# Exploring History—The Renaissance

## Notebook Table of Contents

**Introduction** ............................................. A-2

- Introduction to the Notebook—How the Notebook is Organized—
- Correlation of Activities to NCSS Standards

**Management and Resources** .............................. B-1

- Background Information for the Time Period—Chronology of The Renaissance—
- Sculptors, Architects, and Painters of the Italian Renaissance—
- Suggested Schedule Using 45-Minute Periods—Introduction to the Rubric Bank—
- Examples from the Rubric Bank—Sample Rubric for The Renaissance—
- Young-Adult Reading—Suggested Resources for the Teacher

**Simulations and Activities** ............................. C-1

- **Unit 1: Renaissance Art** .............................. C-3
  - Medieval vs. Renaissance Art .......................... C-3
  - Brunelleschi’s Done ...................................... C-21
  - The Art of Illusion ...................................... C-33

- **Unit 2: Great Renaissance Men** ...................... C-47
  - Leonardo da Vinci ...................................... C-47
  - Michelangelo ............................................. C-65
  - *The Prince* by Machiavelli ............................ C-89

- **Unit 3: Venice: The Commercial Empire** .......... C-109

- **Unit 4: Renaissance Women** .......................... C-137

- **Unit 5: The Age of Reformation**....................... C-157

**Overhead Transparencies** .............................. D-1

**Assessments** ............................................ E-1

**Multimedia Resources** .................................. F-1

- Using the View Program .................................. F-5
- Ideas for Using Multimedia Collections in the Classroom ........................................ F-16
- Thumbnail Photo Images and Clip Art ................... F-21
- Audio Clips, Video Clips, and Documents .............. F-35

**Bonus Items** ............................................. G-1

- Teacher Resource CD-ROM Contents ..................... G-2
How the Notebook is Organized

**Introduction**

**Notebook Contents**
- Management Ideas for the Notebook (A)
- Additional Teacher Resources (B)
- In-depth Lesson Plans (C)
- Student Handbooks and Background Information (C)
- Reproducible Activity Sheets (C)
- Overhead Transparencies (D)
- Quizzes and Final Test (E)

**Artists of the Renaissance**
- Show students architects, sculptors, and painters of the Renaissance.

**The Renaissance A Chronology of Events**
- Show students many of the events that occurred during the Renaissance.

**CD-ROMS**

**Teacher Resource CD-ROM**
- Contains annotated standards, rubric bank, assessments, and the script for the play.
- See page G-2 for a complete listing of the contents of the CD.

**Multimedia CD-ROM**
- Contains photographs, clip art, documents, audio clips, and video clips.
- See Section F for a complete description of the contents of the CD and how to use it.

**Multimedia CD-ROM**

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- Contains photographs, clip art, documents, audio clips, and video clips.
- See Section F for a complete description of the contents of the CD and how to use it.
How the Notebook is Organized

Section A: Introduction—Section A introduces the teacher to the specific book and provides an overview of the Exploring History series. Also included is a list of which specific activities meet the curriculum standards published by the National Council for the Social Studies (NCSS).

Section B: Management and Resources—Section B provides general background for the teacher and includes helpful material about scheduling activities in the classroom. Relevant resources to enhance and supplement the unit are provided here. Among the resources that may be included in each book are topic-related books for teachers and students, videos, period art, music, and dance. This section also introduces teachers to a rubric bank and suggests ways to implement and customize the 100 plus criteria to create rubrics that serve the needs of students as they complete the activities. The entire rubric bank is included on the Teacher Resource CD as an Adobe Acrobat file. It is also included as a Microsoft Word document so that teachers can cut and paste the criteria to create personalized rubrics. Teachers and students can use the supplementary guide to negotiate and develop criteria for the activities in the book. The rubric bank can also be used as an evaluation tool for other activities.

