

Manufacturing Month Toolkit for Educators

Manufacturing Month is hosted in partnership with



Southeast
Service
Cooperative



MINNESOTA STATE
Advanced Manufacturing Center of Excellence



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Future**Forward**TM

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Goals of Manufacturing Month

- Introduce your students to a career in manufacturing without having to conduct hours of research.
- Educate students about modern manufacturing through tours, engaging videos, worksheets, and activities.
- Easily integrate this flexible content into an afternoon, a week, a month, or over your entire school year.
- Get creative and partner with a local manufacturer to create local connections and create student pipeline opportunities.

How to Use This Toolkit

- Work with your local industry partners, your Career-Connected Learning Specialist, or member of the Southeast Service Cooperative team to access multiple Manufacturing Month events that work for your schedule.
- Access this toolkit and other resources to design a customizable Manufacturing Month that aligns with the needs of your school, classroom, and students.
- Access lessons and activities to provide preparatory and follow-up learning for students.
- View the different types of videos (company overview, interview, or tour) and note the various industry categories to best guide your students toward future employers that align with their interests.
- Provide your students the following link (https://bit.ly/2023SEMN_Manu_Student) for a two-minute survey about their manufacturing month experience. Contact Mike Schnell from SSC (mschnell@ssc.coop), or your Career-Connected Learning Specialist, to receive a copy of the results of this survey for your school or classroom.
- View [Next Steps](#) to continue building community-led learning opportunities and deeper student learning beyond Manufacturing Month and continue working with your Career-Connected Learning Specialist and SSC staff member to continue building and creating work-based learning experiences.

Manufacturing Month in Southeast Minnesota

Each fall, Minnesota highlights the manufacturing sector of the economy by celebrating “Minnesota Manufacturing Month”. Held in October, this month is meant to shine a spotlight on the importance of Manufacturing to our state, regional, and local economies. This month also serves to showcase the current state of manufacturing and the myriad of employment opportunities within this sector. One of the best ways to accomplish these goals is through site tours of various manufacturing companies right here in our own backyard in Southeast Minnesota.


In 2017, five communities in Southeastern Minnesota (Blooming Prairie, Caledonia, Red Wing, Rochester, and Stewartville) partnered with local manufacturers to host community site tours. Since 2018, there has been a collective effort to expand the number of tours available and increase student exposure to manufacturing during Manufacturing Month and organizations like Workforce Development, Southeast Service Cooperative, as well as regional colleges and economic development agencies are working together to enhance this event and provide students the best experience possible. One enhancement includes the 2020 addition of virtual tours through [FutureForward™](#), as well as on-site at manufacturers.

[FutureForward™](#) is a free and open-source website that does not require login to take advantage of the information and opportunities available locally. The resource has a helpful calendar of events that is regularly updated ensuring all information is as accurate as possible. Additionally, [FutureForward™](#) allows youth and educators the flexibility to provide self-directed or guided learning in distance, hybrid, or in-person learning formats. This allows for equitable access to more students, and options for career exploration in this highly important industry sector by reducing barriers such as travel. Additionally, the tool eases the burden of communication between partners.

As an educator, you play a critical role for your students in connecting them with information regarding career pathways, and career-connected learning opportunities. This toolkit is designed to give you the information and tools necessary to be a full participant in this year’s Manufacturing Month. Also, this toolkit is designed for you to use the resources you would find valuable to augment your classroom teaching throughout the year.



