# Renaissance Architecture

History of Architecture

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- The Renaissance movement was a grand scale movement in art, literature sculpture and architecture.
- The time in which it spread between 15<sup>th</sup> century and 17<sup>th</sup> century, was a time of movement in philosophy, science and other ideas.
- At this time Europe was made of many small states united or trying to get united under larger kingdoms.
- The Italian cities were independent, each with its special culture.
- The Holy Roman Empire was quite weak, and the so were the Popes.
- Local cultures were rising, so were local national states.
- Europe lost Constantinople in 1453 A. D. but got all of Spain back.

- Scientific achievements were getting more realistic, getting away from the mystical and superstitious ideas of the medieval ages.
- The Christian reformation led by Martin Luther in 1517 A.D. added more division to the already divided Europe.
- Galileo (1564 1642 A. D.) proved the earth was not the center of the universe, but a small dot in a grand solar system.
- Three inventions had a great influence, gunpowder, printing and the marine compass.









- Renaissance started in Italy.
- The Gothic architecture never got a firm hold in Italy.
- Many things aided the Italians to start the Renaissance, the resentment to Gothic, the discovery of new classical ruins and the presence of great Roman structures.
- The movement in art and sculpture started a century before architecture.
- The movement was not a gradual development from the Gothic, like the Gothic did from Romanesque, but was a bit more sudden and more like a conscious choice by artists and architects.
- The personality of architects started to show clearly.

- Renaissance architecture and art tried to reuse the Roman and Greek ideals.
- The idea of a perfection in architecture and art through a geometrical and mathematical process reappeared.
- They perfected the sculpture of the human body.
- Renaissance also started to put theories for urban planning.
- It was affected by the philosophy of humanism.
- They invented many techniques regarding the perspective drawing and oil painting.







- The Urbino Panel
- The Baltimore Panel
- The Berlin Panel
- Examples of Renaissance symbolism, and the effect of perspective on understanding the urban form.







- In the period of Renaissance, theories of urban planning started to appear.
- The ideas of the ideal cities, which were proposed in the classic period witnessed a rise in the Renaissance period.
- The application of Renaissance ideas led to the creation of some of the most famous urban squares.
- Architects and urbanists connected the most important monuments with straight streets.
- Plazas took geometrical shapes against irregular masses, and where designed according to the same classical principles of mathematical geometry, symmetry, proportions, etc.

• Piazza St. Marco, Venice





• The Capitoline hill, Rome





S. Nicholas church, Prague.

- Renaissance was a breakage in the natural development of European architecture.
- It was a revival movement of the Roman architecture.
- This is why the most basic feature is the reuse of the Roman elements.
- Renaissance architects did not copy the Roman architectural elements, but the amount of alteration and change was huge and effective.
- They used the classical orders (Doric, Ionic and Corinthian) for decoration and sometimes as real structural elements.
- The Roman elements, columns, pilasters, entablatures and details were applied in a very special and calculated system, which evolved gradually.

- There was a strong relationship between painting, architecture and sculpture, since many great names did the three professions at once.
- The period can be named the age of accessories, since many tombs, monuments, altars and fountains were designed.
- Renaissance used gold and silver decoration in excess.
- Middle ages techniques were not completely neglected. They were used for construction, while Roman techniques were used as an envelope.
- The buildings were viewed as a composition of lines and masses.
- They followed the Byzantine traditions of interior-dome decoration.

- The arches were again semi-circular, which affected the vaults.
- The Gothic features like ribbed vaults and flying buttresses were abandoned.
- Symmetry and proportion were very carefully studied.
- They started to use domes for roofing.
- A sense of grandeur was given through simplicity and large open spaces, unlike Gothic, which encouraged irregularity in plans.
- Openings were squares or circles, large in warm climates, small in cold.
- The human scale was abandoned, unlike in Gothic architecture.

