Digital Illustration Occupations
Labor Market Information Report
Cabrillo College

Prepared by the San Francisco Bay Center of Excellence for Labor Market Research
November 2021

Recommendation

Based on all available data, there appears to be an "undersupply" of Digital Illustration workers compared to the demand for this cluster of occupations in the Bay region and in the SC-Monterey sub-region (Monterey, San Benito, Santa Cruz counties). There is a projected annual gap of about 1,127 students in the Bay region and 147 students in the SC-Monterey Sub-Region.

Introduction

This report provides student outcomes data on employment and earnings for TOP 0614.00 Digital Media programs in the state and region. It is recommended that these data be reviewed to better understand how outcomes for students taking courses on this TOP code compare to potentially similar programs at colleges in the state and region, as well as to outcomes across all CTE programs at Cabrillo College and in the region.

This report profiles Digital Illustration Occupations in the 12 county Bay region and in the SC-Monterey sub-region for a proposed new program at Cabrillo College.

- **Artists and Related Workers, All Other (27-1019):** All artists and related workers not listed separately.
  Entry-Level Educational Requirement: No formal educational credential
  Training Requirement: Long-term on-the-job training
  Percentage of Community College Award Holders or Some Postsecondary Coursework: 26%

- **Graphic Designers (27-1024):** Design or create graphics to meet specific commercial or promotional needs, such as packaging, displays, or logos. May use a variety of mediums to achieve artistic or decorative effects.
  Entry-Level Educational Requirement: Bachelor's degree
  Training Requirement: None
  Percentage of Community College Award Holders or Some Postsecondary Coursework: 26%

Occupational Demand

Table 1. Employment Outlook for Digital Illustration Occupations in Bay Region

Occupation	2020 Jobs	2025 Jobs	5-yr Change	5-yr % Change	5-yr Total Openings	Annual Openings	25% Hourly Earning	Median Hourly Wage
Artists and Related Workers, All Other	676	638	-38	-6%	377	75	$12	$55
Graphic Designers	10,422	10,460	38	0%	5,715	1,143	$26	$60
Total	**11,098**	**11,098**	**0**	**0%**	**6,092**	**1,218**		

Source: EMSI 2021.3

Bay Region includes: Alameda, Contra Costa, Marin, Monterey, Napa, San Benito, San Francisco, San Mateo, Santa Clara, Santa Cruz, Solano and Sonoma Counties

Table 2. Employment Outlook for Digital Illustration Occupations in SC-Monterey Sub-region

Occupation	2020 Jobs	2025 Jobs	5-yr Change	5-yr % Change	5-yr Total Openings	Annual Openings	25% Hourly Earning	Median Hourly Wage
Artists and Related Workers, All Other	78	72	-5	-8%	43	9	$11	$55
Graphic Designers	1,325	1,356	31	2%	758	152	$26	$61
Total	**1,403**	**1,428**	**25**	**2%**	**801**	**161**		

Source: EMSI 2021.3

SC-Monterey Sub-Region includes: Monterey, San Benito, Santa Cruz Counties

Job Postings in Bay Region and SC-Monterey Sub-Region
Table 3. Number of Job Postings by Occupation for latest 12 months (Oct 2020 - Sep 2021)

Occupation	Bay Region	SC-Monterey
Graphic Designers	2,825	59
Artists and Related Workers, All Other	3	0

Source: Burning Glass

Table 4a. Top Job Titles for Digital Illustration Occupations for latest 12 months (Oct 2020 - Sep 2021) Bay Region

Title	Bay	Title	Bay
Graphic Designer	487	Junior Graphic Designer	23
Visual Designer	191	Graphic Designer III	22
Senior Graphic Designer	77	Visual Designer II	18
Ux/Visual Designer III	69	Associate Graphic Designer	16
Production Artist	63	Asic Digital Design Engineer	15
Production Designer	63	Digital Production Artist	15
Ux/Visual Designer II	57	Graphic Designer II	15
Senior Visual Designer	54	Graphic Designer Manager	14
Ux/Visual Designer	27	Design Specialist	13

