FOOTHILL COLLEGE

12345 El Monte Road
Los Altos Hills, California 94022
650.949.7777

Field Ironworking Apprenticeship Program Report
For Greater South Bay and Peninsula Region
(Santa Clara and San Mateo Counties)

Ironworking/Ironworker

CIP 2010: A program that prepares individuals to make and install structural, ornamental, and reinforcing metal structures and supports. Includes instruction in drafting, technical mathematics, blueprint interpretation, welding, riveting, beam placement, ornamental design, structural reinforcement, crane operation, safety, and applicable codes and standards.

Target Occupations‡

Reinforcing Iron and Rebar Workers (47-2171)

Structural Iron and Steel Workers (47-2221)

‡Based on EMSI crosswalk of the Classification of Instructional Programs (CIP) codes with Standard Occupational Classification (SOC) codes as published by the U.S. Department of Education.

In 2012, the number of field ironworking jobs in the target occupations in Santa Clara and San Mateo Counties totaled 255. The Bureau of Labor Statistics (BLS) expects the total number of positions to increase by 4.7% over the next three years. Regional openings in 2012, which included created jobs and turnover, totaled 47.

Target Occupation Performance

255*	4.7%*	$34.25/hr
Jobs (2012)	**Growth (2013-2016)**	**Median Earnings**
National Location Quotient: 0.37[†]	National: 1.0%	National: $22.16/hr

*Based on total number of jobs for target occupations Santa Clara and San Mateo Counties.
[†]Represents occupation density as compared to national average (national average=1).

Regional Openings (2012)**	47
Regional Program Completions (2012)	0
All Regional Completions for Target Occupations[††] (2012)	0

**Openings include created jobs and turnover.
[††]Includes all regional programs applicable to target occupations.

Field Ironworking Occupations Performance

Target Occupations	Regional Openings (2012)	Median Hourly Earnings	Growth (2013-2016)
Structural Iron and Steel Workers (47-2221)	29	$32.84	2.8%
Reinforcing Iron and Rebar Workers (47-2171)	18	$32.98	8.1%

Regional Breakdown for Field Ironworking Occupations

County Name	2013 Jobs	2016 Jobs	2013 Annual Openings	Median Hourly Earnings	2013 National Location Quotient
Santa Clara	246	250	6	$34.95	0.49
San Mateo	49	59	4	$30.79	0.26
Total	295	309	10	$34.25	

Target Occupations Demographics

The demographics among those employed in field ironworking occupations in Santa Clara and San Mateo Counties for 2013 show that all are men (98.3%) and over four-fifths are between the ages of 25-54 years old (80.1%).

Gender Demographics (Regional)

Gender	Jobs (2013)	% of Total	
Male	290	98.3%	
Female	<10	1.7%	

Age Demographics (Regional)

Age	Jobs (2013)	% of Total	
14-18 Years	<10	1.0%	
19-21 Years	<10	2.0%	
22-24 Years	16	5.5%	
25-34 Years	66	22.2%	
35-44 Years	88	30.0%	
45-54 Years	82	27.9%	
55-64 Years	30	10.3%	
65+ Years	<10	1.2%	

Industries Employing Field Ironworking Occupations

A number of industries in Santa Clara and San Mateo Counties employ those trained in field ironworking and its related occupations. The following table represents a regional industry breakdown of the number of field ironworking positions employed, the percentage of field ironworking jobs employed by industry and the percentage field ironworking jobs represent within all jobs by each industry. While commercial and institutional building contractors employed 15.1% of all regional field ironworkers in 2013, ironworking and its related occupations represent only 1.0% of the total jobs in that industry.

Inverse Staffing Patterns (Regional)

Top Five Industries	Occupation Group Jobs in Industry (2013)	% of Occupation Group in Industry (2013)	% of Total Jobs in Industry (2013)
Glass and Glazing Contractors (238150)	50	17.1%	9.7%
Commercial and Institutional Building Construction (236220)	45	15.1%	1.0%
Framing Contractors (238130)	33	11.3%	10.6%
Structural Steel and Precast Concrete Contractors (238120)	24	8.3%	10.0%
Poured Concrete Foundation and Structure Contractors (238110)	24	8.0%	1.1%

State Data Sources

This report uses state data from the following agencies: California Labor Market Information Department

Institution Data

The institution data in this report is taken directly from the national IPEDS database published by the U.S. Department of Education's National Center for Education Statistics.

Completers Data

The completers data in this report is taken directly from the national IPEDS database published by the U.S. Department of Education's National Center for Education Statistics.

Occupation Data

EMSI occupation employment data are based on final EMSI industry data and final EMSI staffing patterns. Wage estimates are based on Occupational Employment Statistics (QCEW and Non-QCEW Employees classes of worker) and the American Community Survey (Self-Employed and Extended Proprietors). Occupational wage estimates also affected by county-level EMSI earnings by industry.

Staffing Patterns Data

The staffing pattern data in this report are compiled from several sources using a specialized process. For QCEW and Non-QCEW Employees classes of worker, sources include Occupational Employment Statistics, the National Industry-Occupation Employment Matrix, and the American Community Survey. For the Self-Employed and Extended Proprietors classes of worker, the primary source is the American Community Survey, with a small amount of information from Occupational Employment Statistics.

Industry Data

EMSI industry data have various sources depending on the class of worker. (1) For QCEW Employees, EMSI primarily uses the QCEW (Quarterly Census of Employment and Wages), with supplemental estimates from County Business Patterns and Current Employment Statistics. (2) Non-QCEW employees data are based on a number of sources including QCEW, Current Employment Statistics, County Business Patterns, BEA State and Local Personal Income reports, the National Industry-Occupation Employment Matrix (NIOEM), the American Community Survey, and Railroad Retirement Board statistics. (3) Self-Employed and Extended Proprietor classes of worker data are primarily based on the American Community Survey, Nonemployer Statistics, and BEA State and Local Personal Income Reports. Projections for QCEW and Non-QCEW Employees are informed by NIOEM and long-term industry projections published by individual states.