

# Labor Market Analysis for Program Recommendation

# Music Production Occupations

# Solano College

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

**April 2022**

## Recommendation

Based on all available data, there appears to be an “undersupply” of Music Production workers compared to the demand for this cluster of occupations in the Bay region and in the North Bay sub-region (Marin, Napa, Solano, Sonoma counties). There is a projected annual gap of about 856 students in the Bay region and 80 students in the North Bay Sub-Region.

## Introduction

This report provides student outcomes data on employment and earnings for TOP 1005.00 Commercial Music 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 Solano College and in the region.

This report profiles Music Production Occupations in the 12 county Bay region and in the North Bay sub-region for a proposed new program at Solano College.

Labor market information (LMI) is not available at the eight-digit SOC Code level for Media Technical Directors/Managers (27-2012.05), therefore, the data shown in Tables 1 and 2 is for Producers and Directors(at the six digit SOC level) and likely overstates demand for Media Technical Directors/Managers. Tables 3, 4, 6, 9, 10 and 11 use job postings data from Burning Glass at the eight-digit SOC Code level for Media Technical Directors/Managers (27-2012.05).

* **Producers and Directors (27-2012):** Produce or direct stage, television, radio, video, or motion picture 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.  
    Entry-Level Educational Requirement: Bachelor’s degree  
    Training Requirement: None  
    Percentage of Community College Award Holders or Some Postsecondary Coursework: 20%
* **Music Directors and Composers (27-2041):** Conduct, direct, plan, and lead instrumental or vocal performances by musical groups, such as orchestras, bands, choirs, and glee clubs. Includes arrangers, composers, choral directors, and orchestrators.  
    Entry-Level Educational Requirement: Bachelor’s degree  
    Training Requirement: None  
    Percentage of Community College Award Holders or Some Postsecondary Coursework: 18%
* **Broadcast Technicians (27-4012):** Set up, operate, and maintain the electronic equipment used to transmit radio and television programs. Control audio equipment to regulate volume level and quality of sound during radio and television broadcasts. Operate transmitter to broadcast radio or television programs.  
    Entry-Level Educational Requirement: Associate’s degree  
    Training Requirement: Short-term on-the-job training  
    Percentage of Community College Award Holders or Some Postsecondary Coursework: 39%
* **Sound Engineering Technicians (27-4014):** Operate machines and equipment to record, synchronize, mix, or reproduce music, voices, or sound effects in sporting arenas, theater productions, recording studios, or movie and video productions.  
    Entry-Level Educational Requirement: Postsecondary nondegree award  
    Training Requirement: Short-term on-the-job training  
    Percentage of Community College Award Holders or Some Postsecondary Coursework: 39%

## Occupational Demand

**Table 1. Employment Outlook for Music Production 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** |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Producers and Directors | 5,555 | 5,893 | 338 | 6% | 3,253 | 651 | $35 | $70 |
| Music Directors and Composers | 1,414 | 1,436 | 22 | 2% | 962 | 192 | $16 | $52 |
| Broadcast Technicians | 516 | 569 | 52 | 10% | 391 | 78 | $16 | $49 |
| Sound Engineering Technicians | 578 | 645 | 67 | 12% | 447 | 89 | $25 | $57 |
| **Total** | **8,063** | **8,543** | **480** | **6%** | **5,053** | **1,010** |  |  |
| 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 Music Production Occupations in North Bay 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** | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Producers and Directors | 358 | 353 | -5 | -1% | 188 | 38 | $23 | $59 | |
| Music Directors and Composers | 208 | 214 | 5 | 3% | 143 | 29 | $12 | $49 | |
| Broadcast Technicians | 41 | 41 | -0 | -0% | 26 | 5 | $11 | $44 | |
| Sound Engineering Technicians | 58 | 60 | 1 | 3% | 39 | 8 | $20 | $57 | |
| **Total** | **665** | **668** | **3** | **0%** | **396** | **80** |  |  | |
| Source: EMSI 2021.3 | | | | | | | | |

**North Bay Sub-Region includes:** Marin, Napa, Solano, Sonoma Counties

### Job Postings in Bay Region and North Bay Sub-Region

**Table 3. Number of Job Postings by Occupation for latest 12 months (Mar 2021 - Feb 2022)**

| **Occupation** | **Bay Region** | **North Bay** |
| --- | --- | --- |
| Producers | 1,475 | 57 |
| Sound Engineering Technicians | 313 | 12 |
| Broadcast Technicians | 238 | 18 |
| Music Directors | 100 | 23 |
| Program Directors | 59 | 2 |
| Directors- Stage, Motion Pictures, Television, and Radio | 50 | 3 |
| Talent Directors | 20 | 0 |
| Music Composers and Arrangers | 12 | 0 |
| Technical Directors/Managers | 6 | 1 |
| Source: Burning Glass | | |