Section C: Simulations and Activities—Section C gives necessary background information for each simulation and activity, as well as directions for implementing the activities in the classroom and using the materials in the student handbooks. A list of applicable curriculum standards precedes each activity. Following the lesson plans are information pages for the students as they work through the simulations. These student handbook pages are provided at two levels to meet your students’ varying reading abilities. The Level A (approximately a 5th grade reading level) and Level B (reading level for grades 8 and up) handbooks essentially include the same information with variations in difficulty level of content, format, and vocabulary. After the handbooks are reproducible pages for implementing and managing the units.

Section D: Overhead Transparencies—Section D provides the teacher and students with overhead transparencies of key work sheets, charts, and other materials that might serve as focal points of a lesson, review, or presentation.

Section E: Assessments—Section E was created to assist teachers with the assessment process. Included in this section are multiple choice and essay quizzes as well as a final test. Schedule testing to meet your particular classroom needs. The assessments are also available on the Teacher Resource CD as Microsoft Word documents. Teachers can edit and revise these documents to better meet their needs or to more accurately assess the content that was covered within their classrooms.

Section F: Multimedia Resources—Section F contains the User’s Guide for the Multimedia Resources CD. The guide includes information about using the viewer program and ideas on how to use the collection in the classroom. Also included are thumbnail images of the photographs and clip art, as well as a listing of the documents, video clips, and audio clips for quick reference.

Section G: Bonus Items—Section G provides teachers and students with handy manipulatives to be used with specific activities or as motivational tools throughout the unit. The bonus items may include maps, charts, activity cards, games, or information cards. Many of the bonus items can be adapted for use with extension activities that teachers may wish to use to reinforce the concepts emphasized in the notebook’s simulations and activities.
<table>
<thead>
<tr>
<th>ARL*</th>
<th>Book/Publisher Information</th>
<th>Book Summary</th>
</tr>
</thead>
<tbody>
<tr>
<td>E</td>
<td>Llorente, Pilar Molina. <em>The Apprentice.</em></td>
<td>Arduino, 13, of Spain, becomes an apprentice painter to Maestro Casim in Florence, only to discover that the Maestro secretly shackled a gifted apprentice in his attic.</td>
</tr>
<tr>
<td>D</td>
<td>Napoli, Donna Jo. <em>Daughter of Venice.</em></td>
<td>In 1592, Donata, daughter of a Venetian nobleman, lives a sheltered life. One day she dresses like a boy and goes outside of the palace. She finds herself in the Jewish ghetto and befriends Noe, a Jewish boy.</td>
</tr>
<tr>
<td>E</td>
<td>Lasky, Kathryn. <em>Elizabeth I, Red Rose of the House of Tudor: England, 1544.</em></td>
<td>Elizabeth shares her diary with us from the age of ten until just after the death of her father, depicting the life of upper class England.</td>
</tr>
<tr>
<td>A</td>
<td>Meyer, Carolyn. <em>Mary, Bloody Mary.</em></td>
<td>Mary Tudor realizes that her father becomes angry when he doesn't produce a son for the throne. She describes the plight of her father and its effect on her, as she becomes queen and reigns with terror.</td>
</tr>
<tr>
<td>A</td>
<td>Willard, Barbara. <em>The Miller's Boy.</em></td>
<td>A young boy who lives with his harsh grandfather, a miller, dreams of a friend and a horse to return him to his married sister.</td>
</tr>
<tr>
<td>A</td>
<td>Wise, William. <em>Nell of Branford Hall.</em></td>
<td>After her visit to London, Nell, 13, finds herself and her father in a parish where the plague has struck. Based on the true story of the town of Eyam, Nell returns home to find that her village has quarantined itself as more than 100 die.</td>
</tr>
<tr>
<td>A</td>
<td>Yolen, Jane and Robert Yolen. <em>Queen's Own Fool.</em></td>
<td>An atmosphere of intrigue, romance, politics, and religious strife is described by young Nicola, who describes the world of Mary, the future Queen of Scotland and France.</td>
</tr>
<tr>
<td>A</td>
<td>Temple, Frances. <em>The Ramsay Scallop.</em></td>
<td>Fourteen-year-old Elenor finds that she is betrothed to a lord's son who is ambitious. She leaves England and ventures on a journey to far off Spain.</td>
</tr>
<tr>
<td>A</td>
<td>Lisson, Deborah. <em>Red Hugh: The Kidnap of Hugh O'Donnell.</em></td>
<td>In 1587, England is taking over Ireland and hostages are taken. 14-year-old Hugh O'Donnell and his two friends are imprisoned in Dublin Castle. They attempt to escape several times.</td>
</tr>
<tr>
<td>A</td>
<td>Konigsburg, E. L. <em>The Second Mrs. Giaconda.</em></td>
<td>Salai, a servant of Leonardo da Vinci, describes how the great Renaissance genius came to paint the <em>Mona Lisa.</em></td>
</tr>
<tr>
<td>D</td>
<td>O'Brien, Judith. <em>Timeless Love.</em></td>
<td>When Sam makes a wish while wearing the antique necklace her mother gave her, she goes back in time to Tudor England and finds herself barefoot in the chambers of Edward VI.</td>
</tr>
<tr>
<td>A</td>
<td>Goodwin, Marie D. <em>Where the Towers Pierce the Sky.</em></td>
<td>Lizzie travels back in time with an astrologer to war-torn France in 1492, where she finds herself working as a double agent to protect Joan of Arc.</td>
</tr>
<tr>
<td>A</td>
<td>Fienberg, Anna. <em>The Witch in the Lake.</em></td>
<td>A very entertaining adventure set in 16th century Italy. The village people believe that Leo and his grandfather are wizards, and blame them for mysterious happenings around the lake. Leo decides to get the witch out of the lake to clear his name. His girlfriend Merilee believes in him and follows him.</td>
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</table>