2023 Manufacturers in FutureForward™

Manufacturer with the  logo have recorded videos in FutureForward™

Business		Address	Type of Manufacturer	Link to FutureForward™ Page
Acrotech, Inc.		980 W Lakewood Ave Lake City, MN 55041	Urethane	https://futureforward.org/search-directory/acrotech-inc/
ALMCO, Inc.		507 W Front St Albert Lea, MN 56007	Finishing Products	https://futureforward.org/search-directory/almco/
Aroplax		200 Chelsea Rd Monticello, MN 55362	Injection Molding	https://futureforward.org/search-directory/aroplax-corporation/
Bowman Tool and Machining		660 37th ST NW Rochester, MN 55901	CNC Machining	https://futureforward.org/search-directory/bowman-tool-machining-inc/
BRON Midwest, Inc.		610 Main Street West Le Roy, MN 55951	Heavy Equipment	https://futureforward.org/search-directory/bron-midwest-inc/
Crenlo		1600 4th Ave NW Rochester, MN 55901	Off-Highway Cabs and Electrical Enclosures	https://futureforward.org/search-directory/crenlo/
Custom Iron, Inc.		400 First Street East Zumbrota, MN 55992	Metal Fabrication	https://futureforward.org/search-directory/custom-iron-inc/
DeZURIK		250 Riverside Avenue North Sartell, MN 56377	Valves	https://futureforward.org/search-directory/dezurik/
Domaille Family of Companies		7100 Dresser Dr NE, Rochester, MN 55906	Electronics	https://futureforward.org/search-directory/domaille-family-of-companies/
Edwards Manufacturing		1107 Sykes Street Albert Lea, MN 56007	Metal Working	https://futureforward.org/search-directory/edwards-manufacturing/
Fastenal		1275 Riverview Dr, Winona, MN 55987	Metal Fabrication	https://futureforward.org/search-directory/fastenal-manufacturing/
Flex Craft		300 Westgate Dr, Houston, MN 55943	Material Handling Solutions	https://futureforward.org/search-directory/flex-craft/
Gemini, Inc.		103 Mensing Way Cannon Falls, MN 55009	Dimensional Logos, Letters, & Plaques	https://futureforward.org/search-directory/gemini-inc/
Geotek		1421 2nd Ave NW, Stewartville, MN 55976	Metal Fabrication	https://futureforward.org/search-directory/geotek/
Grand Casino Hinkley		777 Lady Luck Drive Hinckley, Minnesota 55037	Manufacturing to need	https://futureforward.org/search-directory/grand-casino-hinckley/

Harmony Enterprises, Inc.		704 Main Ave N Harmony, MN 55939	Metal Fabrication	https://futureforward.org/search-directory/harmony-enterprises-inc/
Hearth & Home Technologies		800 W Jefferson St, Lake City, MN 55041	Miscellaneous	https://futureforward.org/search-directory/hearth-home-technologies/
Hormel Foods Corporation		1 Hormel Place, Austin, MN 55912	Food Processing	https://futureforward.org/search-directory/hormel-foods-corporation/
ICS Chillers		1015 Enterprise Ave Milaca, MN 56353	HVAC	https://futureforward.org/search-directory/ics-chillers/
Inland Packaging		2009 West Ave South La Crosse, MN 54601	Packaging	https://futureforward.org/search-directory/inland-packaging/
Innovance		505 W Front St. Albert Lea, MN 56007	Manufacturing Holding Company	https://futureforward.org/search-directory/innovance-inc/
Jimmy's Salad Dressings & Dips		1711 2nd Ave NW Stewartville, MN 55976	Food	https://futureforward.org/search-directory/jimmys-salad-dressings-dips/
LARSON Manufacturing		1501 BETHA LARSON LN ALBERT LEA, MN 56007	Doors and Windows	https://futureforward.org/search-directory/larson-manufacturing/
Lax Fabricating		700 East Main St Spring Grove, MN 55974	Steel	https://futureforward.org/search-directory/lax-fabricating/
Limb Lab		400 S Broadway #106, Rochester, MN 55904	Plastics & Rubber Products	https://futureforward.org/search-directory/limb-lab/
LouRich, Inc.		505 W Front St, Albert Lea, MN 56007	Machinery	https://futureforward.org/search-directory/lou-rich-inc/
Mass Finishing, Inc.		1060 Commerce Blvd Howard Lake, MN 55349	Finishing Machines	https://futureforward.org/search-directory/mass-finishing-inc/
Mayo Clinic Career Exploration		200 1st Street SW Rochester, MN 55905	Medical Devices	https://futureforward.org/search-directory/mayo-clinic-career-awareness/
McNeilus Steel		702 2nd Ave SE, Dodge Center, MN 55927	Primary Metal	https://futureforward.org/search-directory/mcneilus-steel/
McNeilus Truck & Manufacturing		520 Hwy St E, Dodge Center, MN 55927	Fabricated Metal	https://futureforward.org/search-directory/mcneilus-truck-and-manufacturing/
Michael Foods		120 Tower St S Gaylord MN 55334	Egg Products	https://futureforward.org/search-directory/michael-foods/
Miller Ingenuity		1155 E 8th St, Winona, MN 55987	Computer and Electronics Products	https://futureforward.org/search-directory/miller-ingenuity/
Millerbernd Manufacturing		622 6th St S Winsted, MN 55395	Heavy Metal	https://futureforward.org/search-directory/millerbernd-manufacturing-company/

