palazzo Chiericati
- The facades are tripartite with a central projecting portion
Palazzo Chiericati, exterior (1550)

Andrea Palladio  Vicenza, Italy
Andrea Palladio
Villa Cornaro, Piombino Dese, near Treviso, 1551-3
Woodcut from *I quattro libri dell’architettura* (Venice 1570)
Whitehall Palace

detail drawings

(1616-1635)

London, England
Banqueting House, exterior view (1619-1622)
Inigo Jones

Whitehall Palace
London, England
- The facade is divided into seven bays (an odder number for centrality)
- The central three bays are articulated by half-embedded columns.
- The remaining bays are articulated by pilasters
Jones original scheme had a pedimented portico, a feature often found in Palladio’s architecture.

However, there was no need to provide an entrance in the façade.

For this reason, Jones abandoned an early pedimented scheme (Inigo Jones’ masterpiece)

The interior of the building is two stories high

The upper storey has galleries on its peripheries.

The galleries are supported by Ionic orders.

The roof is supported by a system of truss.

Its gabled profile is masked by a series of continuous balustrade.
St. Paul’s, Covent Garden, exterior view (begun 1630)

Inigo Jones

London, England
-Designed as part of the first geometrically planned urban development of 17th century England.
-The church stands at the West end of the piazza.
-One unique feature of this church is its portico with Tuscan order.
-Its Tuscan portico performs a purely civic role in the piazza, b/c the entrance to the church is at the other end.
St. Paul’s, Covent Garden, plan, general view and elevation (begun 1630)

Inigo Jones

London, England
One unique feature of this church is its portico with Tuscan order. Its Tuscan portico performs a purely civic role in the piazza, b/c the entrance to the church is at the other end. Jones’ use of the Tuscan order is an intriguing matter. Indeed, Palladio once recommended the use of the Tuscan order, but not in church architecture, but in villa architecture. Then, why did Jone use the rustic Tuscan?
Architectural Orders (Roman Doric and Tuscan Orders)
Il Redentore, exterior (façade 1576)

Andrea Palladio

-As you can see, Palladio’s churches never use Tuscan orders.
- Palladio’s churches: a series of temple front motifs and the Pantheon-like dome
St. Paul’s, Covent Garden, exterior view (begun 1630)
Inigo Jones
London, England
-Jones here shows a treatment which is never found in Palladio’s church architecture.
-Though influenced by Palladio, when it came to church architecture, Palladio’s Catholic churches were not his models
-Jones was more sympathetic to the austerity of the Protestant cause.
-He was proud to call the church “the handsomest barn in England”
-In other words, designing a church suitable for Protestant services in the new Classical manner, Jones makes plain the fundamental character of the new religion
-This approach also suited his patron’s desire for economy
-Many English architects followed Inigo Jones’ lead with Palladian architecture
-John Webb
King Charles Block, exterior view (begun 1665)

Greenwich Palace
London, England
Villa Barbaro-Volpi, exterior (1556)
Andrea Palladio  Maser, Italy
-The source of inspiration for the composition of the facade was Palladio’s façade for Villa Barbaro.
-Both facades are divided into five parts.
-An emphasis is given to the central, pedimented bay.
-This bay breaks forwards.
-The ending bays are also emphasized.
-Webb’s facade is a variation of Palladio’s treatment of facade.
-As we have seen, Palladio’s architecture was greatly influential in the early development of classical architecture in England.
- The Baroque architecture of Italy came late.
- An architect named Christopher Wren (1632-1723) started to introduce the vocabularies of the Baroque Italian architecture to England.
The Sheldonian Theatre, exterior view (1664-1669)
Sir Christopher Wren
Oxford, England
- Wren was a contemporary of Descartes and a colleague of Sir Isaac Newton in the Royal Society.
- Wren spent his youth studying physics and mathematics & became Professor of Astronomy at Oxford.
- He came late to architecture, but his scientific background had trained him to solve technical problems such as the stability of buildings and the construction of domes.
- In a lecture in 1657 as a professor of Astronomy, he quoted Vitruvius in order to verify his claim that mathematics, geometry and astronomy were the foundations of all disciplines.
- This was the moment the seed of architecture was sewn in his mind.
The Sheldonian Theatre, exterior view (1664-1669)
Sir Christopher Wren
Oxford, England
The Sheldonian Theatre, exterior view (1664-1669)

