

STEM & Health Care Occupations in Wyoming: Now and Possibilities for the Future

Presented by Tom Gallagher and Tony
Glover, Research & Planning, Wyoming
Department of Workforce Services
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Casper College
February 9, 2012

Available online at
<http://doe.state.wy.us/lmi/presentations.htm>

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What We Do: R&P collects, analyzes, and publishes timely and accurate labor market information (LMI) meeting established statistical standards.

Our Customers: LMI makes the labor market more efficient by providing the public and the public's representatives with the basis for informed decision making."

**One of our goals is to improve return on investment
for employment training programs**



How are STEM Occupations Defined?

- Educational Program:
 - All mathematics, chemistry, computer science, physics, and engineering disciplines
 - Occupational Assignment:
 - High degree of knowledge, skills, and abilities in the areas of science, technology, mathematics, and analytical reasoning
 - These Create:
 - Diverse occupations found across occupational groups and industries

Source: U.S. Employment and Training Administration O*NET
<http://www.onetonline.org/find/stem?t=0>

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Examples of STEM Occupations

- Accountants
- Civil Engineers
- Computer Programmers
- Dietitians and Nutritionists
- Farm and Ranch Managers
- Food Science Technicians
- Forest and Conservation Workers
 - Graphic Designers
 - School Psychologists
- Wind Turbine Service Technicians

Source: O*NET OnLine (<http://www.onetonline.org/find/stem?t=0&q=Go>)

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Selected STEM Occupations and Employment in Wyoming, 2010

SOC ^a Code	Occupation	2010 Employment	SOC ^a Code	Occupation	2010 Employment
11-0000	Management Occupations	1,965	29-0000	Healthcare Practitioners and Technical Occupations	132
11-9199	Managers, All Other	874	29-1031	Dietitians and Nutritionists	83
11-9021	Construction Managers	392	29-2051	Dietetic Technicians	39
11-3051	Industrial Production Managers	194	29-2033	Nuclear Medicine Technologists	16
13-0000	Business and Financial Operations Occupations	3,232	33-0000	Protective Service Occupations	83
13-2011	Accountants and Auditors	1,717	33-3031	Fish and Game Wardens	83
13-1199	Business Operations Specialists, All Other	895	35-0000	Food Preparation and Serving Related Occupations	3,272
13-1041	Compliance Officers, Except Agriculture, Construction, Etc.	316	35-1012	First-Line Supervisors/Managers of Food Preparation	2,085
15-0000	Computer and Mathematical Occupations	882	35-2012	Cooks, Institution and Cafeteria	1,187
15-1121	Computer Systems Analysts	382	43-0000	Office and Administrative Support Occupations	ND
15-1132	Software Developers, Applications	185	43-9111	Statistical Assistants	ND
15-1131	Computer Programmers	108	45-0000	Farming, Fishing, and Forestry Occupations	86
17-0000	Architecture and Engineering Occupations	4,590	45-4022	Logging Equipment Operators	25
17-2051	Civil Engineers	854	45-4021	Fallers	26
17-2171	Petroleum Engineers	551	45-2021	Animal Breeders	14
17-2081	Environmental Engineers	336	49-0000	Installation, Maintenance, and Repair Occupations	1,504
19-0000	Life, Physical, and Social Science Occupations	3,723	49-3023	Automotive Service Technicians and Mechanics	1,392
19-4093	Forest and Conservation Technicians	766	49-3011	Aircraft Mechanics and Service Technicians	101
19-2041	Environment Scientists & Spec	426	49-2091	Avionics Technicians	12
19-1023	Zoologists and Wildlife Biologists	329	51-0000	Production Occupations	673
25-0000	Education, Training, and Library Occupations	938	51-8091	Chemical Plant and System Operators	591
25-1071	Health Specialties Teachers, Postsecondary	135	51-9011	Chemical Equipment Operators and Tenders	56
25-9021	Farm and Home Management Advisors	128	51-3092	Food Batchmakers	26
25-1022	Mathematical Science Teachers, Postsecondary	113	53-0000	Transportation and Material Moving Occupations	ND
27-0000	Arts, Design, Entertainment, Sports, and Media Occ	261	53-6051	Transportation Inspectors	ND
27-1024	Graphic Designers	261			

^aStandard Occupational Classification System.