Minnesota Manufactured		1500 Birchmont Dr NE Bemidji, MN 56601	Advanced Manufacturing Center of Excellence	https://futureforward.org/search-directory/minnesota-state-advanced-manufacturing-center-of-exellence/
MRG Tool & Die		1100 Cannon Circle Faribault, MN 55021	Tooling	https://futureforward.org/search-directory/mrg-tool-and-die/
Nova - Tech Engineering LLC.		1705 Engineering Ave NE Willmar, MN 56201	Fabricated Metal	https://futureforward.org/search-directory/nova-tech-engineering-llc/
Panels Plus		507 West Front Street Albert Lea, Minnesota 56007	Wall Panel and Floor Cassette	https://futureforward.org/search-directory/panels-plus/
POET Biorefining		701 Industrial Drive North Preston, MN 55965	Ethanol and Biorefined Products	https://futureforward.org/search-directory/poet-biorefining/
Red Wing Shoe Company		315 Main St, Red Wing, MN 55066	Apparel	https://futureforward.org/search-directory/red-wing-shoe-company/
Riverland Community College		1900 8th Ave NW Austin, MN 55912	Education	https://futureforward.org/search-directory/riverland-community-college/
RiverSide Integrated Solutions, Inc.		1 Riverside Drive Lewiston, MN 55952	Contract Manufacturing	https://futureforward.org/search-directory/riverside-integrated-solutions-inc/
RTP Company		580 E. Front St. Winona, MN 55987	Thermoplastics	https://futureforward.org/search-directory/rtp-company/
SageGlass		2 Sage Way, Faribault, MN 55021	Non Metallic Mineral	https://futureforward.org/search-directory/sageglass/
Spring Grove Soda		215 2nd Avenue NW Spring Grove, MN 55974	Food Products	https://futureforward.org/search-directory/spring-grove-soda/
Stinar Ground Support Equipment		10061 State Highway 30 Blooming Prairie, MN 55917	Aviation	https://futureforward.org/search-directory/stinar-ground-support-equipment/
Tru Vue		2150 Airport Drive Faribault, MN 55021	Glass and Acrylic	https://futureforward.org/search-directory/tru-vue/
Ventura Foods		919 East 14th Street Albert Lea, MN 56007	Food Production	https://futureforward.org/search-directory/ventura-foods/
Viracon		800 Park Dr Owatonna, MN 55060	Architectural Glass	https://futureforward.org/search-directory/viracon/

Minnesota Manufacturing Fact Sheet

Southeast Region

Southeast Minnesota is a health care and agricultural powerhouse. The region is home to the renowned Mayo Clinic and some of the world's most recognized food companies and brands.

Advanced manufacturing is especially strong here, with machinery, chemicals, and electronics among the top products.

Want the freshest data delivered by email? [Subscribe to our regional newsletters.](#)
[View entire list](#)



Manufacturing in Southeast Minnesota

September 15, 2023 | [Amanda O'Connell](#)

The Manufacturing industry in Southeast Minnesota presents many job opportunities for job seekers, with various [in-demand occupations](#) that provide wages that outpace the region's [cost of living](#). In the second quarter of 2022, Southeast Minnesota had [2,432 job vacancies](#) in Manufacturing. That was the second highest number ever recorded, and was nearly double the number of openings posted by manufacturers in 2019, prior to the pandemic.

This surge in job opportunities underscores the growing need for skilled workers in the Manufacturing industry. It presents opportunities for job seekers to embark on or advance their careers in this high-paying sector, promising both personal fulfillment and economic advancement. In addition, 8% of these positions were part-time, 25% required post-secondary education, and 47% sought candidates with at least one year of experience. This means that job seekers with varying levels of education or experience and scheduling flexibility needs can find opportunities immediately, and move up with training.

