Great Oaks Digital Art and Design
Essential Skills Profile

This profile provides an outline of the skills required for successful completion of this career program. Additional information is located on the Great Oaks website at http://hs.greatoaks.com/essential-skills-high-school-programs/ and selecting the corresponding career program.

Recommended Work Keys Scores for Digital Arts and Design

Applied Mathematics-5	Locating Information-4
Reading for Information-4	

*Practice tests and more information at www.act.org/workkeys

Essential Skills Needed to Successfully Complete the Program			
Rating Key:	**Low = Slightly Essential**	**Medium = Essential**	**High = Very Essential**

Key Vocational Factors		Rating
Visual Acuity	The ability to detect differences/details visually	High
Depth Perception	The ability to detect the physical distance/depth of objects in space and time	High
Oral Communication	The ability to express/explain ideas.	Medium
Perceptual Speed	Ability to quickly and accurately compare similarities and differences among numbers, objects, pictures, or patterns	High
Written Communication	The ability to communicate in a written format and record information accurately	Medium
Physical Mobility/Strength	Sitting for extended times and use of computers, screens, and monitors for extended time	High
Eye-hand Coordination	The ability to use tools	High
Auditory Acuity	The ability to detect differences in pitch and sound	Low
Reasoning Skills	Deductive : ability to apply general rules to specific problems and Inductive: ability to combine pieces of information to form conclusions among seemingly unrelated events	High

Worker Trait Skills	Rating
Ability to accept constructive criticism and feedback	High
Ability to apply creative thinking to solve design problems	High
Ability to get along with others	High
Ability to work independently, without close supervision	High
Ability to work toward work including tasks of minimal interest	Medium
Ability to work accurately, recheck and correct work, to an industry standard	High
Ability to follow and retain:	
Multi step oral instructions	Medium
Written instructions/technical manuals-multi step	Medium
Simple to complex diagram instructions	High

Visual models or demonstrated instructions	High
Ability to use tools of trade (tablet computers, personal computers, notebook computers, laser printers, desktop computers, advanced calculators, etc.)	High
Ability to use numerical data (count, measure, compute, etc.) in applied setting	High
Ability to discriminate between objects of similar:	
Size	High
Shape	High
Color	High
Spatial relationship	High
Labels/clerical perception	High
Ability to organize work process/follow defined procedures	Medium
Ability to follow sequence or to determine sequence of actions to a successful conclusion	High
Ability to understand complex concepts related to the career field of interest (Ex: Military time)	Medium
Critical Thinking: Using logic and reasoning to identify the strengths and weaknesses of alternative solutions, conclusions or approaches to problems.	High
Speaking: Talking to others to convey information effectively	High
Active Listening: Giving full attention to what other people are saying, taking time to understand the points being made, asking questions as appropriate, and not interrupting at inappropriate times.	High

Reading Skills * See Work Keys Above	
Math Skills *See Work Keys Above	
Counting-Recording-Comparing-Calculating	Whole numbers
Calculating Fractions, ratios	Ratio, Formulas

Additional Abilities Required

Originality	The ability to come up with unusual or clever ideas about a given topic or situation, or to develop creative ways to solve a problem.
Near Vision	The ability to see details at close range (within a few feet of the observer).
Fluency of Ideas	The ability to come up with a number of ideas about a topic (the number of ideas is important, not their quality, correctness, or creativity).

Knowledge Required in Digital Arts and Design Field

Design	Knowledge of design techniques, tools, and principles involved in production of precision technical plans, blueprints, drawings, and models.
Communications and Media	Knowledge of media production, communication, and dissemination techniques and methods. This includes alternative ways to inform and entertain via written, oral, and visual media.

English Language	Knowledge of the structure and content of the English language including the meaning and spelling of words, rules of composition, and grammar.

