

Film Production

Inland Empire/Desert Region (Riverside and San Bernardino counties)

This workforce demand report uses state and federal job projection data developed before the economic impact of COVID-19. The COE is monitoring the situation and will provide more information as it becomes available. Please consult with local employers to understand their current employment needs.

Summary

- Community college film production programs provide the knowledge, skills, and abilities that prepare students for employment in two bachelor's degree-level occupations.
- These occupations are projected to have 72 annual job openings through 2025, increasing employment by 9%.
- The median hourly earnings for these occupations are between \$29.68 and \$34.15 per hour, above the regional \$24.36 per hour self-sustainable wage standard for a single adult with one child.
- Regional community colleges have issued an annual average of 43 awards in film production programs over the last three academic years. Other postsecondary education providers have issued 39 awards annually in programs related to film production.
- The COE does not recommend expanding film production programs. See the [recommendation section](#) for further detail.

Introduction

This report aims to quantify regional employment demand related to film production and documentary filmmaking. The California Community College Taxonomy of Program (TOP) manual does not provide a specific career education code for documentary filmmaking. The most closely associated career education program is the film production (TOP 0612.20) program. Film production programs prepare students for employment through instruction related to the communication of dramatic information, ideas, moods, and feelings through films and videos. These programs include film technology and equipment, directing, editing, planning, and management of film/video (Taxonomy of Programs, 2012). Demand for documentary filmmaking is provided through a search of online job advertisements over the previous 12 months.

The knowledge, skills, and abilities trained by film production programs lead to two distinct occupations that typically require a bachelor's degree to enter employment. These occupations are referred to as the film production occupational group in this report.

- Producers and Directors (SOC 27-2012)
- Film and Video Editors (27-4032)

Job Counts and Projections

In 2020, there were 700 film production jobs in the Inland Empire/Desert Region. Employment for the film production occupational group is projected to increase by 9% through 2025, with 72 job openings projected annually. Please note, these occupations are employed at all levels of stage, film, video, and media production. Traditional labor market data does not indicate the type of media production workers are engaging in. Exhibit 1 displays the job counts, five-year projected job growth, job openings, and the share of incumbent workers age 55 years and up in the region.

Exhibit 1: Five-year projections for the film production occupational group, 2020-2025, Inland Empire/Desert

Occupation	2020 Jobs	2025 Jobs	5-Yr % Change (New Jobs)	5-Yr Openings (New + Replacement Jobs)	Annual Openings (New + Replacement Jobs)	% of workers age 55+
Producers and Directors	494	518	5%	229	46	17%
Film and Video Editors	206	242	17%	130	26	9%
Total	700	760	9%	358	72	15%

Source: Emsi 2021.3

Exhibit 2 shows the number of job ads posted during the last 12 months and the statewide average time filling each occupation. Over the previous 12 months, there were 12 job ads for the film production occupational group in the region. The job advertisement search was expanded to the state level to ensure job ad information provided in this report is generalizable. Over the last 12 months, there were 2,956 job advertisements posted for the film production occupational group in the state. On average, employers in California fill online job advertisements for film production workers in 47 days.

Exhibit 2: Job ads and time to fill, California

Occupation	Job Ads	Statewide Average Time to Fill (Days)
Producers and Directors	2,546	48
Film and Video Editors	410	40
Total	2,956	47

Source: Burning Glass – Labor Insights

Approximately 2% (64 ads) of job advertisements in the state for the film production occupational group mentioned the keyword "documentary." MasterClass, an online education subscription platform, posted the most job advertisements for documentary film production workers in the state, posting seven job ads over the last 12 months. No job ads were found in the local region. The skills sought by employers seeking documentary film production workers do not differ from those sought by employers seeking traditional film