Source: Burning Glass

Table 4b. Top Job Titles for Digital Illustration Occupations for latest 12 months (Oct 2020 - Sep 2021) SC-Monterey Sub-Region

Title	SC-Monterey	Title	SC-Monterey
Graphic Designer	12	Production Designer	2
Senior Graphic Designer	5	Art And Graphic Design	1
Junior Graphic Designer	4	CTE/Photo & Graphic Design Teacher	1
Ocean Sciences Marine Geology Graphic and Publication Specialist	3	Exhibit Developer	1
Production Artist	3	Freelance Photograher	1
Graphic Designer - Giro	2	Graphic Artist/Video Editor	1
Graphic Designer II	2	Graphic Design Teacher	1
Graphic Designer | Content Creator	2	Graphic Design/Print Associate	1
Printing/Shipping Assistant and Graphic Designer	2	Graphic Design Specialist-Deloittes Green Dot Agency	1

Source: Burning Glass

Industry Concentration

Table 5. Industries hiring Digital Illustration Workers in Bay Region

Industry – 6 Digit NAICS (No. American Industry Classification) Codes	Jobs in Industry (2020)	Jobs in Industry (2025)	% Change (2020-25)	% Occupation Group in Industry (2020)
Graphic Design Services	1,495	1,310	-12%	14%
Interior Design Services	1,283	1,305	2%	12%
Internet Publishing and Broadcasting and Web Search Portals	695	848	22%	6%
Software Publishers	383	487	27%	4%
Custom Computer Programming Services	359	435	21%	3%
Advertising Agencies	307	300	-2%	3%
Industrial Design Services	287	291	1%	3%
Other Specialized Design Services	268	266	-1%	2%
Electronic Shopping and Mail-Order Houses	214	234	9%	2%
Corporate, Subsidiary, and Regional Managing Offices	238	226	-5%	2%

Source: EMSI 2021.3

Table 6. Top Employers Posting Digital Illustration Occupations in Bay Region and SC-Monterey Sub-Region (Oct 2020 - Sep 2021)

Employer	Bay	Employer	SC-Monterey
Nsys Design Systems	52	Vista Outdoor	5
Gap Inc.	34	University Of California	4
Nvidia Corporation	24	Vista Outdoor Inc	3
Old Navy	22	Schipper Design	2
Cisco Systems Incorporated	22	Salinas Valley Memorial Hospital	2
Apple Inc.	21	Nine Dot	2
Williams-Sonoma	16	FedEx	2
Amyris, Inc	14	Deloitte	2
U.S. Bancorp	13	Universal Audio	1
Google Inc.	13	The Ginger People	1

Source: Burning Glass

Educational Supply

There are eight (8) community colleges in the Bay Region issuing 91 awards on average annually (last 3 years ending 2018-19) on TOP 0614.00 Digital Media. In the SC-Monterey Sub-Region, there is one (1) community college that issued 14 awards on average annually (last 3 years) on this TOP code.

Table 7. Community College Awards on TOP 0614.00 Digital Media in Bay Region

College	Subregion	Associate	Certificate Low	Total
Berkeley City	East Bay	0	2	2
Cabrillo	SC-Monterey	5	9	14
Gavilan	Silicon Valley	4	1	5
Las Positas	East Bay	5	3	8
Mission	Silicon Valley	0	1	1
San Francisco	Mid-Peninsula	0	31	31
San Mateo	Mid-Peninsula	15	10	25
West Valley	Silicon Valley	2	3	5
Total		**31**	**60**	**91**

Note: The annual average for awards is 2016-17 to 2018-19.

Gap Analysis

Based on the data included in this report, there is a large labor market gap in the Bay region with 1,218 annual openings for the Digital Illustration occupational cluster and 91 annual (3-year average) awards for an annual undersupply of 1,127 students. In the SC-Monterey Sub-Region, there is also a gap with 161 annual openings and 14 annual (3-year average) awards for an annual undersupply of 147 students.

