

# PLATINUM PERSPECTIVES

## ART AND MATH

### GRADE LEVEL: 9–12

### BASED ON

Michael Wilson, *Newport Dogs*, 1989, Museum  
Purchase with funds provided by Carl Jacobs, 2002.71

### OBJECTIVE

Students will be able to demonstrate compositional skills with different types of media (computers, photographs, etc.).

Students will be able to demonstrate strong presentational skills for their final designs (three- to five-minute presentations).

Students will present work that demonstrates both conceptual and constructive thinking. (They must include specified criteria in the final design.)

Students will demonstrate mastery of geometric orientation, specifically perspective and angles.

### MATERIALS

If available: Adobe Photoshop (version 6.0 and above)  
glossy inkjet paper (minimum weight: 250 gsm)  
standard-size compact disc (spare discs preferably)  
standard-size compact disc jewel case  
color construction paper  
black-and-white photos (color if applicable)  
scissors  
tempera, acrylic, or watercolor paint  
rubber cement or Elmer's glue and ruler

### VOCABULARY

one-point perspective      convergence lines  
horizon line                vanishing point

### CONCEPT

Students will redesign an album: the cover, the disc, and promotional materials (such as a poster, magazine ad, etc.). The students are responsible of being their own bosses, while the “client” (teacher) is evaluating their progress.

The desired end result is for the students to not only produce original work, but also to incorporate one-point perspective in their final design. By incorporating perspective techniques, the students are able to combine art and math in the completed design pieces.

### ARTIST BACKGROUND

Michael Wilson has been one of Cincinnati's premiere photographers for nearly three decades. He has produced work for B.B. King, Emylou Harris, Aaron Neville, Lyle Lovett, John Hiatt, Rodney Crowell, The Muffs, and fellow Cincinnatians Over-the-Rhine. He began studying photography in college in the 1970s, an interest derived from the artists “love of pictures.” By the mid-1980s, Wilson had a book of his photographs and writings published, entitled *Heads Bowed Eyes Closed, No One Looking Around*.

Wilson became a full-time freelance photographer in 1987, and his work began to gain recognition in the music industry. Over the past two decades, his fan base has grown and includes many local Cincinnatians and famous musicians. True to his roots, Wilson currently resides in Cincinnati, where he is still documenting this fine city through the lens of his camera.

### PROCEDURE

1. Students choose a particular album cover to redesign, (Their choice must be approved by the teacher and must not contain inappropriate material.)
2. Students will make a template on an 8.5 x 11 inch sheet of paper for both the album cover and the compact disc. In Photoshop, the template is simply two 5 x 5 inch, outlined white squares placed next to one another.
3. Students create a background (with paint, pencil, markers, or any Photoshop tools) that shows one-point perspective. Good examples of one-point perspective include highways, sunsets on the beach, most panoramic pictures, and landscapes of mountain ranges.
4. The work that is done for the cover of the album must be consistent with the work that is done on the compact disc.

# CLASS EXPERIENCE

5. Students can either choose an existing photograph to manipulate or create their own images.
6. The desired photos/images are cut and pasted onto the corresponding templates. \*It is important that the photos are arranged by definition of any/all convergence lines.
7. A wash paint (paint mixed with water) is applied to the photos. (Colors are determined by the students). In Photoshop, use Image/Enhance options to adjust color settings. \*Encourage the students to use two or three contrasting colors
8. The students then cut and paste the type they want to use.
9. Students are to repeat steps three through eight (preferably using the same images/drawings/colors).
10. The final project should include an front and back for the album cover, a CD design, and a promotional ad or poster (8.5 x 11 inches).

## CRITICAL THINKING QUESTIONS

- How do photographs tell the story or concept of an album?
- How can mathematical principals, specifically geometric angles, be used in conjunction with artistic-related principals/elements (composition, space, color, shapes, etc.)?
- What constitutes a successful album cover design (considering shape, color, type, information, illustration, image manipulation, and logos)?

## ART & MATH CONNECTION

This lesson serves to bridge the gap between the visual and the mathematical. One-point perspective allows students to work within specific geometric orientations, as defined by both convergence lines and a vanishing point.

## ASSESSMENT

Student work will be given full credit for completion of the following:

- a CD design
- a front cover of a CD case (5 x 5 inch)
- a back cover of a CD case (5 x 5 inch)
- an 8.5 x 11 inch promotional poster or ad design

Completion of these four, plus the following:

Final design must incorporate one-point perspective

All photography work used must be authentic (so that the work isn't simply cut-and-paste together).

Finally, each student will present his or her work as part of a five-minute presentation. \*Also, they will include a one-page typed synopsis of their work when the final design is presented.

## NATIONAL STANDARDS

### VISUAL ARTS

Standard 1: Understanding and applying media, techniques, and processes

Standard 6: Making connections between visual arts and other disciplines

### MATH

Standard 5: Understands and applies basic and advanced properties of the concepts of geometry