*Average Reading Level (Key:  E = EASY, grades 4–6; A = AVERAGE, grades 6–8; D = DIFFICULT, grades 8–10)
# Exploring History—The Renaissance

## Section Table of Contents

### Unit 1: Renaissance Art
- Medieval vs. Renaissance Art .......................................................... C-3
  - Student Handbooks and Reproducibles .......................................... C-9
- Brunelleschi’s Dome ................................................................. C-21
  - Student Handbooks and Reproducibles ......................................... C-27
- The Art of Illusion ................................................................. C-33
  - Student Handbooks and Reproducibles ......................................... C-39

### Unit 2: Great Renaissance Men
- Leonardo da Vinci .............................................................. C-47
  - Student Handbooks and Reproducibles ........................................ C-53
- Michelangelo ............................................................................. C-65
  - Student Handbooks and Reproducibles ........................................ C-73
- The Prince by Machiavelli ......................................................... C-89
  - Student Handbooks and Reproducibles ........................................ C-99

### Unit 3: Venice: The Commercial Empire
- Venice: The Commercial Empire .................................................. C-109
  - Reproducibles ........................................................................... C-115

### Unit 4: Renaissance Women
- Renaissance Women .................................................................... C-137
  - Reproducibles ........................................................................... C-143

### Unit 5: The Age of Reformation
- The Age of Reformation ............................................................. C-157
  - Student Handbooks and Reproducibles ......................................... C-167
The Art of Illusion

I. Culture
   c. Explain and give examples of how language, literature, the arts, architecture, other artifacts, traditions, beliefs, values, and behaviors contribute to the development and transmission of culture.

II. Time, Continuity, and Change
   a. Identify and use key concepts such as chronology, causality, change, conflict, and complexity to explain, analyze, and show connections among patterns of historical change and continuity.
   b. Identify and describe selected historical periods and patterns of change within and across cultures, such as the rise of civilizations, the development of transportation systems, the growth and breakdown of colonial systems, and others.

IV. Individual Development and Identity
   h. Work independently and cooperatively to accomplish goals.

V. Individuals, Groups, and Institutions
   b. Analyze group and institutional influence on people, events, and elements of culture.
   g. Apply knowledge of how groups and institutions work to meet individual needs and promote the common good.

VII. Production, Distribution, and Consumption
   e. Describe the role of specialization and exchange in the economic process.