Source: Occupational Employment Statistics, Research & Planning, Wyoming Department of Workforce Services (<http://doe.state.wy.us/lmi/oes.htm>)

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Selected Health Care Occupations and Employment in Wyoming, 2010

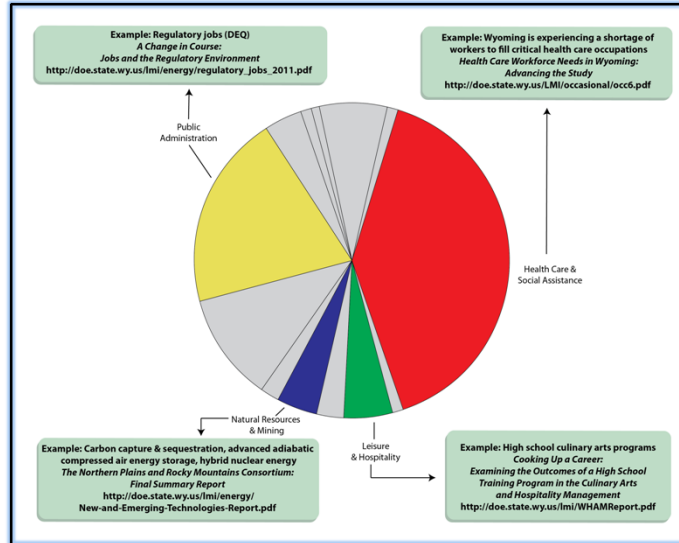
SOC ^a Code	Occupation	2010 Employment
29-0000	Healthcare Practitioners and Technical Occupations	13,685
29-1111	Registered Nurses	5,150
29-2061	Licensed Practical and Licensed Vocational Nurses	782
29-2041	Emergency Medical Technicians and Paramedics	608
29-1051	Pharmacists	504
29-2052	Pharmacy Technicians	483
29-1123	Physical Therapists	458
29-1062	Family and General Practitioners	429
29-2037	Radiologic Technologists and Technicians	408
29-2012	Medical and Clinical Laboratory Technicians	389
29-2021	Dental Hygienists	355
31-0000	Healthcare Support Occupations	6,392
31-1012	Nursing Aides, Orderlies, and Attendants	3,155
31-1011	Home Health Aides	991
31-9091	Dental Assistants	521
31-9092	Medical Assistants	509
31-9799	Healthcare Support Workers, All Other	287
31-9094	Medical Transcriptionists	230
31-9096	Veterinary Asst. and Laboratory Animal Caretakers	218
31-2021	Physical Therapist Assistants	131
31-2022	Physical Therapist Aides	119
31-9093	Medical Equipment Preparers	88

^aStandard Occupational Classification System.

Source: Occupational Employment Statistics, Research & Planning, Wyoming Department of Workforce Services (<http://doe.state.wy.us/lmi/oes.htm>)

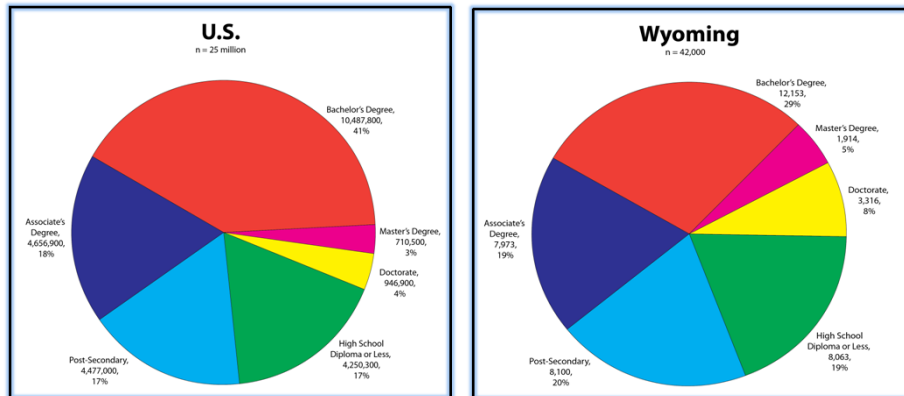
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STEM & Health Care in Wyoming: Suggestions for Further Reading



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STEM & Health Care by Typical Education, 2010



Source: Occupational Employment Statistics, U.S. Bureau of Labor Statistics (<http://bls.gov>)
O*NET Online (<http://www.onetonline.org/>)

Source: Occupational Employment Statistics, Research & Planning, Wyoming Department of Workforce Services (<http://doe.state.wy.us/LMI/oes.htm>)
O*NET Online (<http://www.onetonline.org/>)

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Wage Comparison for STEM, Health Care, & All Other Occupations by Typical Education