The Manufacturing sector particularly excels in offering attractive career options, with occupations like Assemblers & Fabricators, First-Line Supervisors of Production & Operating Workers, Production Worker Helpers, Slaughterers & Meat Packers, Cabinetmakers & Bench Carpenters, and Welders, Cutters, Solderers & Brazers, all providing median hourly wages ranging from \$18.69 to \$32.17. The hourly wage needed to sustain a basic needs cost of living was \$16.79 for a typical family (two parents and one child) in Southeast Minnesota, and \$15.25 for a single person without dependents.

With more than 36,000 jobs, Manufacturing is the second largest industry in Southeast Minnesota, accounting for 15% of the region's total employment. In 2022, 662 manufacturing firms provided over \$2.5 billion in total payroll and an annual wage of \$69,368, which is \$8,189 more than the average across all industries (see Table 1).

Table 1. Industry Statistics, Southeast Minnesota, 2022					
NAICS	Industry Title	Number of Establishments	Average Employment (Number of Jobs)	Avg. Annual Wage	Total Payroll
0	Total, All Industries	13,373	239,872	\$61,179	\$14,681,605,177
31	Manufacturing	662	36,059	\$69,368	\$2,501,476,195

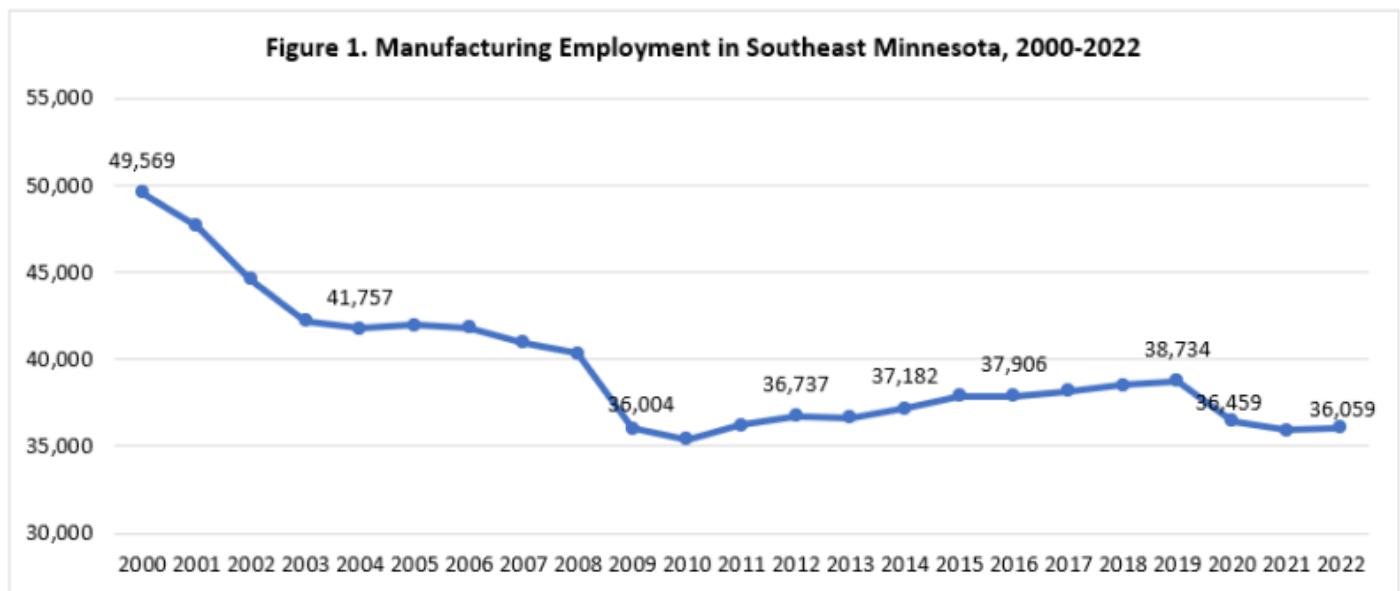
311	Food Manufacturing	105	9,904	\$64,064	\$635,192,937
334	Computer & Electronic Product Manufacturing	28	4,334	\$113,516	\$491,964,118
333	Machinery Manufacturing	70	4,294	\$64,168	\$275,791,909
332	Fabricated Metal Product Manufacturing	115	4,086	\$61,412	\$251,071,762
327	Nonmetallic Mineral Product Manufacturing	46	2,224	\$65,780	\$146,382,520
326	Plastics & Rubber Products Manufacturing	23	1,550	\$54,080	\$83,836,357
339	Miscellaneous Manufacturing	62	1,470	\$54,964	\$80,874,142
337	Furniture & Related Product Manufacturing	44	1,458	\$59,228	\$86,333,561
325	Chemical Manufacturing	25	1,393	\$90,272	\$125,961,008
323	Printing & Related Support Activities	41	1,168	\$52,936	\$61,863,480
314	Textile Product Mills	13	596	\$71,656	\$42,735,293
336	Transportation Equipment Manufacturing	15	558	\$60,372	\$33,682,799
322	Paper Manufacturing	7	508	\$65,676	\$33,346,757