Background Information

The artists of the Renaissance took pride in the works they created. Their paintings were measured with mathematical precision to indicate perspective and render a flat surface as though it were a three-dimensional view. No matter what materials artists chose, they broke with the traditions of the past to create works of art that gave the illusion of depth and distance, as if the paintings had dimensions that actually allowed for the passage of rays of light. Moving beyond the universal themes that were applied to canvas and panel, these artists transformed the medieval and Byzantine conceptions of art. Renaissance genius gave a feel of reality that had previously been absent from paintings. The artist’s work was rendered with flair and a masterly touch that teased the eye and tantalized the imagination.

The intent of the Renaissance artist had been, through the application of perspective, to create compositions that embraced complete harmony and precisely rendered proportion, united in the reality of the total visual conception. The illusionist artists betrayed this ideal. What they created were works that deliberately deceived the viewer and, in a sense, betrayed the harmonious reality championed by the Renaissance. The first application of the illusionist’s craft were the architectural elements used as visual frames for the countless frescoes that decorated medieval European churches. Masaccio’s Trinity, in which a barrel-vaulted ceiling is worked in as a frame for the figure of God, was the first architectural illusion to make its appearance in a Renaissance painting. His finished work, employing a structural architectural motif, nicely complemented the interior of the church where the painting is housed. Practical considerations also played a role in the application of illusionary paintings, especially where the construction of expensive architectural details like columns and loggias could be omitted if an artist could be found who could paint them instead.
The Art of Illusion (cont.)

It was imperative that these structural details were painted in such a way that the viewer would actually be fooled into believing he was looking at something that wasn’t really there. A costly dome in a palazzo could easily be dispensed with if an artist of requisite talent could be found to paint a ceiling that applied illusionist techniques to show the heavenly clouds and winged angels receding upward in circular fashion. A careful design that cleverly applied detailed figures, shades of light, and brilliant use of color could easily confound the viewer into believing that the flat ceiling was actually a brightly illuminated dome. A talented architect of skill and genius like Donato Bramante (b.1444–d.1516), who modernized and renovated the interior of S. Maria presso S. Satiro in Milan, was able to expand the space that existed in the choir by applying illusionist methods in the construction, making it seem that the area was actually three or four times deeper than it really was.

The Duke of Urbino, Federigo da Montefeltro, was a benevolent ruler who was also proud of his humanist attainments. He commissioned Baccio Pontelli to make over his small library in the ducal palazzo in such a fashion that it would reflect his accomplishments as a humanistic scholar. All four walls within the small confines were decorated with wood inlay, creating the illusion that the shelves and partly-opened cabinets were filled with all of the paraphernalia of the idealized “Renaissance Man.” Even if, to the viewer, this illusion was not wholly successful as a trompe l’oeil (a French term that means to fool the eye), that did not matter. What was important to Federigo da Montefeltro was the overall setting that portrayed him as a humanist, the way he wanted to be remembered.

Andrea Mantegna, a genius in the application of perspective, took the illusionist motif to another level, away from the practical considerations of making a space look larger or more beautiful. Painting a fresco in 1473, in the Camera degli Sposi of the Palazzo Ducale in Mantua, he painted a group of people looking down into the room from a window in the roof. This comic representation repudiated the original intention of trompe l’oeil, that always sought, through illusion, to realistically harmonize this type of painting with the surrounding architecture it meant to complement.

There were countless artists who were experts at this technique, and these illusionists perpetuated the market. In the following activities, students will participate in a test of perception that challenges what the eyes actually see and what the intellect registers as real. After taking the Vision Test, they will go over the correct answers, learn some of the rules of illusion, and compare their findings. Once they understand the underlying principles of illusion and perspective, as well as the background and application of trompe l’oeil, they will be required to analyze different examples of Renaissance artwork using the material they studied and all that they learned.

Materials

- **Student Handbook**
  - The Art of Illusion: Trompe L’oeil (page C-40 or page C-41)

- **Reproducibles**
  - The Art of Illusion (page C-42)
  - Vision Test (pages C-43 through C-45)
  - Vision Test Answer Key (page C-46)
The Art of Illusion

Activity

Content Objectives: Students will take a visual illusion test to establish that they can be fooled visually. Then, students will compare their test results to the answer key, which will explain basic concepts of illusion. Taking this learned information, students will analyze trompe l'oeil.