Average Annual Wage by Education Level for Wyoming and the U.S., 2010

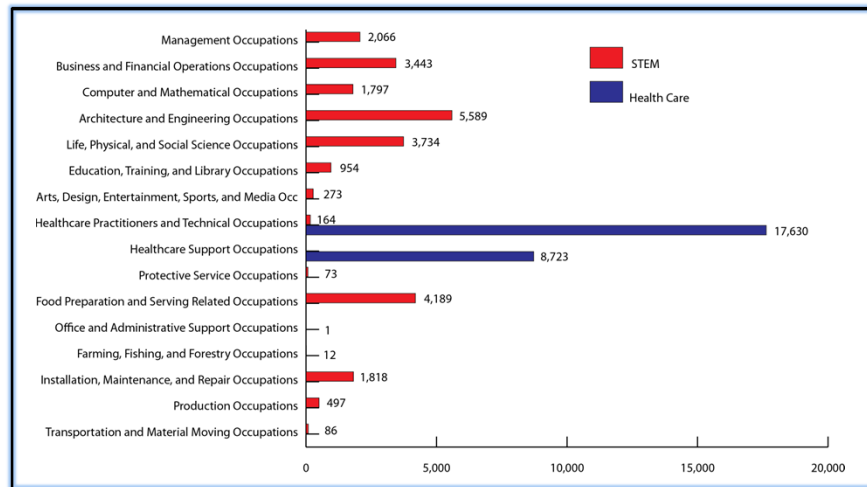
Education Level	U.S. Annual Wage	Wyoming Annual Wage
STEM		
High School Diploma or Less	\$32,564	\$33,054
Post Secondary	\$41,746	\$40,801
Associates	\$70,289	\$57,409
Bachelors Degree or More	\$79,610	\$67,009
Health Care		
High School Diploma or Less	\$27,978	\$28,254
Post Secondary	\$31,700	\$30,556
Associates	\$63,817	\$55,490
Bachelors Degree or More	\$87,693	\$107,929
All Other		
High School Diploma or Less	\$31,239	\$32,734
Post Secondary	\$45,356	\$45,966
Associates	\$47,557	\$45,538
Bachelors Degree or More	\$71,800	\$60,318

Source: Occupational Employment Statistics, Research & Planning, Wyoming Department of Workforce Services (<http://doe.state.wy.us/LMI/oes.htm>) O*NET Online (<http://www.onetonline.org/>)

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Projected Openings for STEM and Health Care Occupations, 2010 to 2020

Total Openings due to Industry Growth and Replacement Need by Major Occupational Group

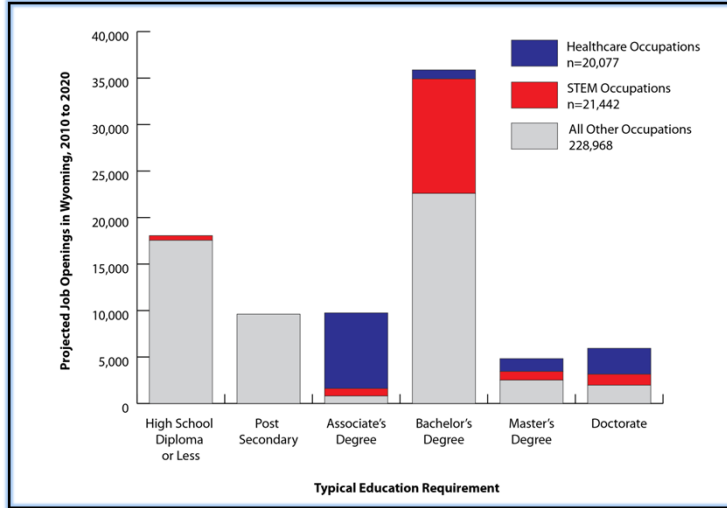


Source: Wyoming's Short-Term (2010-2012) and Long-Term (2010-2020) Industry and Occupational Projections (<http://doe.state.wy.us/lmi/projections.htm>)

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The Incentive Structure

Projected Job Openings in Wyoming for Jobs with Annual Earnings of \$50,000 or More^a, 2010-2020



^aWages in 2010.
Source: Wyoming's Short-Term (2010-2012) and Long-Term (2010-2020) Industry and Occupational Projections (<http://doe.state.wy.us/mi/projections.htm>)

Demographic and Social Shocks

Projections are based on current workforce trends. They cannot account for these types of demographic and social shocks:

- An aging baby boom generation
- Substantial federal investments and initiatives
- Changes in technology in areas such as health care and energy

Demographic and Social Shocks

An Aging Population

- In 2010, 1 in 4 people living in Wyoming was a baby boomer born between 1946 and 1964^a
- Several industries dominated by STEM jobs in Wyoming are populated with a high percentage of older workers
 - Education, Public Administration, and Health Care & Social Assistance all have a large proportion of workers who will reach the traditional retirement age of 65 in the next 10 years.

Does Wyoming's workforce development system have the capacity to meet this need?

^aSource: U.S. Census Bureau

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Demographic and Social Shocks

Health Information Technology

- "A large infusion of federal funds to support health information technology (HIT) development will likely alter the structure of the health care industry in Wyoming, as the health care delivery system evolves from paper records to electronic records."
(<http://doe.state.wy.us/lmi/1210/a1.htm>)

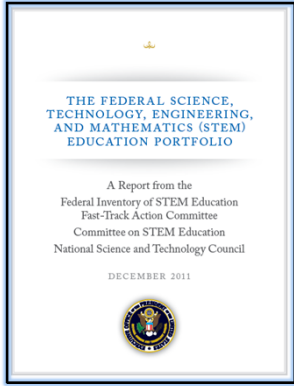
Technological Changes in Wyoming's Energy Sector

- "... even those technologies with the most benevolent appearance may have side effects needing regulatory attention. For instance, oil used in wind generator gear boxes and water returned from ground source heat pump systems are likely to require regulatory oversight."
(http://doe.state.wy.us/lmi/energy/regulatory_jobs_2011.pdf)

What effects will these new technologies have on Wyoming's labor force?