321	Wood Product Manufacturing	26	483	\$48,828	\$23,506,200
331	Primary Metal Manufacturing	11	471	\$65,468	\$30,910,273
335	Electrical Equipment, Appliance Manufacturing	4	322	\$63,388	\$20,320,567
312	Beverage & Tobacco Product Manufacturing	21	179	\$16,120	\$2,906,271
315	Apparel Manufacturing	4	155	\$38,220	\$5,851,491
<i>Source: Quarterly Census of Employment and Wages</i>					

The largest subsectors include Food Manufacturing with 9,904 jobs at 105 firms, Computer & Electronic Product Manufacturing with 4,334 jobs and 28 firms, Machinery Manufacturing with 4,294 jobs and 70 firms, and Fabricated Metal Product Manufacturing with 4,086 jobs with 115 firms. These four subsectors comprise almost two-thirds (62.7%) of total employment in the Manufacturing industry in Southeast Minnesota.

Manufacturing employment in Southeast Minnesota has fluctuated from 2000 to 2022 along with different economic cycles. In 2000, there were about 49,500 jobs in the Manufacturing industry. However, there was a notable drop occurring during the 2001 recession, losing about 8,000 jobs, and then again during the Great Recession in 2008 and 2009, when the region cut about 4,000 manufacturing jobs.

Following those declines was a slow but steady recovery, with employment levels showing some stabilization and brief periods of growth between 2010 and 2019, though jobs remained below the peak back in 2000. In 2020, the COVID-19 Pandemic Recession had a brief but substantial impact, leading to a dip of about 2,500 jobs. There has been a small gain in jobs from 2021 to 2022, though they again remain below the early 2000s and pre-pandemic levels (see Figure 1).



The Manufacturing industry in Southeast Minnesota has experienced fluctuations in employment over the past two decades, with recent challenges due to the COVID-19 pandemic. Nevertheless, Manufacturing remains a vital part of the region's economy, offering competitive wages and promising career opportunities for job seekers.

For More Information

Contact Amanda O'Connell, Labor Market Analyst, at amanda.oconnell@state.mn.us.

Permalink: <http://mn.gov/deed/data/locallook/southeast/southeast-blog.jsp?id=1045-592129>

Next Steps: Business and Industry Tours

A business and industry site tour is a career awareness activity in which students and educators visit a workplace (either in-person or virtually), learn about a business, meet employees, and observe work being done.

Tours are conducted by live-stream, recorded virtually, or in-person at a workplace for individuals or small groups of students. Each should involve preparation in the classroom prior to the in-person or virtual learning opportunity.

Ideally, business and industry site tours include a series of activities to promote deep learning with students.

These activities include:

- Preparatory work in the classroom such as industry overviews, common terminology review, industry sector interest exploration, and research on specific local employers.
- Following the creation of a solid foundation of knowledge, students and educators participate in the virtual or in-person tour where they learn about the “cool stuff” made by employers, career pathways available within the company, benefits of working at the company, and training opportunities to prepare for work at the company.
- These activities are followed by additional work in the classroom after the tour such as self-reflection and follow-up conversations between students and the employer to further explore career pathways for future employment.