1. It is imperative that you do not set the stage and do not give any anticipatory setting for this activity. The less the students know, the more effective and better the lesson.

2. Distribute the Vision Test (pages C-43 through C-45). Place the sheets face down on all the students’ desks.

3. Explain to the students that this will be an easy, timed test that is lots of fun. The objective is to note how quickly they are able to read the material and answer the questions. Tell the students that they will not be graded on the test, but that they should try to do the best they can.

4. Tell students that you are requiring them to take the test with a pen. Once they answer a question, they are not allowed to go back and reconsider it. Their first answer to any given question is their only answer. Cross outs will not be permitted.

5. Let them know that they will be required to write down their starting and finishing time on the top of the first page of the test.

6. Look at the clock and state, “It is now __________. Ready, set, go!”

7. Students turn their pages over, mark the time, and take the Vision Test. When they are finished, they should note the time and write it on the top of the test in the space provided.

8. Once everyone has completed the test, divide the class into cooperative groups of four students (in two pairs). Distribute the Vision Test Answer Key (page C-46) to each pair of students.

9. Ask one student in each cooperative group to be the spokesperson.

10. Begin by asking all students to look at item number #1. Reread the question aloud and have the spokesperson from one pair of students state the answer. Discuss it with the class.

11. Continue this process until all questions and answers have been exhausted.

12. Ask the students, “For what reasons do you believe that we took this exam while studying the Renaissance period?” Ask each cooperative group to discuss the answer.

13. After the groups have had a chance to discuss the question posed, ask them to share their ideas with the rest of the class.
The Art of Illusion

Activity (cont.)

14. Distribute The Art of Illusion: Trompe L’oeil (page C-40 or page C-41) and the images page, The Art of Illusion (page C-42). Have them begin to read the material in class and request that they complete it for homework. [There are two versions of this information provided for your students. Level A (page C-40) is intended for students reading on about a fifth grade reading level. Level B (page C-41) is intended for students reading on an eighth grade (or above) reading level. The information is basically the same, only the vocabulary and sentence structure have been changed for readability.]

15. The next day, ask the groups to discuss what they read. If they had previously studied and examined medieval art, you can ask the students how this marked a change in the way artists painted their frescoes and canvases as well as how this new technique was used in the palazzos, dwellings, and churches.

16. Ask the students to take out their homework sheets. Tell the cooperative groups to look at the artwork and architecture on The Art of Illusion (page C-42) and determine how each picture implemented illusionary techniques.

17. Once the cooperative groups have written how the picture implemented illusionary techniques for each of the four pictures, pull the class together for a discussion.

18. Ask one spokesperson from each group to offer a response when called upon. You should record the responses on the board. All students should take notes on what is offered and agreed to in terms of an explanation. Below are a few suggested answers.

- In the first picture, Olympus by Giulio Romano, the artist used the concept of pictorial circles, one inside the other, with the outer ring being more pronounced and brighter than the inner rings, creating the illusion of a concave shape. Objects appeared to get smaller, giving it the illusion of depth, as if viewing the heavenly delights above.

- In Baldassare Peruzzi’s A Perspective View, one-point perspective was definitely used, as noted with the columns that appear to get smaller as they recede into the background. The painting of the person on the left wall is also drawn with sloping angles, giving the impression of depth. Look at the balcony wall to note its size; it gives the illusion that it is placed behind the pillars and must be much smaller. Of course, the background becomes smaller and smaller as it recedes into the distance.

- In the Curiosity Cabinet, the pictures hanging on either side slope ever so slightly with the top edge coming down while the bottom edge moves upward. The left glass door appears closed because it is drawn with horizontal lines, while the right-hand door appears open, as it is drawn with sloping lines. The inside shelves are drawn with sloping lines that give them the appearance of depth. Pictures hanging on either side appear more pronounced, while the objects found within the case are not as bold.