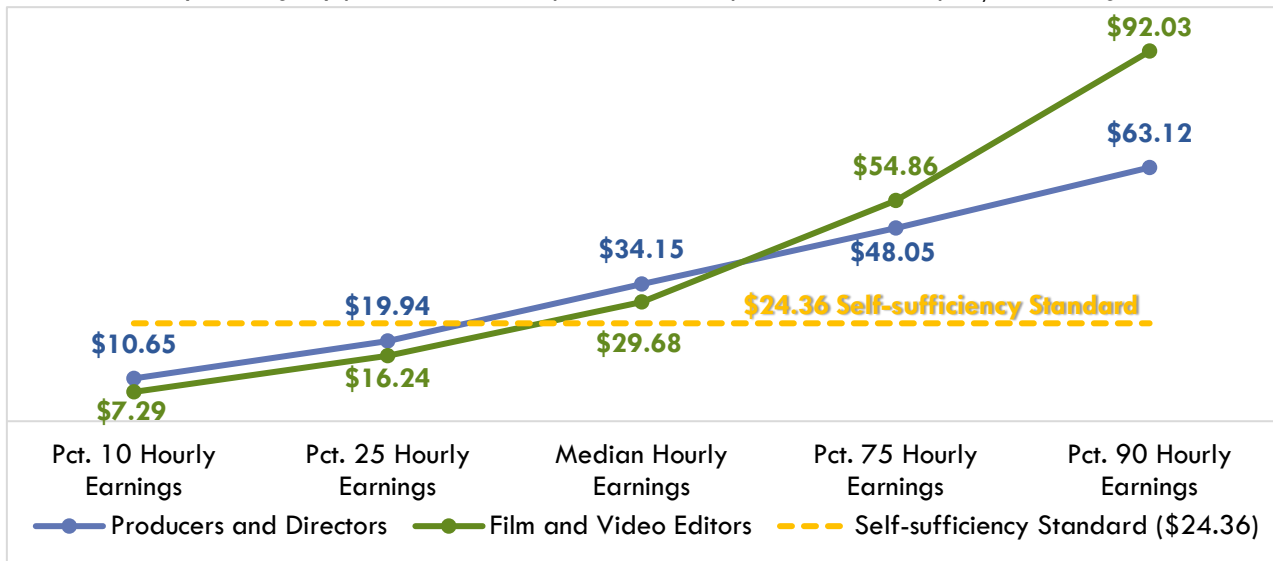
production workers. The online job advertisement search was reverted to all media production to provide generalizable earnings and in-demand skills results.

Earnings and Benefits

Community colleges should ensure their training programs lead to employment opportunities that provide self-sustainable income. The University of Washington estimates that a self-sufficient hourly rate for a single adult with one school-age child is \$24.36 per hour or \$51,452 annually in Riverside County; \$23.73 per hour or \$50,119 annually in San Bernardino County (Pearce, 2021). For this study, the higher hourly earnings requirement in Riverside County is adopted as the self-sufficiency standard for the two-county region.

Exhibit 3 displays the hourly earnings for the film production occupational group. The median hourly earnings for the film production occupational group surpass the regional self-sufficiency standard, indicating the top 50% of workers earn a self-sustainable wage.

Exhibit 3: Hourly earnings by percentile for film production occupations, Inland Empire/Desert Region



Source: Emsi 2021.3

Benefits information, typically provided by the California Labor Market Information Division's occupational guides, is not available for the film production occupational group (Detailed Occupational Guides, 2021).

Advertised Salary from Online Job Ads

Exhibit 4 displays online job ad salary data for the film production occupational group in California over the last 12 months. Online job ad salary information reveals that employers are willing to pay the film production occupational group between \$55,000 and \$69,000 annually, above the region's \$51,452 annual (\$24.36 hourly) self-sufficiency standard. Consider the salary information with caution since only 26% (770 out of

2,956) of online job postings for these occupations provided salary information. The salary figures are prorated to reflect full-time, annual wage status.

Exhibit 4: Advertised salary information, California

Occupations	Real-Time Salary Information					Average Annual Salary
	Number of job postings	Less than \$35,000	\$35,000 to \$49,999	\$50,000 to \$74,999	More than \$75,000	
Producers and Directors	548	5%	17%	46%	32%	\$69,000
Film and Video Editors	222	12%	38%	38%	12%	\$55,000

Source: Burning Glass – Labor Insights

Employers, Skills, Education, and Work Experience

Exhibit 5 displays the employers that posted the most job ads during the last 12 months in California.

Displaying employer names provides some insight into where students may find employment after completing a program. NBC posted the most job advertisements for the film production occupational group in the state.

Exhibit 5: Employers posting the most job ads for the film production occupational group, California

Occupation	Top Employers	
Producers and Directors (n=2,546)	<ul style="list-style-type: none"> NBC Nexstar Media Group, Inc. Disney 	<ul style="list-style-type: none"> Apple Amazon
Film and Video Editors (n=410)	<ul style="list-style-type: none"> NBC MasterClass 	<ul style="list-style-type: none"> ZOO Digital Sinclair Broadcast Group

Source: Burning Glass – Labor Insights

Exhibit 6 lists a sample of specialized, employability, and software and programming skills employers seek when looking for workers to fill positions in the film production occupational group. Specialized skills are occupation-specific skills that employers request for industry or job competency. Employability skills are foundational skills that transcend industries and occupations; this category is often referred to as "soft skills." The skills requested in job postings may be utilized to guide curriculum development.