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Other Resources



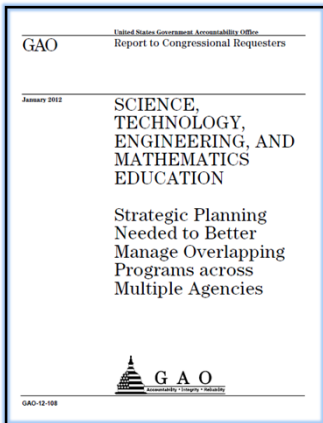
The Federal Science, Technology, Engineering, and Mathematics (STEM) Education Portfolio

A Report from the Federal Inventory of STEM Education Fast-Traction Action Committee Committee on STEM Education National Science and Technology Council

December 2011

http://www.whitehouse.gov/sites/default/files/microsites/ostp/costem_federal_stem_education_portfolio_report.pdf

Other Resources



United States Government Accountability Office

Report to Congressional Requesters

Science, Technology, Engineering, and Mathematics Education

Strategic Planning Needed Better Manager Overlapping Programs across Multiple Agencies

January 2012

<http://gao.gov/assets/590/587839.pdf>

For More Information

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Casper, WY 82601

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Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Science, Technology, Engineering, and Mathematics (STEM) Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
00-0000 Total	Total	522,640	\$71,002	2,470	\$56,146
00-0000 Total	02-High School Diploma or Less	53,960	\$32,564	588	\$33,054
00-0000 Total	03-Post Secondary	40,240	\$41,746	249	\$40,801
00-0000 Total	04-Associates	33,720	\$70,289	97	\$57,409
00-0000 Total	05-Bachelors	365,550	\$79,706	1,322	\$67,061
00-0000 Total	06-Masters	12,480	\$76,300	93	\$63,049
00-0000 Total	07-Doctorate	16,690	\$79,267	120	\$69,591
35-1012 First-Line Supervisors/Managers of Food Preparation and Serving Workers	02-High School Diploma or Less	24,830	\$31,770	270	\$28,299
13-2011 Accountants and Auditors	05-Bachelors	45,210	\$68,960	194	\$62,002
49-3023 Automotive Service Technicians and Mechanics	03-Post Secondary	31,170	\$38,200	169	\$38,672
35-2012 Cooks, Institution and Cafeteria	02-High School Diploma or Less	13,620	\$24,180	149	\$23,599
17-2051 Civil Engineers	05-Bachelors	10,440	\$82,280	99	\$69,414
17-2171 Petroleum Engineers	05-Bachelors	1,180	\$127,970	96	\$86,927
11-9199 Managers, All Other	05-Bachelors	24,940	\$102,160	87	\$74,116
13-1199 Business Operations Specialists, All Other	05-Bachelors	32,720	\$67,710	84	\$65,231

* Source data are found at <http://www.bls.gov/emp/#tables> (US) and <http://doe.state.wy.us/lmi/projections.htm> (Wyoming). Rows with 0 openings or \$0 are suppressed due to data quality or confidentiality.

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SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
19-4093 Forest and Conservation Technicians	02-High School Diploma or Less	1,540	\$36,860	70	\$32,407
11-9021 Construction Managers	05-Bachelors	12,040	\$94,240	53	\$84,917
15-1121 Computer Systems Analysts	04-Associates	22,250	\$81,250	46	\$62,518
17-2081 Environmental Engineers	05-Bachelors	2,260	\$83,160	41	\$72,704
17-1022 Surveyors	05-Bachelors	2,420	\$58,140	40	\$52,552
19-2041 Environmntl Scientists & Spec	05-Bachelors	4,320	\$67,810	40	\$60,145
51-8091 Chemical Plant and System Operators	02-High School Diploma or Less	1,410	\$54,700	40	\$63,602
15-1142 Network and Computer Systems Admini	05-Bachelors	15,530	\$72,200	37	\$55,566
17-3022 Civil Engineering Technicians	03-Post Secondary	2,460	\$47,940	36	\$44,884
17-3011 Architectural and Civil Drafters	03-Post Secondary	2,090	\$48,740	33	\$43,266
19-1023 Zoologists and Wildlife Biologists	06-Masters	590	\$61,660	32	\$54,397
19-4031 Chemical Technicians	02-High School Diploma or Less	1,290	\$44,200	32	\$37,072
17-2071 Electrical Engineers	05-Bachelors	4,780	\$87,770	31	\$66,525
19-3031 Clinical, Counseling, and School Psychologists	07-Doctorate	8,230	\$72,540	31	\$63,528
17-2141 Mechanical Engineers	05-Bachelors	9,960	\$82,480	30	\$77,586