This handbook contains information on some suggested activities and additional resources for before and after the site tours to provide deeper learning for students.

Comprehensive planning, thorough preparation, and attention to detail will increase student engagement and also help ensure a smooth working relationship with the business. The following information walks through key considerations as you think about a business and industry site tour.



Next Steps: Education

Counselors and Educators: Determine your target student audience.

Will this be for a single class section? Multiple class sections of the same course? Multiple class sections of the same department? Whole grade levels? Will the students self-select or will the tours be a required activity? Which teachers or counselors will participate?

Students: How students access recorded company videos and tours.

Many employers (identified on pages 4-6 of this toolkit) have opted to incorporate one or more videos for student virtual learning. It is a great idea to view some of these before your on-site tour. These specific employers may also be available for in-person tours. Please connect with your Career-Connected Learning Specialist, or other Southeast Service Cooperative staff, to help get these tours arranged.

Videos include an overview or highlight videos of the company, informational interviews with staff, and/or site visits.

Determine how to implement the site tour into classroom learning.

What pre-tour learning activities will be completed? How long of an event will you structure this as (one-day event, choose your own adventure, or focus on certain employers each day)? What are the student learning expectations during the tour? What post-tour learning activities will be completed ([other than the linked FutureForward™ survey](#))? Use this toolkit and the additional resources at the end of this toolkit to curate a well-rounded and deep learning experience for your students.

Follow-Up

Thank your host businesses.

This is a great opportunity to let the businesses who participated know the impact they have made. Consider having students compose and send thank you letters or emails. View the video below to learn how to contact companies through [FutureForward™](#).

Promote the success of the site tours.

Report out your survey results, pictures, testimonials, or any other takeaways from your students or the host businesses. Consider highlighting the business and industry tours on your own social media platforms using **#ManufacturingMonthSEM2023**, website, at meetings or events, or via the local media. This provides free publicity for the business and showcases your school's active involvement in connecting school and career.

Evaluate the program against the goals and objectives you set.

Use [FutureForward™](#) to schedule follow-up meetings with your student's favorite employers

Appendix A: Additional Resources

1.1. Common Questions Employers Will Answer in Interviews and Site Visits

- What is your name, title, business, and brief history and description of your company?
- What makes this organization unique?
- What is your favorite part of working here?
- Tell us about some different career opportunities offered here.
- Can you tell me about some of the unique technology tools, and equipment your company uses?
- What kind of training or education would you recommend for a student to be successful here?
- What do some entry-level positions look like at your company?
- How does your company invest in employees?
- If a student is interested in getting more information from you, how should they contact you?
- What else would you like students to know about your business or position?

1.2. Helpful Hints for Students

The businesses you will be visiting today are excited to have you learn more about their manufacturing company! This is a great opportunity for you to gain valuable insight into how skills and passion come together to create a successful career.

- Research the places you will be touring prior to the event. This will help you better understand their business and prepare you for the day. Visit their website and conduct a quick search for general information.
- Develop a list of specific and thoughtful questions to ask following the tour – whether about the company or about various career pathways to their current position.
- Consider your own career interests and how they might fit with what you experience on the tour.
- Strive to have a positive outlook and make the most of the tour.
- Whenever possible, say ‘Thank You’ following the event.

1.3 Minnesota State Advanced Manufacturing Center of Excellence

The Minnesota State Advanced Manufacturing Center of Excellence offers great resources to help educators advance education centered around advanced manufacturing in K-12. View the links below to learn more about their supplemental programs, activities, and tools available to support Manufacturing Month.

- [Educator Guide](#)
This guide provides lessons, activities, and videos to introduce middle school and high school students to advanced manufacturing and its many career opportunities. Includes hands-on activities. Access the guide by clicking the following link: [Minnesota Manufactured Teacher Guide - Grades 6-12](#)
- [Online Learning Instruction Content - Secondary Educators](#)

From Career Exploration to Manufacturing Curriculum this page has 28 different resources curated by the Minnesota State Advanced Manufacturing Center of Excellence for you to utilize in your class and to assist your students.

