LESSON 1: Surrealism Photoshop Collage

GRADES: 11-12

MAIN EDUCATIONAL OBJECTIVE:

Students will learn about the history and artists of the surrealism movement through computer graphics. Students will apply internet research & bookmarking skills, identification, comparison, and apply surrealism elements to their own digital collage. They will also learn how to navigate Photoshop, an image editing program.

MATERIALS:

• magazines, photos
• computer: internet, scanner, Photoshop, school blog

PROCESS:

1. Have students log into their school blog account and write a brief paragraph describing situations in life that felt surreal and define the term surreal (the events of 9-11-01 can be used for comparison).
2. Answer questions and provide examples of surrealism art by using the Internet to look up artist, paintings and information.
3. Four main elements of surrealism are addressed: levitation, transformation, scale change and juxtaposition.
4. Students scan in photos from magazines or save images found on the Internet (and bookmark websites) to create a surrealism collage using Photoshop. The four elements have to be evident in the final collage.
5. Students learn how to use layers, layer masks, lighting effects, selection tools, filters, transparent color, transparent layers, and image sizing. The collage has to appear as realistic as possible while being surreal too.
6. When students finish with the collage they save a jpeg for the web. Then upload jpeg to their blog and write a paragraph explaining how each surrealism element was applied to the final project. Copy link to class page so teacher and other students can view and comment on other student work.

ISTE NETS STANDARDS FOR STUDENTS:

1. Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products using technology. Students:
   a. apply existing knowledge to generate new ideas, products, or processes.
   b. create original works as a means of personal or group expression.
   c. use models and simulations to explore complex systems and issues.
2. Communication and Collaboration: Students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others. Students:
   a. interact, collaborate, and publish with peers, experts, or others employing a variety of digital environments and media.
   b. communicate information and ideas effectively to multiple audiences using a variety of media and formats.
3. Research and Information Retrieval: Students apply digital tools to gather, evaluate, and use information. Students:
   b. locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media.
   c. evaluate and select information sources and digital tools based on the appropriateness to specific tasks.
4. Critical Thinking and Problem Solving: Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
   b. plan and manage activities to develop a solution or complete a project.
5. Digital Citizenship: Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior. Students:
   a. advocate and practice safe, legal, and responsible use of information and technology.
   b. exhibit a positive attitude toward using technology that supports collaboration, learning, and productivity.
   c. demonstrate personal responsibility for lifelong learning.
6. **Technology Operations and Concepts**: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
   a. understand and use technology systems.
   b. select and use applications effectively and productively.
   d. transfer current knowledge to learning of new technologies.

**RESOURCE**: this plan adapted from original found at: http://www.artsonia.com/teachers/lessonplans/plan.asp?id=275

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**LESSON 2: Techno-Pointillism**

**GRADES**: 9-10

**MAIN EDUCATIONAL OBJECTIVE:**

Students will:

- **research** and discuss the art of Seurat and pointillism
- **use technology** to **create a digitally produced piece of pointillism**

**MATERIALS:**

- internet and library books
- Photoshop and color printer
- random items for still-life

**PROCESS:**

1. **Research** using internet and/or library books and discuss Seurat and pointillism.
2. Create a still life display for subject.
3. **Use Photoshop's filters** (like Fresco) to allow for digital textured “paper” type. May choose “canvas” option and spray paint to obtain the desired effect.
4. **Render** the picture using the selected technique being sure to incorporate the ideals of pointillism into the piece.
5. Save completed piece.
6. **Crop, print**, and mat finished piece.

**ISTE NETS STANDARDS FOR STUDENTS:**

1. **Creativity and Innovation**: Students demonstrate creative thinking, construct knowledge, and develop innovative products using technology. Students:
   a. apply existing knowledge to generate new ideas, products, or processes.

2. **Communication and Collaboration**: Students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others. Students:
   b. communicate information and ideas effectively to multiple audiences using a variety of media and formats.

3. **Research and Information Retrieval**: Students apply digital tools to gather, evaluate, and use information. Students:
   b. locate, organize, analyze, evaluate, synthesize, and ethically use information from a variety of sources and media.
   c. evaluate and select information sources and digital tools based on the appropriateness to specific tasks.

5. **Digital Citizenship**: Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior. Students:
   a. advocate and practice safe, legal, and responsible use of information and technology.

6. **Technology Operations and Concepts**: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
   a. understand and use technology systems.
   b. select and use applications effectively and productively.
   d. transfer current knowledge to learning of new technologies.