Student Outcomes

Table 8. Four Employment Outcomes Metrics for Students Who Took Courses on TOP 0614.00 Digital Media

Metric Outcomes	Bay All CTE Programs	Cabrillo All CTE Programs	State 0614.00	Bay 0614.00	SC-Monterey 0614.00	Cabrillo 0614.00
Students with a Job Closely Related to Their Field of Study	73%	76%	55%	54%	64%	64%
Median Annual Earnings for SWP Exiting Students	$44,575	$39,206	$25,682	$29,351	$26,666	$29,409
Median Change in Earnings for SWP Exiting Students	30%	31%	27%	25%	41%	44%
Exiting Students Who Attained the Living Wage	53%	50%	31%	28%	28%	31%

Source: Launchboard Strong Workforce Program Median of 2016-18.

Skills, Certifications and Education

Table 9. Top Skills for Digital Illustration Occupations in Bay Region (Oct 2020 - Sep 2021)

Skill	Posting	Skill	Posting
Adobe Photoshop	1,845	Illustration	337
Graphic Design	1,676	Prototyping	309
Adobe Indesign	1,550	Interaction Design	261
Adobe Illustrator	1,382	Animation	260
Adobe Acrobat	1,209	Marketing Materials	247
Adobe Creative Suite	1,179	Art Direction	240
Visual Design	981	Scheduling	207
Typesetting	923	Product Design	203
Social Media	513	Infographics	195
Web Site Design	491	Photography	185
Digital Design	422	Design Software	182
Project Management	384	User Interface (UI) Design	180
Adobe Aftereffects	356	Process Design	177

Skill	Posting	Skill	Posting
Packaging	343	Budgeting	175

Source: Burning Glass

Table 10. Certifications for Digital Illustration Occupations in Bay Region (Oct 2020 - Sep 2021)

Certification	Posting	Certification	Posting
Driver's License	41	Adobe Illustrator Certification	3
Drafting and Design	10	Series 7	2
Project Management Certification	9	LEED AP	2
Security Clearance	6	Contractors License	2
Project Management Professional (PMP)	4	Adobe Captivate Certification	2
Graphic Design Certification	4	Occupational Safety and Health Administration Certification	1
Certified Graphic Designer	4	Microsoft Certified Professional (MCP)	1
Leadership In Energy And Environmental Design (LEED) Certified	3	Mbe Certified	1
Certified in Adobe Photoshop	3	Makeup Artist	1
Advertising Design Certification	3	Interior Design Certification	1

Source: Burning Glass

Note: 97% of records have been excluded because they do not include a certification. As a result, the chart above may not be representative of the full sample.

Table 11. Education Requirements for Digital Illustration Occupations in Bay Region

Education (minimum advertised)	Latest 12 Mos. Postings	Percent 12 Mos. Postings
High school or vocational training	83	5%
Associate's degree	60	4%
Bachelor's degree	1,515	91%

Source: Burning Glass

Note: 41% of records have been excluded because they do not include a degree level. As a result, the chart above may not be representative of the full sample.

Methodology

Occupations for this report were identified by use of skills listed in O*Net descriptions and job descriptions in Burning Glass. Labor demand data is sourced from Economic Modeling Specialists International (EMSI) occupation data and Burning Glass job postings data. Educational supply and student outcomes data is retrieved from multiple sources, including CTE Launchboard and CCCCO Data Mart.

Sources

O*Net Online
Labor Insight/Jobs (Burning Glass)
Economic Modeling Specialists International (EMSI)
CTE LaunchBoard www.calpassplus.org/Launchboard/
Statewide CTE Outcomes Survey
Employment Development Department Unemployment Insurance Dataset
Living Insight Center for Community Economic Development
Chancellor's Office MIS system

Contacts

For more information, please contact:

• Leila Jamoosian, Research Analyst, for Bay Area Community College Consortium (BACCC) and Centers of Excellence (CoE), leila@baccc.net

• John Carrese, Director, San Francisco Bay Center of Excellence for Labor Market Research, jcarrese@ccsf.edu or (415) 267-6544