Exhibit 6: Sample of in-demand skills from employer job ads, California

Occupation	Specialized skills	Employability skills	Software and Programming Skills
Producers and Directors (n=2,465)	<ul style="list-style-type: none"> Budgeting Scheduling Project Management Journalism 	<ul style="list-style-type: none"> Creativity Communication Skills Teamwork/Collaboration Organizational Skills 	<ul style="list-style-type: none"> Adobe Photoshop Microsoft Office Adobe InDesign Atlassian Jira

Occupation	Specialized skills	Employability skills	Software and Programming Skills
Film and Video Editors (n=397)	<ul style="list-style-type: none"> • Music • Color Editing • Video Production • Motion Graphics 	<ul style="list-style-type: none"> • Creativity • Teamwork/Collaboration • Detail-Oriented • Organizational Skills 	<ul style="list-style-type: none"> • Adobe Premiere • Adobe After Effects • Adobe Photoshop • Adobe InDesign

Source: Burning Glass – Labor Insights

Exhibit 7 displays the typical entry-level education, educational attainment, and minimum advertised education requirements for the film production occupational group. According to the Bureau of Labor Statistics, between 16%-19% of incumbent workers in this field hold a community college-level of educational attainment; "some college, no degree" and an "associate degree."

Exhibit 7: Typical entry-level education, educational attainment, and minimum advertised education requirements, California

Occupation	Typical Entry-Level Education Requirement	CC-Level Educational Attainment*	Real-Time Minimum Advertised Education Requirement			
			Number of Job Ads	High school or vocational training	Associate degree	Bachelor's degree or higher
Producers and Directors	Bachelor's degree	19%	1,418	8%	1%	91%
Film and Video Editors	Bachelor's degree	16%	199	19%	7%	74%

Source: Emsi 2021.3, Burning Glass – Labor Insights

*Percentage of incumbent workers with a Community College Award or Some Postsecondary Coursework

Exhibit 8 displays the work experience typically required to enter each occupation and the real-time work experience requirements from employer job ads.

Exhibit 8: Work experience required and real-time work experience requirements, California

Occupation	Work Experience Typically Required	Real-Time Work Experience			
		Number of job postings	0 – 2 years	3 – 5 years	6+ years
Producers and Directors	Less than 5 years	1,880	27%	55%	18%
Film and Video Editors	None	212	35%	51%	14%

Source: Emsi 2021.3, Burning Glass – Labor Insights

Programs Completions and Student Outcomes

Exhibit 9 displays student completions from film production (0612.20) programs over the last three academic years. Chaffey College has issued the most awards in film production programs over the previous three

academic years in the region. Program completion and student outcome methodologies can be found in the appendix.

Exhibit 9: 2017-20, Annual average community college awards for film production programs in the Inland Empire/Desert Region

TOP 0612.20 – Film Production	Associate Degree	Certificate requiring 18 to < 30-semester units	Certificate requiring 12 to < 18-semester units	Certificate requiring 8 to < 16-semester units	Total CC Annual Average Awards, Academic Years 2017-20
Chaffey	-	-	23	15	38
Desert	-	0	-	-	0
San Bernardino	4	0	-	-	4
Total	4	1	23	15	43

Source: MIS Data Mart

California program outcome data may provide a useful insight into the likelihood of success for the proposed program. Community college student outcome information based on the selected TOP code and region is provided in Exhibit 10. Among the students exiting film production programs, the median annual earnings were \$20,918 in the region. Statewide, 53% of students reported working in a job closely related to their field of study, the median annual earnings were \$25,220, and 27% attained a living wage. The outcome methodology is available in the appendix section of this report.