**RESOURCE**: this plan adapted from original found at: http://www.artsonia.com/teachers/lessonplans/plan.asp?id=114
LESSON 3: Self Pop Art in the Style of Andy Warhol

GRADES: 11-12

MAIN EDUCATIONAL OBJECTIVES:

Students will:

• learn about Pop Artist, Andy Warhol
• learn how to manipulate photos using different tools in Photoshop
• create images that resemble the manner of Andy Warhol
• learn about the expressive qualities of color
• understand the visual arts in relation to history and cultures

MOTIVATIONAL RESOURCE:

Students will be shown Andy Warhol’s “Marilyn Monroe” and other famous silkscreen prints in a digital presentation as well as the teacher's digital self-sample of the project.

MATERIALS:

• students wearing funky hats
• Photoshop, digital camera (with USB plug or card reader), and color printer

PROCESS:

1. Preparation
Students asked to bring in a NON-BLACK/BROWN hat of any sort for this project ahead of time.

2. Show Digital Presentation
Include examples of Andy Warhol’s famous 1967 silkscreen prints of Marilyn Monroe and other prints. Also show teacher’s sample of self-photo manipulation in the style of Andy’s photo silk-screening prints.

3. Using Digital Camera & Create Photo Color Manipulations using Photoshop

• Have toolbar, color, and layers palettes in view.
• Have students snap their own photos using a digicam or built-in cameras on the computer. Upload picture to computer using USB plug or card reader and save as a .jpg in CMYK mode @ 300 dpi. Crop photos to include hat (full or partial) and just below the chin.

• Using various Photoshop Tools:
  • Select person out of the background, then copy and paste on top of original. Rename: “Layer 1.” Double click Bkgd layer and name “BG 1” and fill with a color.
  • Save new file as a Photoshop file.
  • Next, enlarge canvas to 210% both horizontally & vertically.
  • Link layers 1 & BG 1.
  • Move layers to top left using black arrow tool. Hold down Opt key- notice arrow change. Hold Opt & Shift key and slide a copy to right quadrant. Rename Layers 2 & BG 2.
  • Repeat until 4 quadrants are filled and named accordingly.
  • Using Layer menu: Adjustment Layers & Hue/Saturation and the lasso tool lead students through the process of how to digitally manipulate their photos in different intensities of color and saturation.
  • Start by fixing a color for each layer’s “BG,” then change entire photo layer.
  • Once a base color is chosen for each layer, students can go back into each photo and begin to change sections of each photo by masking parts in the adjustments layers and creating a separate adj. layer for the hat, hair, teeth, etc.
  • To mask part of a photo, select section with lasso tool, then click on the mask (the white box on the Hue/Saturation layer (or other adjustment layer) and fill with black.

4. Review and Print
Review project with each student on screen, have them make any advised changes, then print in color.

ISTE NETS STANDARDS FOR STUDENTS:

1. Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products using technology. Students:
   b. create original works as a means of personal or group expression.

5. Digital Citizenship: Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior. Students:
   a. advocate and practice safe, legal, and responsible use of information and technology.
   c. demonstrate personal responsibility for lifelong learning.
6. **Technology Operations and Concepts:** Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
   a. understand and use technology systems.
   b. select and use applications effectively and productively.
   c. transfer current knowledge to learning of new technologies.

**RESOURCES:** this plan adapted from an activities found at:
http://edu.warhol.org/aract_comport.html
http://edu.warhol.org/20c_ppt.html

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**LESSON 4: Logo Design**

**MAIN EDUCATIONAL OBJECTIVES:**
At the completion of the project, students will have developed the following skills:

**Project management skills**
- Planning and creating a logo
- Managing and organizing graphics elements and illustrations

**Design skills**
- Understanding and employing design principles
- Understanding and employing color theory
- Identifying the difference in color modes
- Understanding color management
- Sketching
- Creating and editing graphical elements and illustrations
- Designing for a specific audience and purpose

**Research and communication skills**
- Investigating logos
- Critiquing designs
- Communicating purpose and goal and presenting design decisions
- Giving feedback on a project

**Photoshop Technical skills**
- Using guides and rulers, and swatches
- Understanding vector and bitmap graphics
- Drawing and modifying lines & shapes
- Adding text to images
- Outputting for web, print, & video

**MATERIALS:**
- Adobe Photoshop CS3 Extended and Visual Quick Start Guide
- Presentation: Introduction to Graphic Design
- Worksheet: Design Principles
- Worksheet: Review and Redesign of Logos
- Photoshop Guide: How to Create a New Document
- Photoshop Guide: How to Use Drawing Tools
- Photoshop Guide: How to Draw Shapes
- Guide: Bitmap and Vector Images
- Photoshop Guide: How to Add Text To Images
- Photoshop Guide: How to Generate Different File Formats

**PROCESS:**

**Color Theory and Design** (Suggested time: 50–75 minutes)
1. Tell students they will be creating a logo they can use as an identifying element for themselves, for a fictional organization, or for a school group. Explain the goals of this project:
   - Explore color theory and design principles
   - Investigate selection, drawing, and painting tools in Adobe Photoshop CS3 Extended
   - Understand and incorporate image-optimization strategies and file formats
• Identify aspects of redesign and its importance in the design process

2. Show students examples of print-, web-, and video-based logos and discuss with students the types of design principles used in these logos. Have students use the design principles worksheet to define design principles. As you introduce each principle, allow students time to fill in their worksheets. At the conclusion of the discussion, select a few students to share their documents and explain why the logo they chose represents a particular design principle.