- An entire year was spent on the construction of the Prospettiva. The Prospettiva creates the optical illusion of depth. The illusion is created by shortening the columns and placing them closer together as they recede from the entrance, elevating the floor as it extends into the distance, making the squares on the floor into trapezoids, and having the ceiling panels made smaller as the gallery is extended.
The Art of Illusion

Activity (cont.)

19. Nothing can be as much fun as asking students to go home and to give the Vision Test to their parents. They can cut off their answers and share the test with as many friends and family as they wish. However, let them know that other players of this game will want to know how the illusion works, just like the students did. It is their task to describe the illusions to all who participate in the same way it was explained to them.

20. During the next few weeks, ask students to take note of any occasion when they come across an artist that implemented any of the illusionary rules that they learned in this unit. Encourage them to share their findings with the rest of the class.
The Art of Illusion: Trompe L’oeil

As artists began to explore different ways of making art that looked realistic, a new school of artists were trying to come up with ways to trick the eye. Some artists wanted to make beautiful artworks that were balanced and lifelike. Other artists wanted to play with and create images that could please the population even though they were tricking them. This was called trompe l’œil (pronounced “trump loy”) or tricking the eye.

There are many examples of architects who tried to fool the eye. The ancient Greeks sometimes made the back of a building slightly larger, so that viewers would think it was the same size as the rest of the building. However, it was not until Masaccio painted Trinity in 1427–1428 that painters decided to use architectural illusions in their work. When plasterwork that was needed inside a church was too expensive, artists designed and painted illusions to replace the plasterwork and fool the eye. Another example is the work of the architect Donato Bramante, who was asked to remodel and update the church S. Maria presso S. Satiro, located in Milan, Italy. He needed to make the space behind the choir appear larger. He designed an illusion, making viewers think that there was more space behind the choir than there really was. This effect was pleasing to the eye and made the space look bigger.

Other artists traveled throughout the Italian peninsula painting spectacular trompe l’œil inside domes and churches. (On page C-42, there are four images that you’ll need to refer to as you read the rest of this page.) Notice how Giulio Romano designed the dome at the Palazzo del Te’ in the painting Olympus. He created the illusion of great depth. He applied the trompe l’œil technique by drawing circles within circles as well as decreasing the size of the figures as they neared the center of the “dome.” Baldassare Peruzzi created A Perspective View, painting columns, a porch, and clouds to create the illusion of space at the Palazzo della Farnesina.

Many illusionists liked to paint the “perfect” world of their patrons. These patrons were rich and powerful, and they wanted to show off and spent their money on expensive items. The artists who took the commissions painted illusions in small rooms to make the rooms look bigger. They painted shelves and open cabinets that were filled with all of the things that a “Renaissance Man” was supposed to possess. Curiosity Cabinet on page C-42 is an example of this. Painted cabinets would show shelves overflowing with mathematical and scientific instruments and other objects that illustrated what the owner was interested in. Other wall paintings included pictures of statues and martial heroes of antiquity. What counted was having pictures that showed the humanist’s world—the books and other objects of knowledge and learning.

The trompe l’œil technique was used for centuries. One of the best examples of this illusionary effect is an actual architectural structure. The Prospettiva (1653) was an open gallery (page C-42). It led to the main entrance of the Palazzo Spada, which was the creation of Francesco Borromini. An entire year was spent on the construction. The Prospettiva creates the optical illusion of depth, as viewers think they are looking down an open gallery that is at least 35 meters (115 feet) long, when it is really only 8.8 meters (28.9 feet) long. The illusion was created by shortening the columns and placing them closer together as they get further away from the entrance, elevating the floor as it extends into the distance, making the squares on the floor into trapezoids, and having the ceiling panels made smaller as the gallery is extended. The statue at the end of the gallery makes the entire scene look longer.