Exhibit 10: 0612.20 – Film production strong workforce program outcomes

Strong Workforce Program Metrics: 0612.20 – Film Production Academic Year 2018-19, unless noted otherwise	Inland Empire/Desert Region	California
Unduplicated count of enrolled students (2019-20)	151	9,824
Completed 9+ career education units in one year (2019-20)	50%	26%
Perkins Economically disadvantaged students	88%	71%
Students who attained a noncredit workforce milestone in a year (2019-20)	-	69%
Students who earned a degree, certificate, or attained apprenticeship (2019-20)	29	264
Transferred to a four-year institution (transfers)	-	699
Job closely related to the field of study (2017-18)	-	53%
Median annual earnings (all exiters)	\$20,918	\$25,220
Median change in earnings (all exiters)	-	33%

Strong Workforce Program Metrics: 0612.20 – Film Production Academic Year 2018-19, unless noted otherwise	Inland Empire/Desert Region	California
Attained a living wage (completers and skills-builders)	-	27%

Sources: LaunchBoard Community College Pipeline and Strong Workforce Program Metrics

Exhibit 11 displays awards reported by other postsecondary education providers in cinematography and film/video production (CIP 50.0602) programs. Completion data is compiled from the Integrated Postsecondary Education Data System (IPEDS) for the most recent three years available. On average, two other postsecondary education institutions in the region issued 39 awards annually over the last three academic years.

Exhibit 11: Other educational provider cinematography and film/video production programs, three-year annual average credentials in the Inland Empire/Desert Region

50.0602 – Cinematography and Film/Video Production	Bachelor's degree	Other Educational Providers Annual Average Credentials, Academic Years 2016-19
La Sierra University	1	1
University of California – Redlands	38	38
Total	39	39

Source: IPEDS

Recommendation for Film Production Programs

Community college film production programs provide the knowledge, skills, and abilities that prepare students for employment in two bachelor's degree-level occupations. The film production occupational group is expected to have 72 annual job openings and increase employment by 9% over the next five years. The median hourly earnings for the film production occupational group are between \$29.68 and \$34.15, surpassing the \$24.36 per hour self-sustainable wage standard.

Regional community college film production programs have issued 43 awards annually over the last three academic years. Among the students exiting film production programs, the median annual earnings were \$20,918 in the region. Two other postsecondary educational institutions in the region issued 39 awards annually over the last three academic years. Combined, regional postsecondary education providers have issued 82 awards annually.

The COE does not recommend expanding film production programs due to the low annual job openings for related jobs and the potential oversupply of regional program completers from postsecondary education providers. Furthermore, community college program completers will likely need to transfer to a four-year educational institution to obtain a bachelor's degree before entering employment. Students seeking



documentary film jobs will likely need to move outside of the region to find work or be willing to create their own job opportunities. Colleges considering this program should partner with four-year educational institutions and local employers to ensure their training provides the skills needed to transfer to a four-year educational institution and obtain a job in this field.

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October 2021

References

Burning Glass Technologies. (2021). *Labor Insights/Jobs*. Retrieved from <https://www.burning-glass.com/>

California Community Colleges Chancellor's Office. LaunchBoard. (2021). *California Community Colleges LaunchBoard*. Retrieved from <https://www.calpassplus.org/Launchboard/Home.aspx>

California Community Colleges Chancellor's Office. LaunchBoard. (2021a). *Strong Workforce Program Metrics Data Element Dictionary*. Pg. 3. Retrieved from <https://www.calpassplus.org/MediaLibrary/calpassplus/launchboard/Documents/SWP-DED.PDF>

California Community Colleges Chancellor's Office. (2021). *Chancellor's Office Curriculum Inventory (COCI), version 3.0*. Retrieved from <https://coci2.ccctechcenter.org/programs>

California Community Colleges Chancellor's Office Management Information Systems (MIS) Data Mart. (2021). *Data Mart*. Retrieved from <https://datamart.cccco.edu/datamart.aspx>

California Community Colleges Chancellor's Office, Curriculum and Instructional Unit, Academic Affairs Division. (2012). *Taxonomy of Programs, 6th Edition, Corrected Version*. Retrieved from <https://www.cccco.edu/-/media/CCCCO-Website/About-Us/Divisions/Digital-Innovation-and-Infrastructure/Research/Files/TOPmanual6200909corrected12513.ashx?la=en&hash=94C709CA83C0380828415579395A5F536736C7C1>

Carnevale, A. P., Jayasundera, T., & Repnikov, D. (n.d.). *Understanding Online Job Ads Data*. Retrieved from https://cew.georgetown.edu/wp-content/uploads/2014/11/OCLM.Tech_Web.pdf

Economic Modeling Specialists International (Emsi). (2021). *Datarun 2021.3*. Retrieved from <https://www.economicmodeling.com/>

Labor Market Information Division. Employment Development Department of California. (2021). *Detailed Occupational Guides*. Retrieved from <https://www.labormarketinfo.edd.ca.gov/OccGuides/Search.aspx>