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SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
13-1041 Compliance Officers, Except Agriculture, Construction, Health and Safety, and Transportation	05-Bachelors	5,860	\$62,140	30	\$52,464
19-4021 Biological Technicians	05-Bachelors	3,790	\$41,740	29	\$35,561
13-1051 Cost Estimators	05-Bachelors	10,300	\$62,060	28	\$54,870
15-1179 Information Security Analysts, Web Developers, and Computer Network Architects	05-Bachelors	11,030	\$79,370	28	\$57,491
27-1024 Graphic Designers	05-Bachelors	12,380	\$48,140	27	\$35,775
19-2042 Geoscientists, Except Hydrologists and Geographers	05-Bachelors	1,710	\$93,380	26	\$67,714
17-2151 Mining and Geological Engineers, Including Mining Safety Engineers	05-Bachelors	200	\$87,350	22	\$81,483
19-1029 Biological Scientists, All Other	07-Doctorate	1,030	\$71,310	20	\$59,349
11-9041 Engineering Managers	05-Bachelors	4,970	\$125,900	20	\$100,787
17-1011 Architects, Except Landscape and Naval	06-Masters	5,090	\$78,530	19	\$74,712
15-1132 Software Developers, Applications	05-Bachelors	19,790	\$90,410	18	\$68,628
11-3021 Computer and Information Systems Managers	05-Bachelors	10,280	\$123,280	18	\$81,417
17-3023 Electricl & Electrnic Enginrng Tech	04-Associates	3,180	\$56,690	18	\$60,722
11-3051 Industrial Production Managers	05-Bachelors	4,900	\$95,660	17	\$98,957

* Sorce data are found at <http://www.bls.gov/emp/#tables> (US) and <http://doe.state.wy.us/lmi/projections.htm> (Wyoming). Rows with 0 openings or \$0 are suppressed due to data quality or confidentiality.

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SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
15-1799 Computer Occupations, All Other	05-Bachelors	5,160	\$79,790	17	\$65,725
19-1031 Conservation Scientists	05-Bachelors	400	\$61,200	17	\$60,957
17-3029 Engineering Technicians, Exc. Drafters, All Other	04-Associates	1,680	\$59,060	16	\$55,449
17-2199 Engineers, All Other	05-Bachelors	4,480	\$91,770	15	\$69,116
19-4091 Environmental Science and Protection Technicians, Including Health	05-Bachelors	1,950	\$44,440	15	\$42,960
17-2112 Industrial Engineers	05-Bachelors	5,750	\$78,450	14	\$92,942
25-1071 Health Specialties Teachers, Postsecondary	07-Doctorate	0	\$0	14	\$69,289
25-9021 Farm and Home Management Advisors	06-Masters	500	\$47,640	13	\$60,135
15-1131 Computer Programmers	05-Bachelors	12,800	\$74,900	12	\$50,892
19-2031 Chemists	05-Bachelors	2,990	\$73,240	12	\$62,575
17-2072 Electronics Engineers, Except Computer	05-Bachelors	4,060	\$92,730	12	\$78,274
19-4099 Life, Physical & Social Science Technicians, Other	04-Associates	3,350	\$45,980	12	\$44,351
25-1022 Mathematical Science Teachers, Postsecondary	06-Masters	0	\$0	11	\$67,933
49-3011 Aircraft Mechanics and Service Technicians	03-Post Secondary	4,520	\$53,280	11	\$49,637

* Source data are found at <http://www.bls.gov/emp/#tables> (US) and <http://doe.state.wy.us/lmi/projections.htm> (Wyoming). Rows with 0 openings or \$0 are suppressed due to data quality or confidentiality.

Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Science, Technology, Engineering, and Mathematics (STEM) Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
17-2111 Health and Safety Engineers, Except Mining Safety Engineers and Inspectors	05-Bachelors	820	\$78,210	11	\$65,288
29-1031 Dietitians and Nutritionists	05-Bachelors	3,540	\$54,340	11	\$52,658
11-9121 Natural Sciences Managers	05-Bachelors	3,350	\$129,320	11	\$88,525
25-1042 Biological Science Teachers, Postsecondary	07-Doctorate	0	\$0	11	\$73,730
15-1141 Database Administrators	05-Bachelors	5,270	\$75,730	10	\$61,290
17-2041 Chemical Engineers	05-Bachelors	1,140	\$94,590	9	\$113,174
53-6051 Transportation Inspectors	02-High School Diploma or Less	1,070	\$63,050	9	\$0
13-2099 Financial Specialists, All Other	05-Bachelors	4,490	\$66,920	9	\$64,073
25-1041 Agricultural Sciences Teachers, Postsecondary	07-Doctorate	0	\$0	8	\$75,402
25-1011 Business Teachers, Postsecondary	07-Doctorate	0	\$0	8	\$87,204
25-1032 Engineering Teachers, Postsecondary	07-Doctorate	0	\$0	8	\$88,850
33-3031 Fish and Game Wardens	05-Bachelors	220	\$55,650	7	\$49,169
19-1032 Foresters	05-Bachelors	190	\$55,790	7	\$56,379
51-9011 Chemical Equipment Operators and Tenders	02-High School Diploma or Less	760	\$45,790	7	\$54,386
19-1013 Soil and Plant Scientists	05-Bachelors	860	\$62,600	7	\$47,930