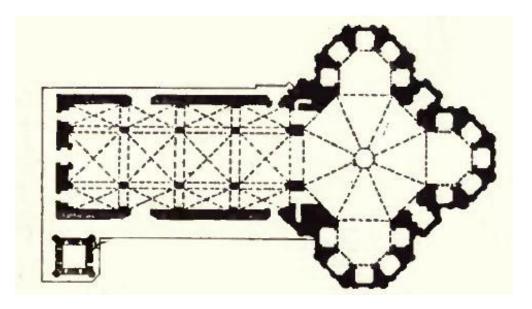
- Historians often divide the Renaissance into three phases:
- 1- Early Renaissance: (1400–1500), also known as the "Quattrocento". It represented the beginning of Renaissance where the idea of exploring the Roman architecture started.
- 2- High Renaissance: (1500–1525), is where the idea was wide spread and used on a greater scale.
- 3- Mannerism: (1520–1600), is the phase where architects started experimenting new forms and new architectural relationships.

- Italy was the bed of Renaissance.
- The movement started in the grand Italian cities, Florence, Rome, Venice, Milan and Genoa.
- The artists were encouraged by the state to create masterpieces.
- Florence was a leader of Renaissance, in its churches and palaces.
- Due to unsafe situations, its palaces more like fortified fortresses.
- The great names in Florentine architecture include Brunelleschi and Alberti.
- Rome was the capital, clinging to its ancient glory.
- The situations reduced the need for fortifications in palaces.
- · Roman architects include Bramante and Michelangelo.

- Venice was a great city due to its commercial power.
- Its geography, hot climate and wide sea coasts encouraged out-door life.
- Venice had some independence from Rome, politically, religiously and architecturally, which appeared in the Venetian Gothic architecture.
- Venetian buildings were lighter and used the columns more freely.
- Milan was one of the most populous cities. They used brick mainly.
- In Genoa, and due to irregular slopes, the palaces had different levels, and the architects used paths and terraces to create amazing vistas.
- Other important architects include Palladio and Bernini.
- Some Italian architects used the interior dome.

- Florence Cathedral, Florence:
- Brunelleschi



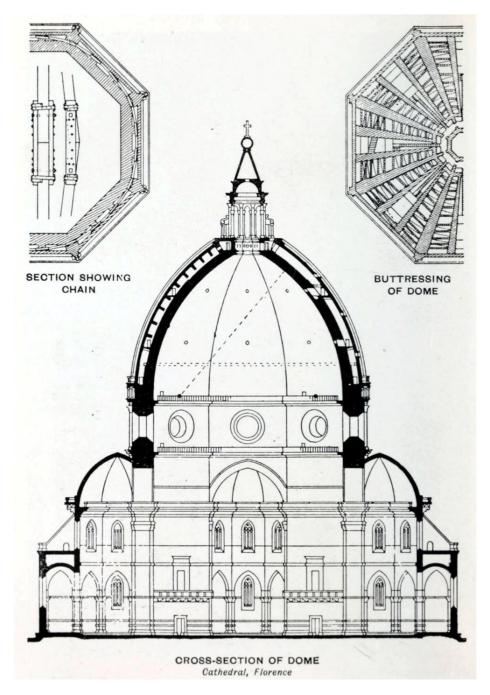




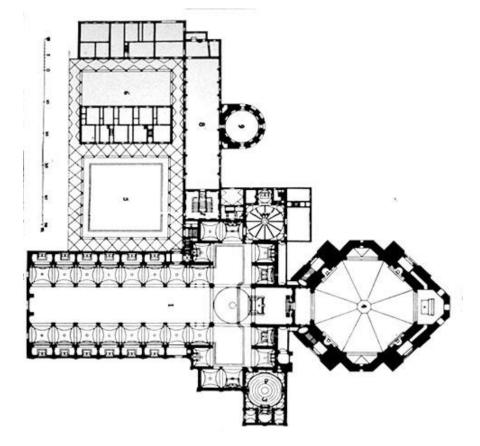
• Florence Cathedral, Florence:







- S. Lorenzo Cathedral, Florence:
- Brunelleschi



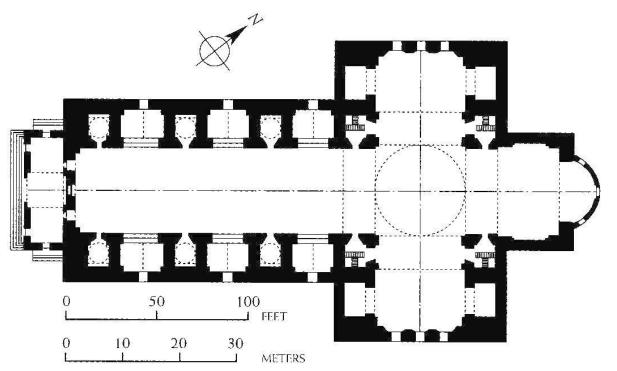


- S. Lorenzo Cathedral, Florence:
- Brunelleschi





- S. Andrea Cathedral, Mantua:
- Alberti





- S. Andrea Cathedral, Mantua:
- Alberti

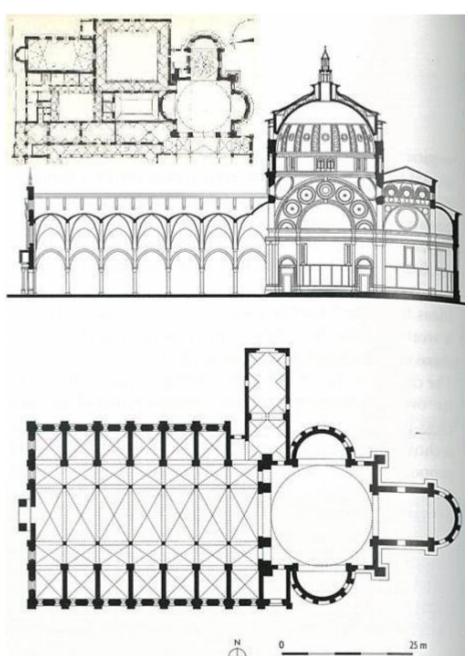




- S. Maria delle Grazie Church, Milan:
- Bramante

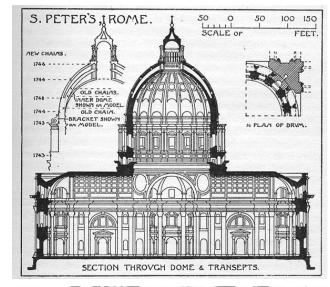


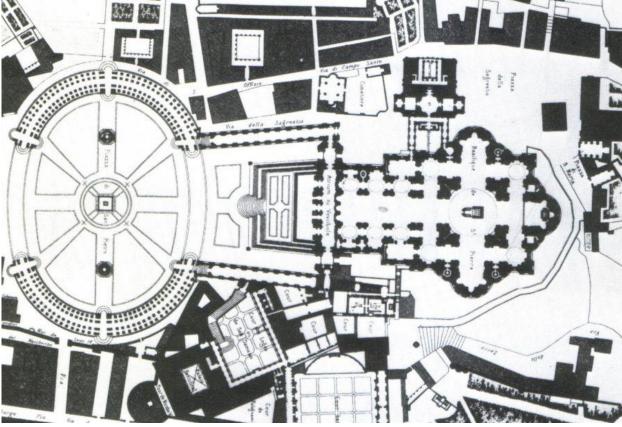




- S. Peter Basilica, Rome:
- Michelangelo







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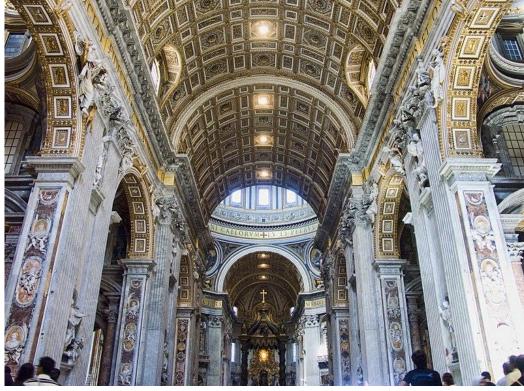




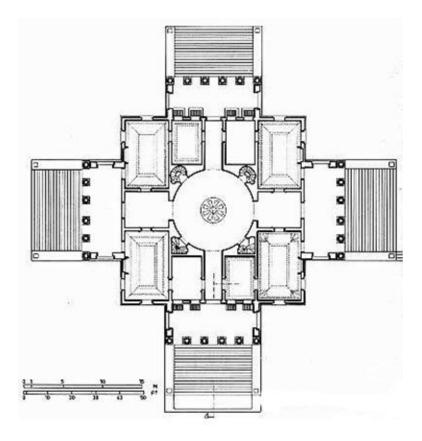
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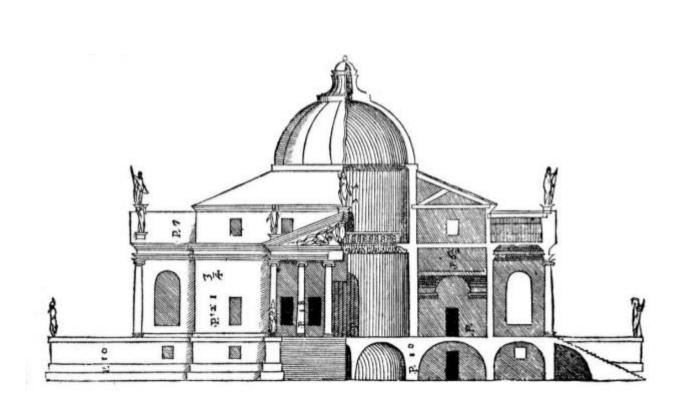