National Center for O*NET Development. (2021). *O*NET OnLine*. Retrieved from <https://www.onetonline.org/>

Pearce, D. University of Washington. (2021). *Self Sufficiency Standard – California*. Retrieved from <http://www.selfsufficiencystandard.org/california>

U.S. Department of Education. Institute of Education Sciences, National Center for Education Statistics. *Integrated Postsecondary Education System (IPEDS)*. (2021). Retrieved from <https://nces.ed.gov/ipeds/use-the-data>

Appendix: Occupation definitions, sample job titles, five-year projections, and earnings for film production occupations

Occupation Definitions (SOC code), Education and Training Requirement, Community College Education Attainment

Producers and Directors (27-2012)

Produce or direct stage, television, radio, video, or film productions for entertainment, information, or instruction. Responsible for creative decisions, such as interpretation of script, choice of actors or guests, set design, sound, special effects, and choreography.

Sample job titles: Artistic Director, Director, Executive Producer, News Producer, Newscast Producer, Producer, Radio Producer, Technical Director, Television News Producer, Television Producer (TV Producer)

Entry-Level Educational Requirement: Bachelor's degree

Training Requirement: None

Work Experience: Less than 5 years

Percentage of incumbent workers with a Community College Award or Some Postsecondary Coursework: 19%

Film and Video Editors (27-4032)

Edit moving images on film, video, or other media. May work with a producer or director to organize images for final production. May edit or synchronize soundtracks with images.

Sample job titles: Editor, Film Editor, News Editor, News Video Editor, News Videotape Editor, Non-Linear Editor, Online Editor, Tape Editor, Television News Video Editor, Video Editor

Entry-Level Educational Requirement: Bachelor's degree

Training Requirement: None

Work Experience: None

Percentage of incumbent workers with a Community College Award or Some Postsecondary Coursework: 26%

Appendix: Methodology

Exhibit 9 displays the average annual California Community College (CCC) awards conferred during the three academic years between 2017 and 2020 from the California Community Colleges Chancellor's Office Management Information Systems (MIS) Data Mart. Awards are the combined total of associate degrees and certificates issued during the timeframe, divided by three in this case to calculate an annual average. This is done to minimize the effect of atypical variation that might be present in a single year.

Community college student outcome information is from LaunchBoard and based on the selected TOP code and region. These metrics are based on records submitted to the California Community Colleges Chancellor's Office Management Information Systems (MIS) by community colleges, which come from self-reported student information from CCC Apply and the National Student Clearinghouse. Employment and earnings metrics are sourced from California's Employment Development Department's Unemployment Insurance database records. When available, outcomes for completers are reported to demonstrate the impact that earning a degree or certificate can have on employment and earnings. For more information on the types of students included in each metric, please see the web link for LaunchBoard's Strong Workforce Program Metrics Data Element Dictionary in the References section (LaunchBoard, 2021 a). Finally, employment in a job closely related to the field of study comes from self-reported student responses on the CTE Employment Outcomes Survey (CTEOS), administered by Santa Rosa Junior College (LaunchBoard, 2021 a).

Job advertisement data is limited to the information provided by employers and the ability of artificial intelligence search engines to identify this information. Additionally, preliminary calculations by Georgetown Center on Education and the Workforce found that "just 30 to 40 percent of openings for candidates with some college or an associate degree, and only 40 to 60 percent of openings for high school diploma holders appear online" (Carnevale et al., 2014). Online job advertisements often do not reveal employers' hiring intentions; it is unknown if employers plan to hire one or multiple workers from a single online job ad or collect resumes for future hiring needs. A closed job ad may not be the result of a hired worker.

Table 1. 2020 to 2025 job growth, wages, entry-level education, training, and work experience required for the film production occupational group

Occupation (SOC)	2020 Jobs	5-Year Change (New Jobs)	5-Year % Change (New Jobs)	Annual Openings (New + Replacement Jobs)	Entry-Experienced Hourly Wage (10 th to 90 th percentile)	Median Hourly Wage (50 th percentile)	Average Annual Earnings	Entry-Level Education & On-The-Job-Training	Work Experience Required
Producers and Directors (27-2012)	494	24	5%	46	\$10.65 to \$63.12	\$34.15	\$86,300	Bachelor's degree & None	Less than 5 years
Film and Video Editors (27-4032)	206	36	17%	26	\$7.29 to \$92.03	\$29.68	\$89,500	Bachelor's degree & None	None
Total	700	60	9%	72	-	-	-	-	-

Source: Emsi 2021.3