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SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
15-1133 Software Developers, Systems Softwa	05-Bachelors	16,800	\$97,960	7	\$65,461
17-3025 Environmental Engineering Technicians	05-Bachelors	820	\$46,820	5	\$45,445
25-1066 Psychology Teachers, Postsecondary	07-Doctorate	0	\$0	5	\$69,559
19-2021 Atmospheric and Space Scientists	05-Bachelors	210	\$88,010	5	\$75,870
19-2043 Hydrologists	05-Bachelors	360	\$79,280	5	\$63,753
29-2051 Dietetic Technicians	02-High School Diploma or Less	810	\$28,820	5	\$27,575
25-1051 Atmospheric, Earth, Marine, and Space Sciences Tea	07-Doctorate	0	\$0	4	\$0
25-1021 Computer Science Teachers, Postsecondary	06-Masters	0	\$0	4	\$69,990
17-3027 Mechanical Engineering Technicians	02-High School Diploma or Less	1,040	\$51,450	4	\$51,243
19-4011 Agricultural and Food Science Technicians	04-Associates	870	\$35,140	3	\$0
19-1041 Epidemiologists	06-Masters	150	\$68,280	3	\$61,902
17-3026 Industrial Engineering Technicians	05-Bachelors	1,460	\$50,540	3	\$70,047
19-3099 Social Scientists and Related Workers, All Other	06-Masters	1,760	\$77,890	3	\$55,385
15-2031 Operations Research Analysts	06-Masters	3,000	\$76,980	3	\$69,957
25-1052 Chemistry Teachers, Postsecondary	07-Doctorate	0	\$0	3	\$76,996

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SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
51-3092 Food Batchmakers	02-High School Diploma or Less	2,820	\$26,820	3	\$21,135
25-1054 Physics Teachers, Postsecondary	07-Doctorate	0	\$0	2	\$72,298
25-1031 Architecture Teachers, Postsecondary	06-Masters	0	\$0	2	\$0
25-1192 Home Economics Teachers, Postsecondary	07-Doctorate	0	\$0	2	\$0
15-2041 Statisticians	07-Doctorate	1,870	\$76,070	2	\$0
49-2091 Avionics Technicians	04-Associates	580	\$52,050	1	\$47,601
19-3039 Psychologists, All Other	06-Masters	870	\$86,510	1	\$91,569
17-2131 Materials Engineers	05-Bachelors	810	\$85,860	1	\$70,699
19-2011 Astronomers	07-Doctorate	90	\$93,340	1	\$0
29-2033 Nuclear Medicine Technologists	04-Associates	750	\$69,050	1	\$63,311
19-1012 Food Scientists and Technologists	05-Bachelors	680	\$65,380	1	\$0
17-2011 Aerospace Engineers	05-Bachelors	2,180	\$99,000	1	\$0
11-9013 Farm, Ranch, and Other Agricultural Managers	05-Bachelors	23,450	\$65,960	1	\$0
17-2061 Computer Hardware Engineers	05-Bachelors	2,290	\$101,600	1	\$0
25-1053 Environmental Science Teachers, Postsecondary	07-Doctorate	0	\$0	1	\$0

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SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
15-2011 Actuaries	05-Bachelors	1,890	\$98,620	1	\$0
45-1011 First-Line Supervisors/Managers of Farming, Fishing, and Forestry Workers	02-High School Diploma or Less	1,360	\$45,040	1	\$39,505
45-4011 Forest and Conservation Workers	05-Bachelors	350	\$27,740	0	\$0
19-2032 Materials Scientists	06-Masters	370	\$86,300	0	\$0
51-4012 Numerical Tool and Process Control Programmers	04-Associates	490	\$48,400	0	\$0
15-2021 Mathematicians	07-Doctorate	230	\$100,260	0	\$0
17-2021 Agricultural Engineers	05-Bachelors	80	\$74,790	0	\$0
45-4021 Fallers	02-High School Diploma or Less	260	\$38,660	0	\$33,349
19-1022 Microbiologists	05-Bachelors	720	\$72,030	0	\$0
19-2012 Physicists	07-Doctorate	800	\$112,020	0	\$0
19-1042 Medical Scientists, Except Epidemiologists	07-Doctorate	4,260	\$86,710	0	\$0
43-9111 Statistical Assistants	05-Bachelors	410	\$37,090	0	\$0
19-1011 Animal Scientists	07-Doctorate	180	\$68,170	0	\$0
17-2121 Marine Engineers and Naval Architects	05-Bachelors	230	\$87,770	0	\$0
17-2161 Nuclear Engineers	05-Bachelors	620	\$101,500	0	\$0

* Source data are found at <http://www.bls.gov/emp/#tables> (US) and <http://doe.state.wy.us/lmi/projections.htm> (Wyoming). Rows with 0 openings or \$0 are suppressed due to data quality or confidentiality.

Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Science, Technology, Engineering, and Mathematics (STEM) Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
17-3021 Aerospace Engineering and Operations Technicians	04-Associates	170	\$59,990	0	\$0
19-1021 Biochemists and Biophysicists	05-Bachelors	1,340	\$86,580	0	\$0
19-3032 Industrial-Organizational Psychologists	06-Masters	150	\$114,040	0	\$0
17-2031 Biomedical Engineers	05-Bachelors	1,310	\$84,780	0	\$0
15-2091 Mathematical Technicians	04-Associates	70	\$49,170	0	\$0
15-1111 Computer and Information Research Scientists	05-Bachelors	1,060	\$103,150	0	\$0
19-4051 Nuclear Technicians	04-Associates	330	\$67,330	0	\$0
45-2021 Animal Breeders	02-High School Diploma or Less	360	\$35,620	0	\$0
45-3011 Fishers and Related Fishing Workers	02-High School Diploma or Less	920	\$27,880	0	\$0
45-4022 Logging Equipment Operators	02-High School Diploma or Less	980	\$33,400	0	\$36,029
45-4023 Log Graders and Scalers	02-High School Diploma or Less	140	\$34,330	0	\$0
51-2023 Electromechanical Equipment Assemblers	02-High School Diploma or Less	750	\$32,380	0	\$0

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Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Health Care Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
00-0000 Total	Total	527,670	\$49,225	2,635	\$55,067
00-0000 Total	02-High School Diploma or Less	145,120	\$27,978	390	\$28,254
00-0000 Total	03-Post Secondary	141,640	\$31,700	794	\$30,556
00-0000 Total	04-Associates	169,750	\$63,817	920	\$55,490
00-0000 Total	05-Bachelors	19,000	\$61,019	116	\$63,041
00-0000 Total	06-Masters	21,000	\$74,505	137	\$69,147
00-0000 Total	07-Doctorate	31,160	\$118,654	278	\$147,326
29-1111 Registered Nurses	04-Associates	120,740	\$67,720	660	\$58,752
31-1012 Nursing Aides, Orderlies, and Attendants	03-Post Secondary	49,610	\$25,140	424	\$27,259
31-1011 Home Health Aides	02-High School Diploma or Less	83,750	\$21,760	145	\$24,536
29-2061 Licensed Practical and Licensed Vocational Nurses	03-Post Secondary	36,920	\$41,360	107	\$39,811
29-2041 Emergency Medical Technicians and Paramedics	03-Post Secondary	12,080	\$33,300	74	\$32,186
31-9091 Dental Assistants	03-Post Secondary	15,400	\$34,140	73	\$31,278
31-9092 Medical Assistants	02-High School Diploma or Less	24,380	\$29,760	71	\$28,572
29-1123 Physical Therapists	06-Masters	10,060	\$77,990	65	\$75,132

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Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Health Care Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
29-1051 Pharmacists	07-Doctorate	13,960	\$109,380	60	\$105,200
29-2052 Pharmacy Technicians	03-Post Secondary	16,630	\$29,330	58	\$31,960
29-1062 Family and General Practitioners	07-Doctorate	0	\$0	55	\$184,661
29-2012 Medical and Clinical Laboratory Technicians	04-Associates	5,510	\$38,190	52	\$28,628
29-2037 Radiologic Technologists and Technicians	04-Associates	9,510	\$55,730	51	\$51,094
29-2021 Dental Hygienists	04-Associates	10,490	\$68,680	50	\$64,237
29-1127 Speech-Language Pathologists	06-Masters	5,230	\$69,880	43	\$62,026
29-9011 Occupational Health and Safety Specialists	05-Bachelors	2,570	\$65,610	39	\$64,110
29-1126 Respiratory Therapists	04-Associates	5,270	\$55,200	38	\$53,118
29-2071 Medical Records and Health Information Technicians	02-High School Diploma or Less	7,370	\$35,010	35	\$34,454
31-9799 Healthcare Support Workers, All Other	02-High School Diploma or Less	6,580	\$31,670	34	\$31,652
29-1069 Physicians and Surgeons, All Other	07-Doctorate	0	\$0	33	\$204,168
31-9094 Medical Transcriptionists	03-Post Secondary	2,020	\$33,530	31	\$30,399
31-9096 Veterinary Asst. and Laboratory Animal Caretakers	02-High School Diploma or Less	2,160	\$23,660	30	\$23,310
29-1122 Occupational Therapists	06-Masters	5,710	\$73,380	29	\$67,511