Trompe l’œil is still popular. A modern group of artists uses a refined technique called “photo-realism.” The painters make the observer think that he or she is actually viewing an enlarged photograph rather than a painted canvas. The Internet has numerous examples of ways artists from all over the world fool people with the techniques of photo-realism and trompe l’œil.
The Art of Illusion

Olympus by Giulio Romano
Scala/Art Resource, New York

A Perspective View by Baldassare Peruzzi
Scala/Art Resource, New York

Curiosity Cabinet
Scala/Art Resource, New York

Prospettiva by Francesco Borromini
Vision Test

Directions: You will be timed as to how quickly you can complete this exam. Please use a pen. Your initial answer is the only one that will be acceptable. When your teacher states, “ready, set, go,” look at the clock to note the starting time. Please read and answer the questions below. When finished, look at the clock and record the time in the space below to determine how quickly you were able to complete the exam.

Starting Time: _______________  Finishing Time: _______________

1. Which horizontal line is longer? The top one, the bottom one, or are both the same size?

   - same size
   - top one is longer
   - bottom one is longer

2. There are two clusters of circles below. Are the center circles the same size or is one center circle larger than the other center circle?

   - same size
   - left one is larger
   - right one is larger

3. How many legs does this elephant have?

   - four legs
   - five legs
4. Count the number of cubes in the image to the left.

- seven cubes
- six cubes

5. What is in the white intersections below—gray dots, black dots, or no dots?

- gray dots are seen
- black dots are seen
- no dots are seen

6. Do you see two faces or one face?

- one face is seen
- two faces are seen
Vision Test

7. Are the horizontal lines parallel to one another or do they slope to either side?

- parallel
- slope

8. Are the curved objects below the same size or is one wider than the other?

- same size
- top one is wider
- bottom one is wider

9. Are the circles pulling inwards or pushing outwards?

- pulling inwards
- pushing outwards

10. Does the square have straight or curved sides?

- straight sides
- curved sides
1. This illusion is meant to trick you into thinking that the top line is larger. The brackets (with the greater and lesser symbols) are drawn to close in the line or to elongate the line. Also, the illusionist who drew these lines did not line up the centers. Instead, the artist lined up the left edges to accentuate the possible difference. In reality, they are of equal length. Use a ruler to measure the lines.

2. The circles in the first ring are large. They create an illusion of being big and bold, thus making the center circle appear crowded or smaller than it really is. The second ring of circles is drawn with small circles. They provide the illusion that there is a greater amount of space around the center circle than in the other drawing. This makes you think that the center circle is larger than it is in reality. Use your ruler to measure the diameter of both circles to determine that they are of equal size.

3. Place your hand across the mid-section of the elephant, so you can only see the feet of the animal. Count the number of legs you see. The answer is probably five. Now, cover the elephant’s feet and look only at the legs of the elephant. Count the number of legs. The answer is probably four. The illusionist used the back edge of the trunk to create an illusionary leg. The artist repeated this process with the next two legs. So the back of one leg is joined with the front of the next leg to create an illusion of an extra leg. Either answer is correct.

4. Most of you will look at the cubes and decide that the black diamonds are the top portions of the cubes, thus giving you an answer of seven cubes. A few will see the black diamonds as the bottom portions of the cubes. In this case, the answer is six cubes. In order to see the cubes either way, turn the paper upside down and back again. So, either answer is correct.

5. Focus your eyes completely on the white lines separating the black squares. If you do that, you will see just white rows with no dots. However, if you look at the entire picture, you probably see black or gray dots. There are actually no dots in the image. Those are just an optical illusion.

6. If you see one face, it is probably a woman staring straight at you. You will see two eyebrows, two eyes, a nose, and lips. There is a candle splitting her face in half. Or, you might see two faces staring at each other. You are seeing their profiles. In this case, each half of the original face becomes a profile. Either answer is correct.

7. The boxes are in an irregular pattern if you examine them in vertical rows. Most of you will think that the horizontal rows are sloped, due to this irregularity. Hold the paper up to eye level and turn it sideways. If you do this, you will be able to see that the lines are indeed parallel. You can also confirm this with your ruler.

8. These curved objects appear as if the top one is larger than the bottom one. This illusion is created by comparing the bottom, curved line of the top object to the top line of the bottom object. Measure the objects with your ruler to determine that they are identical.