- [Online Learning Resource Center \(OLRC\) for CTE](#)

OLRC is a collaboration between the Minnesota State Career and Technical Education office, the eight Minnesota State Centers of Excellence, and the Minnesota Department of Education.

- [VEX Robotics Resource](#)

Through the Minnesota State Advanced Manufacturing Center of Excellence college partners, VEX Robotics kits are provided at no cost to Minnesota schools and organizations for VEX robotics teams. Faculty at partner colleges host scrimmages and small competitions at their colleges so students and their coaches can prepare for tournaments. They also get to see for themselves how manufacturing relates to robotics and learn about career pathways.

Our college partners also host tournaments, including a state tournament, where students compete for invitations to the World Championship. Industry is invited to participate at these events, including judging and displays.

- [Digital Badge Pathway](#)

Minnesota Manufactured introduces young people to the world of advanced manufacturing through a badge system that recognizes achievement, learning and completion of activities that build an understanding of advanced manufacturing careers. Students who complete the badge pathway are eligible to apply for a Minnesota Manufactured Education scholarship!

- [Manufacturing Career Tool](#)

Potentially interested in a career in manufacturing? Take the quiz and explore the links on the linked page to see if a manufacturing career might be a good fit for you.

Appendix B: Activities & Classroom Supplements

2.1 [LYFT Pathways 3 E's Roadmap](#)

The LYFT Pathways 3 E's Roadmap encourages students to Explore, get Exposed, and Experience careers. The linked workbook allows students to access and take multiple interest assessments, explore their skills and how those skills match up to specific careers, gain exposure virtually (Don't forget about *FutureForward™* for virtual experiences), and experience the career themselves to find out if it is right for them,

2.2 [Manufacturing Quiz](#)

(the following material is from the Minnesota Precision Manufacturing Association – Fall 2016, National Association of Manufacturers 2021, and State of Minnesota DEED)

How much do you know about the very important sector of the state's economy? Take this quiz to find out, then dazzle friends, coworkers, and strangers with your encyclopedic grasp of the facts.

Question 1

In Minnesota, manufacturing represents one in how many jobs?

- A. 7
- B. 13
- C. 27
- D. 33

Question 2

According to the 2021 National Association of Manufacturers Fact sheet, how much did manufacturing contribute to the state economy?

- A. 29.1 billion
- B. 38.9 billion
- C. 52.7 billion
- D. 59.8 billion

Question 3

In 2016, what percentage of private-sector jobs were in manufacturing?

- A. 8.3%
- B. 11.4%
- C. 14.5%
- D. 16.0%

Question 4

In 2020 the average annual compensation of a manufacturing employee was how much?

- A. \$53,508
- B. \$62,794
- C. \$71,748
- D. \$80,900

Question 5

Manufacturing had a direct or indirect impact on how many jobs statewide in 2016?

- A. 36%
- B. 25%
- C. 42%
- D. 56%

Question 6

In 2016, each manufacturing job supported how many other jobs in other segments of the economy?

- A. 1.0
- B. 1.4
- C. 1.7
- D. 3.2

Question 7

In Southeast Minnesota in 2021, how many manufacturing jobs existed?

- A. 32,847
- B. 35,935
- C. 37,679
- D. 39,541

Question 8

In 2016, manufacturing had the _____ payroll of any business sector in the state.

- A. largest
- B. second-largest
- C. third-largest
- D. fourth-largest

Question 9

What is Minnesota's top manufactured export?

- A. Computer and electronic products
- B. Food manufacturing
- C. Optics/medical
- D. Plastics

Question 10

How many Minnesota Fortune 500 companies in 2017 operated in manufacturing?

- A. 12%
- B. 37%
- C. 42%
- D. 59%

Answers: (1) A. 7; (2) C. \$52.7 billion; (3) D. 16%; (4) D. \$80,900; (5) A. 36%; (6) D. 3.2; (7) B. 35,935; (8) B. second-largest; 9. C. Optics/medical; (10) C. 42%

2.2 Deeper Dive into Local Manufacturers Part I (Post Tour)

Select *three companies* you visited, either virtually, or in person, who participated in Manufacturing Month and complete the following chart:

What is the name of the company?	
What does the company make?	
Who do you think their intended consumer is?	
What stands out to you about this company?	
What are some innovative, creative, and/or modern manufacturing characteristics of the company?	
What types of jobs do they have at this company?	
Could you see yourself working at this company? Why or why not?	
What type of training do you need for careers at this company?	