- Villa Capra, Vicenza:
- Palladio





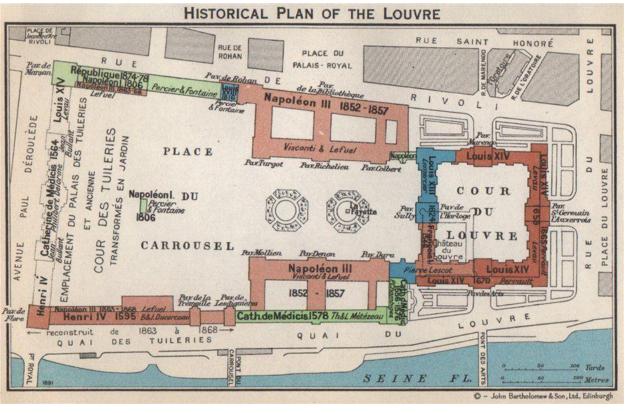
- <u>Villa Capra, Vicenza:</u>
- Palladio





- France had a volatile relationship with the rest of Europe.
- Some Italian artist worked in France.
- The French also developed a very extensive decorated version called Rococo.
- There was a transition period from Gothic to Renaissance unlike in Italy.
- The palaces were built outside town, unlike inside cities like in Italy.
- French Renaissance was more about (Chateau) buildings than churches.
- The roofs were higher than in Italy, result of the vertical Gothic emphasis.
- They used the attic, unlike the Italian cornice.
- Usually each story had a separate columns' order.

• The Louvre, Paris:



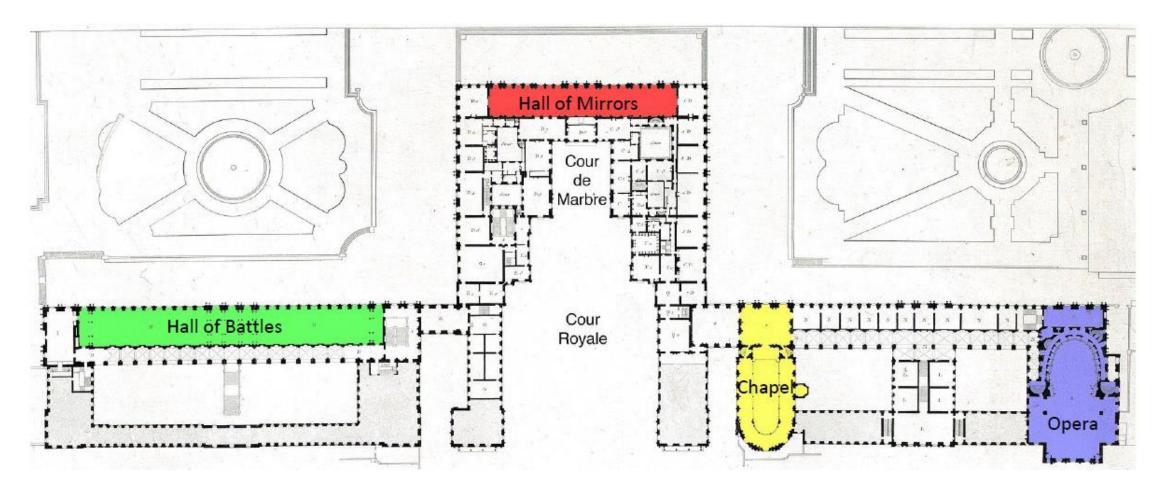


• The Louvre, Paris:





• Chateau de Versailles, Paris:



• Chateau de Versailles, Paris:





Marble Court Hall of Mirrors

• Chateau de Versailles, Paris:







Hall of Battles Royal Chapel Royal Opera

• Chateau de Versailles, Paris:





# Spanish Renaissance

- Spain started to rise in power after the discovery of the new world.
- The Christian reformation had no effect on Spain.
- Spanish Renaissance also created a Rococo version called Churrigueresque.
- The Moorish effect is also clear.
- Roofs were generally flat or low pitched.
- Doorways were emphasized, and windows' frames were carried on corbels.
- Towers and spires affected by the Gothic language were still used.