Sir Christopher Wren

Oxford, England
- Geometry of a 16-sided polygon
- Wren also put his scientific background into resolving technical problems of architecture.
- By means of a triangular system of grids, Wren succeeded in roofing a large interior without using piers.
-Wren’s masterpiece

St. Paul’s Cathedral
Wren’s Ideal Plan
(1675-1710)

Sir Christopher Wren

London, England
- London had a great fire in 1666.
- The original St. Paul’s Cathedral was damaged severely.
- It became clear by 1668 that the proper solution for the damaged Cathedral was not a partial rebuilding, but a complete reconstruction.
- Wren was chosen as architect to design this church, one of the most important churches in England.
- Wren’s plan is of Latin cross with a dome to emphasize the symbolic center at the same time.

- At the crossing, 8 giant piers carry a majestic dome.
-Influence of Baroque architecture

*Sant’ Andrea al Quirinale*, plan and facade (1678)

Gianlorenzo Bernini  
Rome, Italy
-Before one reaches the crossing, the main center, one passes through a series of, what one may call, Baroque spaces.

-While allowing procession towards the center, the nave presents a series of moments of pause.

-The nave is composed of a series of nodes and each node is given centrality of a lesser degree.

-At each node, the space expands horizontally, or perpendicular to the main axis.

-This insertion of pause in the middle of procession is a feature of Baroque theatricality.
St. Paul’s Cathedral
partial plan and section
(1675-1710)

Sir Christopher Wren

London, England
Treatment of the drum
- 32 buttresses surround the drum, finishing in engaged columns to create the effect of a peristyle
- Every fourth intercolumniation is filled in by a wall decorated w/a niche
- This was for structural reason, as well as for decorative reason
- The columns reinforce the stability of the dome
On the interior, the base of the drum rest on 8 arches standing on 8 corner columns. The octagon has alternating wide and narrow bays.
Design of the Dome itself
- The dome has 3 shells: the inner brick dome is a near hemisphere.
- It has an open oculus looking through to the tall brick cone.
- This brick cone supports the lantern.
- The outer hemisphere is a light timber framework covered w/ lead.
St. Paul’s Cathedral (1675-1710)
Sir Christopher Wren
London, England
In the Western facade, the dome appears as flanked by two Baroque towers. In the middle of the towers is a pedimented portico. This treatment of the facade and the dome was an influence from Italian Baroque architecture, particularly by Borromini’s San’t Agnese.
Sant’Agnese, facade (begun 1652)
Francesco Borromini
Rome, Italy
During the early eighteenth century in England, there appeared a couple of intriguing churches which integrated gothic architecture and classical architecture.
Christ Church, Spitalfields
(1714-1729)

Nicholas Hawksmoor

London, England
- The most impressive part of the church is the West steeple.
- A tetra-style portico has an arched barrel-vaulted central bay.
- This motif is taken up again in abstracted form in the next story.
- The central arch is reduced and repeated a number of times to the top of the spire.
- This church is gothic and classical.
St. Martin-in-the-Fields
(1721-1726)

James Gibbs

London, England
-The main facade presents a combination between a pedimented portico of classical architecture or of the Renaissance and a steeple behind.
-This church combines the classical dignity with the gothic romantic and symbolic aspiration to reach towards the upper world.
The Rococo (18th Century)
The Rococo (18th Century)
France (and other countries)