**Table 4a. Top Job Titles for Music Production Occupations for latest 12 months (Mar 2021 - Feb 2022) Bay Region**

| **Title** | **Bay** | **Title** | **Bay** |
| --- | --- | --- | --- |
| Producer | 118 | Producer IV | 21 |
| Associate Producer | 54 | Studio Coordinator | 20 |
| Video Producer | 50 | Newscast Director | 18 |
| Creative Producer | 46 | Broadcast Engineer | 17 |
| Digital Producer | 38 | Board Operator | 16 |
| Executive Producer | 38 | Studio Technician | 16 |
| Senior Producer | 26 | Localization Producer | 15 |
| Paid Media Manager | 23 | Audio Engineer | 14 |
| News Producer | 22 | Producer III | 13 |
| Source: Burning Glass | | | |

**Table 4b. Top Job Titles for Music Production Occupations for latest 12 months (Mar 2021 - Feb 2022) North Bay Sub-Region**

| **Title** | **North Bay** | **Title** | **North Bay** |
| --- | --- | --- | --- |
| Producer | 11 | Sound Technician | 3 |
| Associate Radio Producer | 3 | Audio Engineer | 2 |
| Choral Director | 3 | Content Creator/Producer | 2 |
| Church Music Director | 3 | Executive Producer | 2 |
| Digital Marketing Producer | 3 | Master Control Operator | 2 |
| Media Technician | 3 | Producer Afternoon News | 2 |
| Music Director | 3 | Producer Kfbk Afternoon News With Kitty O' | 2 |
| Producer Kfbk News | 3 | Producer Kfbk Afternoon News With Kitty Oneal | 2 |
|  |  | Senior Producer | 2 |
| Source: Burning Glass | | | |

## Industry Concentration

**Table 5. Industries hiring Music Production 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)** |
| --- | --- | --- | --- | --- |
| Motion Picture and Video Production | 1,417 | 1,567 | 11% | 18% |
| Internet Publishing and Broadcasting and Web Search Portals | 1,316 | 1,711 | 30% | 17% |
| Religious Organizations | 664 | 672 | 1% | 8% |
| Television Broadcasting | 671 | 611 | -9% | 8% |
| Independent Artists, Writers, and Performers | 377 | 402 | 7% | 5% |
| Teleproduction and Other Postproduction Services | 298 | 418 | 40% | 4% |
| Cable and Other Subscription Programming | 302 | 245 | -19% | 4% |
| Software Publishers | 283 | 311 | 10% | 3% |
| Sound Recording Studios | 194 | 248 | 28% | 3% |
| Radio Stations | 198 | 176 | -11% | 2% |
| Source: EMSI 2021.3 | | | | |

**Table 6. Top Employers Posting Music Production Occupations in Bay Region and North Bay Sub-Region (Mar 2021 - Feb 2022)**

| **Employer** | **Bay** | **Employer** | **North Bay** |
| --- | --- | --- | --- |
| Apple Inc. | 62 | Iheart Media | 12 |
| Facebook | 61 | Take-Two Interactive | 10 |
| NBC | 34 | Ascendant Studios | 5 |
| Gap Inc. | 34 | City Rohnert Park | 3 |
| Google Inc. | 29 | Butler, Shine, Stern & Partners | 3 |
| Disney | 26 | Visual Concepts | 2 |
| Pinnacle Group | 21 | Treasury Wine Estates Global | 2 |
| CBS Broadcasting | 19 | Santa Rosa Junior College | 2 |
| Planet Forward, Llc | 18 | Northern California Public Media | 2 |
| Tribune Company | 16 | Gallagher | 2 |
| Source: Burning Glass | | | |

## Educational Supply

There are seven (7) community colleges in the Bay Region issuing 84 awards on average annually (last 3 years ending 2018-19) on TOP 1005.00 Commercial Music. In the North Bay Sub-Region, there are no community colleges that issued awards on average annually (last 3 years) on this TOP code.

There are a four (4) other CTE educational institutions in the Bay Region issuing 70 awards on average annually (last 3 years ending 2016-17) on TOP 1005.00 Commercial Music. There is 0 other CTE educational institution in the North Bay Sub-Region issuing 0 awards on average annually (last 3 years) on this TOP code.

