Enigmatic paintings on the Renaissance theme of the ideal city are currently on view in Urbino, Italy, at the historic Palazzo Ducale, itself a splendid masterpiece of 15th-century Italian architecture. According to Lorenza Mochi Onori, director-general of the Ministry of Heritage and Culture of the Marche Region, Italy, the Urbino Renaissance revolved around the figure of Federico da Montefeltro, Duke of Urbino. Commander and soldier of fortune, Duke Federico was an expert in the construction of objects and machines. Duke Federico’s education combined with intellectual curiosity and the meeting in his court with figures such as the polymath Leon Battista Alberti and the painter Piero della Francesca – “all of the theoretical perspective”, as Ms Mochi Onori put it – led to a mathemati-cal Renaissance in Urbino during the second half of the 15th century. Emblematic of this historical period are three depictions of ideal cities, tempera paintings preserved in Urbino, Baltimore, Maryland, and Berlin, Germany. The artists of all three paintings are unknown, so the paintings are referred to by the locations of their current owners: Urbino, Baltimore and Berlin.

While medieval cities were constructed as images of power, domination and control of the society, the central theme of the Renaissance city is ideal proportion. “The sense of harmony is felt immediately,” said Ms Mochi Onori, who curated the exhibit, “The Ideal City: Renaissance Rome in Urbino between the time of Piero della Francesca and Raphael”. The harmony of the ideal city is linked to the vision of the mathematician and Franciscan friar Luca Pacioli, who worked together with Leonardo da Vinci. According to Friar Pacioli, reality, given by divine creation, is gov-erned by mathematical relationships and numerical proportions, with which man reproduces the space. Using the five regular polyhedra mentioned by Plato it is possible to “create relationships between spaces and on the basis of these proportions, one can construct reality in such a way as to reflect this divine harmony”, Ms Mochi Onori said.

The paintings of the ideal cities are not pictorial, but mathematical, and as such represent an ideal world. By using perspective, thought translates into a construction of reality and all that the artist conceives is created based on mathematical rules. "The reality is not made of lines and mathematical constructions, but of atmospheric density, light and shade, by which the paint-ing is broken in the light and is totally created from light, shadow and atmospheric density,” Ms Mochi Onori said, referring to different schools of thought. Even from the view-point of colours, we see an ideal representation. The images, in fact, are always clear because the air does not exist. “There is only the mathematical construction, perspective and the colour of the air is not considered,” Ms Mochi Onori said. So the light is always uniform.

The paintings of the ideal cities from Urbino to the figures in Baltimore it seems life was “added after-ward to this mathematical space”, she said. This crystal-line reality is not corrupted by life, but is the centre of human space in order to measure man – a concept taken from the classics.

Ideal society

During this time in history, the harmony of the ideal city reflected the utopian concept of an enlightened government that respects its citizens’ freedom and, therefore, is able to manage a peaceful and harmonious society. To illustrate this link between the image of the ideal city and the social order, Ms Mochi Onori gave the example of the Palazzo Ducale in Urbino, the ducal palace and res-idence of Federico da Montefeltro. “From the architectural point of view, the palace opens onto the city in a direct relationship to emphasise the balance of social relations between power and enlightened society.”

In addition, the relation-ship between duke and architect became almost one of equals, Ms Mochi Onori said, referring to the archi-tect Leon Battista Alberti, a friend of Duke Federico. The duke did not order the archi-tect to build a city based on size and image, rather they had a relationship of mutual intellectual exchange. And for his architect Luciano Laurana, the duke issued an engineer’s licence. We do not know the purpose or the author of these ideal cities. According to Ms Mochi Onori, the images probably served to decorate furniture, as they were found on chests, head-boards and the backs of benches.

Some speculate the images may have been used for meditation. The contem-plation of mathematical reality and order inherent in these representations may induce a state of abstraction from reality and introspec-tion that brings the observer to the beauty of what Luca Pacioli called the “divine proportion.”

Regarding attribution, according to Ms Mochi Onori’s experience with reflectography, an infrared technique used by art histo-rians, the works from Urbino and Baltimore may suggest the same author, a possi-bility that further fuels the sense of mystery associated with these depictions.

The theme of the ideal city has been present throughout history up to modern drawing-table designs and symbols of political power such as Chandigarh in India or Brasilia. In the Renaissance, however, the design did not aim at building “neighbour-hoods or cities rationally invented on paper”, as Ms Mochi Onori described, but considered the city as an environment on a human scale.

The paintings of the ideal cities are model representations of reality and a perfect synthesis between the classical art and the rigour of science – unique and unrepeatable as in the case of the mathematical Renaissance of Urbino. Next to the paintings of the ideal cities from Urbino and Baltimore, the exhibit presents some 50 other paintings, sculptures, inlays, drawings, illuminated manuscripts and architectural treatises by authors such as Jacopo de Barber, Mantegna, Bramante and Raphael. The exhibit is open through July.