- It is generally accepted that the most characteristic ornamental features of Rococo were created in France
- Louis XV (1715-74): upper class freedom/ pursuit of pleasure.
- New spaces of sumptuous social life.
- Mme de Pompadour, mistress of Louis XV, was the patron of Germain Boffrand, the leading architect of the Rococo.
- Mme de Pompadour also introduced the Rococo interior to Versailles.
- Germain Boffrand’s Oval Salon in Hotel de Soubise is the major example
- Rocaille
  - Rocaille, the main ornamental motif of the Rococo, is a mixture of spiky shells, barks, and corals w/free vegetable arabesques, often asymmetrical
  - Chicory leaves, twisted branches, palm fronds, and flexible stems replace the acanthus, foliage and garlands of classicism and Baroque.
  - The Baroque architecture appears dramatic and exaggerated before the Renaissance.
  - However, the Baroque, when it stands before the Rococo, it appears rather restrained.
- Dramatically twisted natural forms replace clam geometrical shapes of classical architecture
- In the Rococo was an excessive emphasis on naturalism, organicism and primitivism.
- “Ornamental panels take on a life of their own, freed from their architectural framework; the eye is hypnotized (bamboozled) in an integrated pattern of curves and counter-curves”
- In France, Rococo was generally limited to interiors in its early stage. Then, it expanded to wide range of objects from silverwork to fountain, candle sticks, and furniture.
The Oval Salon
Hotel de Soubise
(1737-1740)

Germain Boffrand
Paris, France
Germain Boffrand’s Oval Salon in Hotel de Soubise is the major example of Rococo architecture. It is an oval salon. Its oval shape already speaks of its tendency to break a rigid rectangle in search of a more flexible, dramatic and even voluptuous space. What was combined with this unusual plan was an excessive amount of the rocaille motif. The rocaille motif starts from the apex of the ceiling, flows down towards the edge of the ceiling and flows further down towards the wall. It also combines itself with the curvilinear frames of the murals in the spandrels. The rocaille motif further joins itself with the frame of the mirrors and windows. The frames of the mirrors and windows themselves are based upon the rocaille motif. Its eight spandrels were decorated with mythological and pastoral scenes in a rich gold rocaille frames.
Hall of Mirrors
Amalienburg Pavilion
(1734-1739)

Francois Cuvillies

near Munich, Germany
Rocaille façade
(mid 18th century)

Nantes, France
Place Stanislas, railings and fountain (mid 18th c.)

Nancy, France
Sacristy of the Carthusians
(1727-1764)

Luis de Arevalo

Grenada, Spain
Church of San Francisco
interior
Oporto, Spain
Palace of the Marques de Dos Aguas
(1740-1744)

Hipolito Rovira Bocandel

Valencia, Spain
Casa Batllo
(1905-1907)

Antoni Gaudi

Barcelona, Spain
The Oval Salon

Hotel de Soubise

(1737-1740)

Germain Boffrand

Paris, France
-With this slide, I’d like to think about an interesting theme based on which the Rococo architecture evolved. 
-The theme is continuity. 
-The Rococo played with architectural frames. 
-It played with boundaries. 
-Floral motifs continuously move beyond frames and extend across the surface. 
-With this incessantly flowing rocaile motif, the divisions between the ceiling and the wall and between the wall and the floor seems to be blurred and challenged. 
-The Rococo was certainly interested in continuity.
-In contemporary architecture, this interest in continuity often appears as an architectural task.
-A floor turns into a wall smoothly.
-Then, the wall wraps around the space to appear as a ceiling.
-And, then it turns upward to operate as a floor for the storey above.
-The whole architecture appears like a kind of mobius strip.
What kind of continuity is this?
What kind of continuity is this?
-Continuity is understood at the level of the visual appearance.
-In other words, it is the *image* of continuity, not the real continuity.
-Put differently, it appears, or it looks continuous.
-Somehow, I’d like to make a bold claim that this way of embodying continuity is, however complex the adopted motif looks, an easy one to make.
-Problem of this conception of continuity
-It does not acknowledge discontinuity as the condition for the emergence of continuity.
-Not a visual continuity
-Imaginative continuity that emerges from discontinuous moments between things, elements and entities.