**Table 7a. Community College Awards on TOP 1005.00 Commercial Music in Bay Region**

| **College** | **Subregion** | **Associate** | **Certificate Low** | **Noncredit** | **Total** |
| --- | --- | --- | --- | --- | --- |
| Cabrillo | SC-Monterey | 1 | 2 | 0 | 3 |
| Diablo Valley | East Bay | 11 | 10 | 0 | 21 |
| Foothill | Silicon Valley | 13 | 4 | 0 | 17 |
| Las Positas | East Bay | 0 | 0 | 1 | 1 |
| Los Medanos | East Bay | 7 | 25 | 0 | 32 |
| Ohlone | East Bay | 0 | 0 | 0 | 0 |
| West Valley | Silicon Valley | 0 | 10 | 0 | 10 |
| **Total** |  | **32** | **51** | **1** | **84** |
| Source: Data Mart | | | | | |

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

**Table 7b. Other CTE Institutions Awards on TOP 1005.00 Commercial Music in Bay Region**

| **College** | **Subregion** | **Award 1 < 2 academic yrs** | **Bachelor's Degree** | **Total** |
| --- | --- | --- | --- | --- |
| Argosy University-The Art Institute of California-San Francisco | Mid-Peninsula | 0 | 14 | 14 |
| Cogswell College | Silicon Valley | 0 | 11 | 11 |
| SAE Expression College | East Bay | 0 | 42 | 42 |
| San Francisco Conservatory of Music | Mid-Peninsula | 3 | 0 | 3 |
| **Total** |  | **3** | **67** | **70** |
| Source: Data Mart | | | | |

*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 1,010 annual openings for the Music Production occupational cluster and 154 annual (3-year average) awards for an annual undersupply of 856 students. In the North Bay Sub-Region, there is also a gap with 80 annual openings and no annual (3-year average) awards for an annual undersupply of 80 students.

## Student Outcomes

**Table 8. Four Employment Outcomes Metrics for Students Who Took Courses on TOP 1005.00 Commercial Music**

| **Metric Outcomes** | **Bay All CTE Programs** | **Solano All CTE Programs** | **State 1005.00** | **Bay 1005.00** | **North Bay 1005.00** | **Solano 1005.00** |
| --- | --- | --- | --- | --- | --- | --- |
| Students with a Job Closely Related to Their Field of Study | 74% | 63% | 46% | 40% | N/A | N/A |
| Median Annual Earnings for SWP Exiting Students | $47,419 | $32,967 | $21,726 | $28,480 | $25,300 | N/A |
| Median Change in Earnings for SWP Exiting Students | 23% | 27% | 40% | 43% | 29% | N/A |
| Exiting Students Who Attained the Living Wage | 52% | 51% | 23% | 27% | 25% | N/A |
| Source: Launchboard Strong Workforce Program Median of 2017 to 2020. | | | | | | |

## Skills, Certifications and Education

**Table 9. Top Skills for Music Production Occupations in Bay Region (Mar 2021 - Feb 2022)**

| **Skill** | **Posting** | **Skill** | **Posting** |
| --- | --- | --- | --- |
| Scheduling | 605 | Customer Service | 167 |
| Project Management | 593 | Journalism | 154 |
| Budgeting | 586 | Content Management | 152 |
| Broadcast Industry Knowledge | 415 | Adobe Aftereffects | 146 |
| Social Media | 335 | Video Editing | 135 |
| Music | 327 | Adobe Premiere | 131 |
| Adobe Photoshop | 313 | Atlassian JIRA | 129 |
| Video Production | 307 | Marketing Communications | 117 |
| Adobe Indesign | 223 | Media Production | 113 |
| Adobe Acrobat | 204 | Photography | 112 |
| Adobe Illustrator | 202 | Creative Development | 103 |
| Adobe Creative Suite | 196 | Youtube | 102 |
| Quality Assurance and Control | 180 | E-Commerce | 99 |
| Facebook | 177 | Staff Management | 98 |
| Source: Burning Glass | | | |

**Table 10. Certifications for Music Production Occupations in Bay Region (Mar 2021 - Feb 2022)**

| **Certification** | **Posting** | **Certification** | **Posting** |
| --- | --- | --- | --- |
| Driver's License | 102 | Microsoft Certified Professional (MCP) | 5 |
| Project Management Certification | 21 | First Aid Cpr Aed | 4 |
| Certified ScrumMaster (CSM) | 16 | Certified Financial Planner (CFP) | 4 |
| Project Management Professional (PMP) | 14 | Ca License | 4 |
| Chartered Property Casualty Underwriter (CPCU) | 12 | Food Service Certification | 3 |
| Certified Employee Benefit Specialist (CEBS) | 11 | Series 7 | 2 |
| Cisco Certified Network Associate (CCNA) | 10 | Security Clearance | 2 |
| American Institute of Certified Planners | 9 | SHRM Certified Professional (SHRM-CP) | 2 |
| Cisco Certified Network Professional (CCNP) | 7 | Pilot Certification | 2 |
| Food Handler Certification | 6 | Microsoft Certified Systems Administrator (Legacy) | 2 |
| Source: Burning Glass | | | |

*Note: 92% 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 Music Production Occupations in Bay Region**

| **Education (minimum advertised)** | **Latest 12 Mos. Postings** | **Percent 12 Mos. Postings** |
| --- | --- | --- |
| High school or vocational training | 169 | 13% |
| Associate's degree | 41 | 3% |
| Bachelor's degree and higher | 1,054 | 84% |
| Source: Burning Glass | | |

*Note: 44% 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

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