9. Depending on your point of view, the circles can appear to be convex (like an eyeball) or concave (like the inside of a bowl). If shading were included, this would have helped the viewer determine the answer. If the center circles were darker than the outer circles, it would appear convex. If the outer circles were darker than the center circles, it would appear concave. Draw two sets of five circles, one inside the other. On one set of circles, shade the inner-most circle very dark, slowly lightening the shading as you move outwards. On the other set of circles, shade the circles, moving in the opposite direction, with the outer circle the darkest, moving gradually to the inner circle that is lightly shaded. The other reason this illusion works is due to the amount of light. The closer things are, the brighter and more intense they appear because light bounces off the object and reaches your eyes. The farther away an object, the vaguer it will appear due to the lower amount of light that bounces off of it and can reach your eyes. Either answer is correct.

10. Most of you will state that the sides are not straight. This illusion is created by having curved lines intersect the square. Hold the paper up to eye level to determine that the sides are straight. You can also use your ruler to confirm that the sides are straight.
Renaissance Art Quiz

Part 1: Multiple Choice

1. Which European historical periods are placed in the proper chronological order?
   a. Middle Ages, Renaissance, Ancient Greece, Roman Empire
   b. Renaissance, Ancient Greece, Roman Empire, Middle Ages
   c. Ancient Greece, Roman Empire, Middle Ages, Renaissance
   d. Roman Empire, Middle Ages, Renaissance, Ancient Greece

2. The period commonly called “The Renaissance” had its beginnings
   a. throughout the Middle East under the Arab Caliphate.
   b. in the northern part of Europe in England, Ireland, and Scandinavia.
   c. among the various city-states of the Italian peninsula.
   d. when Charlemagne was crowned emperor of the Holy Roman Empire.

3. Which of the following best describes the term Renaissance?
   c. “A ‘Rebirth’ and Renewed Interest in Knowledge and Learning”
   d. “The Age of Enlightenment and the Stirrings of Liberal Democracy”

4. Michelangelo, Raphael, and Titian are famous and remembered as the
   a. greatest of the popes who ruled in the Vatican during the Renaissance.
   b. great condottieri who successfully fought against the French invaders of Italy.
   c. three great artists who dominated the Renaissance art world in Italy.
   d. the most influential and powerful rulers of the city of Florence during the Renaissance.

5. Filippo Brunelleschi is renowned as the artist and architect who devoted his life
   a. to the design and construction of the great dome of the Florence Cathedral.
   b. to painting the walls and ceiling of the Sistine Chapel in the Vatican.
   c. to chiseling David from a massive block of marble.
   d. to building St. Peter’s and making it the most magnificent cathedral in Christendom.

6. Most of the famous and greatest of the Italian Renaissance artists came from
   a. all over the European continent and they brought their artistic skills with them.
   b. the smallest of villages and the rural farming areas of southern Italy and Sicily.
   c. busy urban areas, the cities of northern Italy, and especially the city of Florence.
   d. important religious centers, cloisters, and monasteries found throughout Europe.

7. Which of the following techniques distinguished Renaissance art from medieval art?
   a. the use of linear perspective to create the illusion of depth
   b. the use of light and shade to add the impression of depth to figures
   c. the use of brilliant colors and proportion to capture images
   d. All of the above

8. Which of the following was not a major development of the Italian Renaissance?
   a. the wonderful illusionary art that was called trompe l’oeil
   b. the use of oil paints soon favored by artists for creating their magnificent canvases
   c. the one-point perspective that gave depth to an artist’s painting
   d. humanism and the literary outpouring of Francesco Petrarch and Giovanni Boccaccio
9. Study the drawing. Describe in detail the geometric forms used in this drawing.

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10. Explain in detail at least two conclusions about the relationship of mathematics and art to the Romans and the Renaissance artists.

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11. Many countries chose images that honored leaders or reflected traditional symbols for their new Euro coins. Italy selected the “Vitruvian Man” for the image on its one-Euro coin. Describe in detail what this says about the tradition of the Renaissance in Italy. Explain in detail why you agree or disagree with this choice.