   Show Presentation: Introduction to Graphic Design
   Worksheet: Design Principles

3. Show students examples of print-, web-, and video-based logos and ask them to identify visual cues and design principles that help the logos stick in their minds. Discuss how these logos are appropriate for the organizations they represent. Discuss how the designs reach the organization’s target audience and meet the goals of the company or individual.

4. As students begin to think about their logos, explain that they will select the colors, layout, and elements that will bring their logos to life. Some principles to cover include:
   • Brightness: The quantity of light reaching the viewer’s eye
   • Contrast and the color wheel
   • Using color in design
   • The differences between RGB and CMYK

6. Instruct students to select the person, group, or organization they will create their logo for and brainstorm a set of words and goals that best describe that person, group, or organization. Have students determine design principles they can use to evoke descriptive words as they sketch concepts for this logo on paper. Explain that they can incorporate any images from Project 1. Have students record their initial goals in the review and redesign worksheet.

   Worksheet: Review and redesign of logos

Constructing the Logo (Suggested time: 100–150 minutes)

7. Discuss possible canvas sizes for logos. Typical sizes are 79 x 51 pixels (very small), 150 x 25 pixels, 125 x 144 pixels, and 243 x 103 pixels. Introduce how to create a new document in Photoshop and explain the options they can alter, including:
   • Document size
   • Resolution
   • Color mode (CMYK, RGB, grayscale, and so on)
   • Background color

   Use Photoshop Guide: How to Create a New Document

8. Introduce how to use guides and rulers in Photoshop.
9. Introduce drawing and image-editing tools such as the Line, Shape, Eraser, and Paint tools. Discuss the differences between vector and bitmap graphics.

   Photoshop guide: How to use drawing tools
   Photoshop guide: How to draw shapes
   Guide: Bitmap and vector images

10. Introduce text-effect tools such as Bevel and Emboss.

   Photoshop guide: How to add text to images

11. Allow students time to build their logos.

Review and Redesign (Suggested time: 20–30 minutes)

12. Through a class discussion, define review and redesign. Explore what redesign means for student work and why it might be a useful step in the overall design process. Develop class definitions and discuss possible steps or questions that will help in redesigning a product. Some possible categories for review include:
   • Meeting initial focus, purpose, and audience
   • Changing focus, purpose, or audience
   • Applying good design principles

13. Have students individually review their own logos against their initial goals and intended design principles.

   Worksheet: Review and redesign of logos

14. After the review, allow students time to redesign their logos if needed.
Optimizing and finalizing images (Suggested time: 50–100 minutes)
15. Explain to students that they need to prepare multiple versions of their logos for use in color and in black-and-white printed documents, as well as for use on the web and in videos. Discuss image optimization and the importance of file formats. Discussion topics might include:
   - The difference between printed and on-screen images (inches versus pixels, size variation, scaling versus resampling, and ink dots versus RGB values)
   - File formats (such as GIF, JPEG, TIFF, EPS, and PDF)
   - Image resolution (such as pixels versus inches; ppi and dpi for printing, pixels for the web, and line screen frequency for commercial printing)
   - Preserving image quality when manipulating images
   - Broadcast standards for video (such as NTSC and HDTV) to help select the appropriate TV image preset
   - Avoiding thin lines (thinner than 2 pixels) because interlacing can create flicker when the image is displayed in video
   - Using the NTSC Colors filter when working with color for video use because saturated or bright colors can cause bleeding when displayed in video

Note: In discussing file formats, it may be helpful to identify the best file formats for the web (JPG, GIF, PNG), for photos (PSD, TIFF, JPEG, PDF, DICOM, large document format), for commercial printing (TIFF, EPS, PDF, PSD, DCS), for video (PSD, TGA, PICT), and for PowerPoint/Word (PNG).

Photoshop guide: How to generate different file formats (from Project 1)

16. Allow students time to prepare their logos for web, print, and video.

Presenting Their Work (Suggested time: 50–100 minutes)
17. Explain that each student will present three logos to the class and include the following in their presentation:
   - Their design decisions in creating each logo and their rationale for preparing the images for each medium (web, print, video), including the file type, size, and resolution for each version and situation.
   - Explanations of any changes they made during the review and redesign stage.
   - What they learned in the project and what they want to learn next.