Additional Considerations

Must like math and science	Must like computers
Must like critical thinking and troubleshooting	Visual barriers may impede progress
Must like to design in non-preferred areas	

Digital Arts and Design Work Activities

Determine size and arrangement of illustrative material and copy, and select style and size of type.	Create designs, concepts, and sample layouts, based on knowledge of layout principles and esthetic design concepts.
Confer with clients to discuss and determine layout design.	Use computer software to generate new images.
Develop graphics and layouts for product illustrations, company logos, and Web sites.	Prepare illustrations or rough sketches of material, discussing them with clients or supervisors and making necessary changes.
Review final layouts and suggest improvements as needed.	Maintain archive of images, photos, or previous work products.
Draw and print charts, graphs, illustrations, and other artwork, using computer.	Key information into computer equipment to create layouts for client or supervisor.
Research new software or design concepts.	Mark up, paste, and assemble final layouts to prepare layouts for printer.
Study illustrations and photographs to plan presentation of materials, products, or services.	Prepare notes and instructions for workers who assemble and prepare final layouts for printing
Produce still and animated graphics for on-air and taped portions of television news broadcasts, using electronic video equipment.	Photograph layouts, using camera, to make layout prints for supervisors or clients.
Design, build, or maintain Web sites, using authoring or scripting languages, content creation tools, management tools, and digital media.	Incorporate technical considerations into Web site design plans, such as budgets, equipment, performance requirements, or legal issues including accessibility and privacy.

Develop and document style guidelines for web site content.	Develop web site maps, application models, image templates, or page templates that meet project goals, user needs, or industry standards.
Prepare sketches of ideas, detailed drawings, illustrations, artwork, or blueprints, using drafting instruments, paints and brushes, or computer-aided design equipment.	Modify and refine designs, using working models, to conform with customer specifications, production limitations, or changes in design trends.
Design graphic material for use as ornamentation, illustration, or advertising on manufactured materials and packaging or containers.	Read publications, attend showings, and study competing products and design styles and motifs to obtain perspective and generate design concepts
Evaluate feasibility of design ideas, based on factors such as appearance, safety, function, serviceability, budget, production costs/methods, and market characteristics.	Present designs and reports to customers or design committees for approval and discuss need for modification.
Design complex graphics and animation, using independent judgment, creativity, and computer equipment.	Make objects or characters appear lifelike by manipulating light, color, texture, shadow, and transparency, or manipulating static images to give the illusion of motion.
Participate in design and production of multimedia campaigns, handling budgeting and scheduling, and assisting with such responsibilities as production coordination, background design, and progress tracking.	Create basic designs, drawings, and illustrations for product labels, cartons, direct mail, or television.
Develop briefings, brochures, multimedia presentations, web pages, promotional products, technical illustrations, and computer artwork for use in products, technical manuals, literature, newsletters, and slide shows.	Convert real objects to animated objects through modeling, using techniques such as optical scanning.

Technology

Graphics or photo imaging software	Video creation and editing software
Desktop publishing software	

Available Certifications

Adobe Certified Associate (ACA) (4 Points)	Photoshop, Animate, Premiere Pro (4 Points), Dreamweaver (4 Points), InDesign (4 Points), Illustrator (4 Points)

CPR/First Aid Certification (1 Point)	

Possible College Credits

College Credit Plus in English, Math, Social Studies, or Science	Must be preapproved. Must pass a college course at an Ohio college or College Credit Plus class at Great Oaks.
Articulated Credit	Great Oaks has agreements with certain colleges that may give you credits for a specific degree. Possible agreements are: • Cincinnati State Technical and Community College (Graphic Design, up to 9 credit hours possible) • Miami University-Hamilton (Multimedia Fundamentals, up to 3 credit hours possible) • Wright state University lake Campus (Graphic Design and Visual Media, up to 9 credit hours possible) • Chatfield College (Liberal Arts, up to 3 credit hours possible)
Career Technical Credit Transfer	The Ohio Transfer to Degree Guarantee helps career and technical students transfer credits earned in high school to community college or four-year degree programs. The credit can be used at any Ohio public college or university: • If you successfully completed your Career-Technical program and passed certain required assessments. • If you attend a similar program at a public Ohio college or university.

*Additional college or post-secondary education may be required in this field

Possible Career Pathways

Production designer	Graphic designer
Web designer	Animator
Video producer/editor	