# Spanish Renaissance

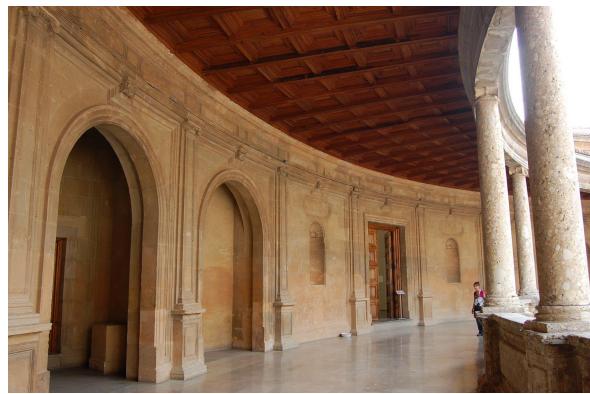
• Palace of Charles V, Granada:



# Spanish Renaissance

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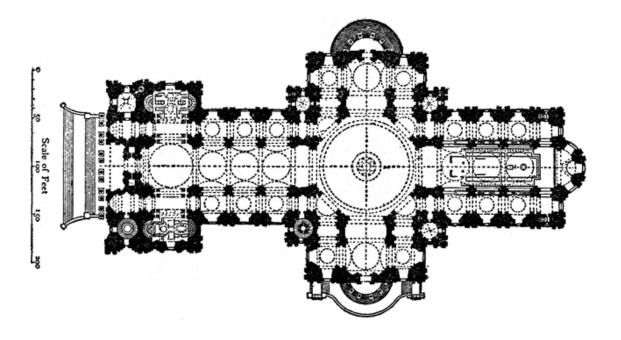


# English Renaissance

- The Christian reformation had its effect on England.
- There are many variations of the English Renaissance.
- In the beginning the English architects continued using Gothic features.
- Later the style became more classic, like using the columns with entablature.
- Some of the important English architects include, Sir Christopher Wren.

# English Renaissance

- S. Paul Cathedral, London:
- Sir Christopher Wren

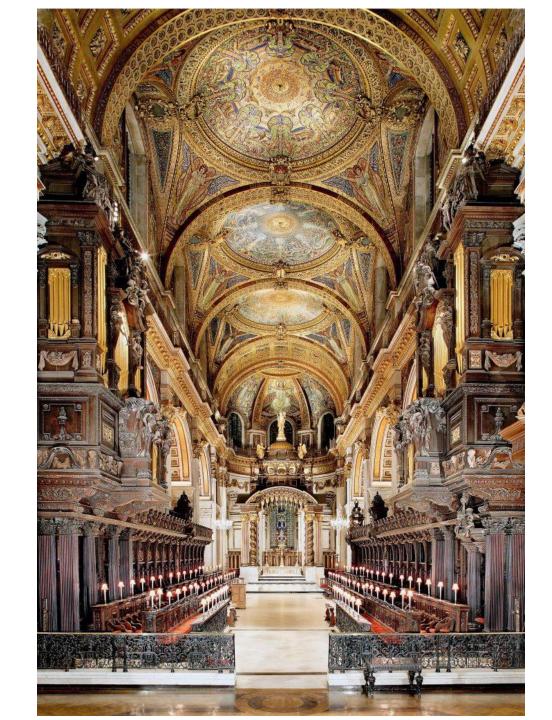




# English Renaissance

- S. Paul Cathedral, London:
- Sir Christopher Wren





#### Renaissance Architecture

- The effect of the Italian architects' choice of going back to the Roman architecture affected the world.
- Renaissance buildings spread not through Europe, but the whole world.
- Its rich character and exuberant bright buildings revived the Roman architecture in a more genius way internationally.