2.3 Deeper Dive into Local Manufacturers Part II (Post Tour)

Pick *four companies* participating in Manufacturing Month and answer the following questions to explore if any of these companies might be a good fit for future employment.

Company	Would you work for this company? Why or why not?

2.4 Colleges & Pathways for Student Next Steps in FutureForward™

You've identified that Manufacturing might be a good fit for your future career. Now you need to understand the training that is needed to get your first entry-level position.

College or Resource	 FutureForward™ Page 	Who can I contact at the college to learn more about these programs?
Academy College	https://futureforward.org/search-directory/career-cluster/education-and-training/	
Alexandria Community & Technical College	https://futureforward.org/search-directory/alexandria-technical-community-college/	
Lake Superior College	https://futureforward.org/search-directory/lake-superior-college/	
Minneapolis College	https://futureforward.org/search-directory/minneapolis-college/	
Minnesota Manufactured - Minnesota Advanced Manufacturing Center of Excellence	https://futureforward.org/search-directory/minnesota-state-advanced-manufacturing-center-of-excellence/	
Minnesota State College Southeast	https://futureforward.org/search-directory/minnesota-state-college-southeast/	
Minnesota State University, Mankato	https://futureforward.org/search-directory/minnesota-state-university-mankato/	
Riverland Community College	https://futureforward.org/search-directory/riverland-community-college/	
Rochester Community & Technical College	https://futureforward.org/search-directory/rochester-community-and-technical-college/	
Saint Mary's University of Minnesota (Winona)	https://futureforward.org/search-directory/saint-marys-university-of-minnesota-winona/	
South Central College	https://futureforward.org/search-directory/south-central-college/	
St. Cloud State University	https://futureforward.org/search-directory/st-cloud-state-university/	
University of Minnesota - Duluth	https://futureforward.org/search-directory/university-of-minnesota-duluth/	
University of Minnesota Rochester	https://futureforward.org/search-directory/university-of-minnesota-rochester/	

Winona State University	https://futureforward.org/search-directory/winona-state-university/	
Winona State University - Rochester	https://futureforward.org/search-directory/winona-state-university-rochester/	

2.4 [DEED Career Pathways Tool](#)

[DEED's Career Pathways tool](#) connects occupational data from DEED's Labor Market Information office with educational programming from the [Minnesota Department of Education](#) and the [Minnesota State Career Wheel](#), displaying career fields, clusters, and pathways. The primary goal of this dashboard is to help students understand how their educational path matches employment opportunities and to inform education curriculum, initiatives, and programming to labor market realities. The tool is designed to help start career exploration with students, parents, and counselors. The "Resources" tab at the top also provides contact information for [DEED's Regional Analysis and Outreach Unit](#).

2.5 [Getting Creative with Advertising](#)

Create an advertisement for the company (could be video, print, social media, etc.). If a student shared their advertisement with the company or shared out on the school's social media, include this with the Thank You note.

2.6 [A Show of Gratitude](#)

Have students record their Thank You's to employers for participating in Manufacturing Month and send them to SSC. SSC will send the link out to all of our employers so they know how appreciative they are for making these great learning experiences available to our students.

2.7 [MCIS Support](#)

The Minnesota Career Information System (MCIS) is a comprehensive online career exploration system that operates as a small non-profit. MCIS offers career, educational and labor market information in one, easy-to-use tool. MCIS includes: career interest, employability skill and learning style [self-surveys](#); information on colleges and programs of study; short term-training, apprenticeship and employment resources. Students use their MCIS portfolio to plan and view progress toward goals and create a [Personal Learning Plan \(PLP\)](#) ([Minnesota Statutes, section 120B.125](#)).

2.8 [Map It](#)

Before the students do a tour, they could draw their own map of what they envision the plant to look like. It could help prompt a conversation with the employers about what the plant looks like, the machines and technology used to create these products and help students think about logistical flow from raw materials to the final product.