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   c. evaluate and select information sources and digital tools based on the appropriateness to specific tasks.
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   b. plan and manage activities to develop a solution or complete a project.
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6. Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
   a. understand and use technology systems.
   b. select and use applications effectively and productively.

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LESSON 5: Creating Impressionist Art

GRADES: 3-9

TIMING: 2–3 class periods

LESSON DESCRIPTION:
When learning about genres, whether literary, artistic, musical, or anything else, students build understanding of the concepts on a deeper level when they have to employ the genre in creating their project. Students interpret the genre and then analyze, visualize, and communicate that genre in their own work. Impressionism is an important genre in the study of art. Impressionism was about light, surface, color, and capturing fast-fleeting moments. By exploring the impact of photography, the then new technology, students can better understand impressionism.

MAIN EDUCATIONAL OBJECTIVES:
Students will illustrate their understanding of impressionist-era work by taking photographs around the school and then working with lighting, surface, color, and movement to turn them into impressionist works of art. You can also employ this method of genre interpretation with other genres in art, music, or literature. Students will:
• Recognize and appreciate the style of impressionist art
• Understand the role photography had on impressionist artists
• Demonstrate how to create a piece of impressionist art in Photoshop Elements

LESSON MATERIALS
• Adobe Photoshop Elements 7
• Digital camera (or use books/magazines and a scanner)

PROCESS:
Introduce the Project
1. Introduce students to the impressionist project. Explain to students that they will take photographs of scenes around the school and then turn these photographs into impressionist art by using filters in Photoshop Elements.
2. Conduct a class discussion about the history of impressionism:
   • The characteristics that make a piece of art impressionistic
   • The political, social, economic, and cultural climate when during the impressionist period
   • The major figures of impressionism
   • The impact of photographic technology on impressionist painters

   Note: You can also make Step 2 a group activity. Place students in groups of four and have members research and report back to their groups on what they learned. Then ask the groups to share their research with the class.

Take Pictures
3. Give students a digital camera and let them shoot whatever subject they would like. Briefly demonstrate or talk about good techniques for taking photographs as included in the guides below.
   Digital photography guide: Introduction to digital photography
   Digital photography guide: Digital photography tips
   Digital photography guide: Digital photography workflow
4. Reinforce the concepts of asymmetrical composition, lighting, and color. If you have time, let students shoot the same subject at different times of day.

   Note: If you do not have access to a digital camera, have students bring in pictures from a book or magazine to scan, or use an image from your library.

Create Impressionist Art
5. Have students open their image(s) in Photoshop Elements. Have students save the images in the Photoshop Elements format so they have a copy to work with while saving the original to use again if needed.
6. Demonstrate how to change brush sizes and apply filters. Start students off by letting them experiment with the brush size, sharpness, and brush type settings. Other artistic filters that offer impressionistic qualities include dry brush, smudge stick, and palette knife. Encourage experimentation and show students how they can undo filters they have applied or changes they have made. Have students save multiple copies and variations.
   Photoshop Elements guides: How to quickly enhance a photo
   Photoshop Elements guides: How to rotate, level, crop, and size images
   Photoshop Elements guides: How to apply filters

Print and Share
7. Have students choose their favorite pieces, if they created a few, and print them out on individual pages. If you do not
have access to a color printer, use the PDF Slideshow feature to show student work as a slide show in Adobe Acrobat 9 Professional. Have students present and describe their art to the rest of the class. Encourage the students to answer the following questions during their presentations:

- In what way is your artwork in the style of the impressionist painters?
- How would you describe the composition of your artwork?
- What colors and hues predominate in your artwork?
- Would those colors change if you shot your image earlier or later in the day?
- How did photography influence the impressionist painters?

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   - a. apply existing knowledge to generate new ideas, products, or processes.
   - b. create original works as a means of personal or group expression.
   - c. use models and simulations to explore complex systems and issues.

4. **Critical Thinking and Problem Solving:** Students use critical thinking skills to plan and conduct research, manage projects, solve problems and make informed decisions using appropriate digital tools and resources. Students:
   - b. plan and manage activities to develop a solution or complete a project.
   - d. use multiple processes and diverse perspectives to explore alternative solutions.

5. **Digital Citizenship:** Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior. Students:
   - a. advocate and practice safe, legal, and responsible use of information and technology.

6. **Technology Operations and Concepts:** Students demonstrate a sound understanding of technology concepts, systems and operations. Students:
   - a. understand and use technology systems.
   - b. select and use applications effectively and productively.

**RESOURCE:** http://www.adobe.com/education/resources/k12/instructional/art_design.html

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