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Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Health Care Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
29-2011 Medical and Clinical Laboratory Technologists	05-Bachelors	5,210	\$56,870	29	\$56,897
29-1021 Dentists, General	07-Doctorate	6,640	\$158,770	27	\$145,955
29-2056 Veterinary Technologists and Technicians	04-Associates	5,570	\$31,030	27	\$27,129
29-1131 Veterinarians	07-Doctorate	3,420	\$92,570	26	\$67,321
29-1071 Physician Assistants	05-Bachelors	4,060	\$87,140	24	\$97,891
31-2021 Physical Therapist Assistants	04-Associates	4,120	\$49,810	18	\$40,689
31-2022 Physical Therapist Aides	02-High School Diploma or Less	2,760	\$25,000	16	\$23,596
29-2799 Health Technologists and Technicians, All Other	02-High School Diploma or Less	4,040	\$42,240	16	\$37,249
29-2081 Opticians, Dispensing	02-High School Diploma or Less	3,060	\$34,800	15	\$29,381
29-2055 Surgical Technologists	03-Post Secondary	3,390	\$41,310	15	\$39,282
29-1067 Surgeons	07-Doctorate	0	\$0	14	\$242,348
31-9011 Massage Therapists	03-Post Secondary	5,590	\$39,770	13	\$31,502
31-9093 Medical Equipment Preparers	02-High School Diploma or Less	1,620	\$30,350	11	\$29,564
29-2053 Psychiatric Technicians	05-Bachelors	2,460	\$31,520	11	\$29,506
29-1065 Pediatricians, General	07-Doctorate	0	\$0	10	\$137,780

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Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Health Care Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
29-1041 Optometrists	07-Doctorate	2,340	\$106,750	10	\$72,888
29-1011 Chiropractors	07-Doctorate	2,530	\$79,820	9	\$71,229
29-1128 Exercise Physiologists	02-High School Diploma or Less	1,630	\$51,980	7	\$36,863
29-1063 Internists, General	07-Doctorate	0	\$0	7	\$170,323
29-1064 Obstetricians and Gynecologists	07-Doctorate	0	\$0	7	\$158,957
29-9799 Healthcare Practitioners and Technical Workers, All Other	02-High School Diploma or Less	3,280	\$52,580	7	\$43,268
29-1125 Recreational Therapists	05-Bachelors	1,190	\$41,440	7	\$44,205
29-1061 Anesthesiologists	07-Doctorate	0	\$0	6	\$252,578
29-1066 Psychiatrists	07-Doctorate	0	\$0	6	\$206,774
29-2032 Diagnostic Medical Sonographers	04-Associates	3,170	\$64,900	5	\$61,318
29-1124 Radiation Therapists	04-Associates	670	\$78,290	4	\$88,268
29-9012 Occupational Health and Safety Technicians	04-Associates	510	\$47,520	4	\$52,612
29-1199 Health Diagnosing & Treating Practitioners, Other	05-Bachelors	2,120	\$81,830	4	\$50,896
29-1029 Dentists, All Other Specialists	07-Doctorate	320	\$162,190	4	\$104,693
31-2011 Occupational Therapist Assistants	04-Associates	1,680	\$51,300	4	\$47,042

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Projected Annual Openings (2010 to 2020) due to Industry Growth and Replacement Need for Health Care Related Occupations; Nationally and in Wyoming with Average Annual Wage in 2010.

SOC Code & Title	Typical Education	US		Wyoming	
		Annual Openings	Annual Wage	Annual Openings	Annual Wage
29-2054 Respiratory Therapy Technicians	04-Associates	300	\$46,340	3	\$33,114
29-9091 Athletic Trainers	05-Bachelors	1,190	\$44,030	2	\$43,355
29-1023 Orthodontists	07-Doctorate	420	\$200,290	2	\$0
29-2031 Cardiovascular Technologists and Technicians	04-Associates	2,210	\$50,720	2	\$46,438
29-1181 Audiologists	07-Doctorate	560	\$69,840	2	\$61,414
31-2012 Occupational Therapist Aides	02-High School Diploma or Less	360	\$31,090	1	\$28,664
29-1081 Podiatrists	07-Doctorate	510	\$133,410	1	\$135,818
31-9095 Pharmacy Aides	02-High School Diploma or Less	2,230	\$22,830	1	\$25,332
31-1013 Psychiatric Aides	02-High School Diploma or Less	1,900	\$26,710	1	\$31,763
29-2091 Orthotists and Prosthetists	05-Bachelors	200	\$68,930	0	\$0
29-1024 Prosthodontists	07-Doctorate	50	\$139,620	0	\$0
29-1022 Oral and Maxillofacial Surgeons	07-Doctorate	410	\$214,120	0	\$0

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