

WORKFORCE DEVELOPMENT

The Manufacturing Institute | BY CAROLYN LEE



ALL-OF-THE-ABOVE HIRING



Are you prepared for a job seekers' market that will last a decade or longer? Chances are that you know all too well that it's getting harder to find qualified applicants to fill open positions. Perhaps you've had some job listings open for months. And—in worst-case scenarios—you may have had to turn down business opportunities because you don't have the talent needed to act on them.

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If you're facing any of these predicaments, you're not alone. But where will we find the people our industry needs? To attract and retain millions of next-generation manufacturing team members and solve some of our workforce challenges, manufacturers need to practice all-of-the-above hiring.

There have been around 800,000 or more open manufacturing jobs in each of the past 10 months, an obvious sign that workforce difficulties are widespread across the industry. In survey after survey, manufacturers are telling us that hiring and retaining qualified employees is becoming increasingly difficult. And, the demand isn't going to subside: a study conducted by The Manufacturing Institute (where I serve as president) and Deloitte shows that the industry will need to fill more than 4 million jobs by 2030 as current employees retire and companies continue growing.

There are a few main reasons that it's getting harder for manufacturers to hire and retain the people we need. We're contending with unfavorable demographic shifts, ongoing perception problems and the skills gap.

Our workforce is aging faster than other industries. A report the MI conducted with the Alfred P. Sloan Foundation a few years ago found that the median age of manufacturing employees is around 44 years old, compared with 42 years old for the general workforce population. One-quarter of manufacturers estimate that 30–39% of their employees are over the age of 55. Another study, which we conducted last year alongside the AARP, found that 5% of our existing workforce is already beyond retirement age—and an additional 20% will reach retirement age before 2030.

Although there are certainly many advantages to multigenerational teams, as one of the MI's recent reports found, looming waves of mass retirement will cause major complications. In 2020, 3.2 million more baby boomers retired than in 2019, and we can expect these retirements to further accelerate.

Meanwhile, the perception problem is complicating our efforts to replace retiring boomers with millennial and Gen Z recruits. Young people often don't have much exposure to the

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facts about careers in the manufacturing industry, but their parents tend to have outdated ideas of what those careers are about—and they convey those ideas to their children. Although there's been considerable progress in recent years owing to ongoing efforts to showcase the exciting reality of modern manufacturing, we still have to keep changing people's perceptions.

Finally, there's the skills gap. Traditional education in the U.S., whether it's high school or four-year college, hasn't developed the kind of talent pipelines with the right technical know-how or certifications. Manufacturing jobs are increasingly high-tech, and we need team members with STEM backgrounds to fill those positions—but schools in this country aren't imparting STEM education at the scale we're seeing in other developed countries.

For these challenges and more, all-of-the-above hiring is our solution. Simply put, manufacturers need to use every arrow in their quiver. That includes broadening outreach and recruitment, taking steps to change the narrative and improve awareness of the reality of modern manufacturing and devoting resources to training and upskilling programs.

Let's start with a focus on diversity and inclusion in hiring and retention, which is the right thing for any company to do, and is also justified by a strong business case. In our 2021 study with Deloitte, 63% of the manufacturers we surveyed viewed their D&I efforts as critical to their ability to attract, retain and develop talent. In a study we conducted with Keybridge Public Policy Economics, nearly two-thirds of those companies saw D&I as essential to being considered an employer of choice. Younger generations are more likely to work at companies that uphold these values.

And making inroads into our country's tremendous diversity is crucial for identifying new talent, as there is so much untapped potential for our industry in traditionally underrepresented demographic groups.

For example, manufacturers can close the skills gap by 50% simply by bringing 10% more women into the industry. That's because women account for about half of the U.S. labor force but represent less than one-third of the manufacturing workforce.



We can welcome more women into manufacturing by providing role models, mentors and examples of women succeeding in the industry, to show others that it's possible. The MI's STEP Women's Initiative is one such approach; in a nutshell, it empowers and uplifts women in manufacturing, highlighting their success and their accomplishments and giving them a platform to pay it forward. The initiative creates a support system for women in the industry, showing them that manufacturing is not "a man's world" and that it's possible—and not at all rare—for women to rise to the top in our industry. And we have ambitious goals: on International Women's Day this March, we announced our "35x30" campaign—a new multifaceted effort to increase the percentage of women in the industry to 35% by 2030.

We also see tremendous value in reaching out to veterans and the greater military community. Their service imparts them with a winning combination of leadership skills, experiencing working as part of a team, discipline and technical certifications. The MI's Heroes MAKE America initiative builds connections between the military community and manufacturers, providing integrated certification programs and career-readiness training on five bases and through a virtual program—as well as valuable networking opportunities.

Here's another shocking statistic—approximately one-in-four Americans has a criminal record, which makes it much harder for them to find career opportunities. That's why the MI and Stand Together Trust provide resources and best practices for companies looking to expand second chance hiring. It's a win-

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"The Manufacturing Institute's mission is to inspire, educate, and empower the next generation of manufacturing teams."



win situation: Employees hired through a second chance approach tend to be more engaged, potentially leading to higher retention rates and lower turnover costs.

Those are just some steps that can help manufacturers develop new talent pipelines, but what about the perception problem? Every manufacturing company and its employees need to be ambassadors for the industry. We must provide living examples to counter and change outdated perceptions.

In other words, we need to make sure that young people and their parents perceive our industry as modern manufacturing. If your company makes use of advanced technology, such as 3D printing, augmented reality, digital twins, drones, cloud computing, and other sophisticated advances, show them off. Take steps to feature and promote the unconventional career opportunities on your teams and the ways new employees can harness their creativity.

For just one example of how that's done, I recommend checking out the MI and the NAM's Creators Wanted campaign—see creatorswanted.org. The campaign includes stories featuring manufacturing team members. Then there's MFG Day, an annual opportunity for manufacturers to open their doors virtually or in person to showcase a day in the life at their factories and plants. We're also very excited about the Creators Wanted Tour Live, which gives communities opportunities to meet and learn from local manufacturing teams, along with a first-of-its-kind interactive mobile experience where young people can discover the problem-solving skills that power manufacturing jobs.

We also must provide every tool available to enhance and expand the educational opportunities available to the burgeoning workforce. Manufacturers can't expect to be passive beneficiaries of traditional education institutions—instead, we must get directly

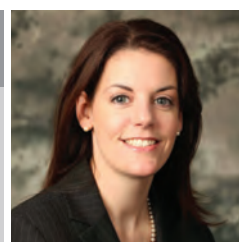
involved in providing training, developing curricula and helping people learn on the job and develop a manufacturing mindset.

To do that, manufacturers have to work with institutions to prioritize lifelong learning and valuable skills, rather than just degrees. Technical and vocational schools or reskilling programs hold great promise and already contribute immensely to the manufacturing talent pipeline. Apprenticeships, which utilize earn-and-learn models, are especially important ways for us to develop talent and impart skills.

One such example is the Federation for Advanced Manufacturing Education, or FAME. Created by Toyota and now operated by the MI, the FAME model places students on the shop floor three days a week and in the classroom on the other days. This is great for companies and for students, who graduate with an associate degree and no college debt. This is a winning model for attracting young people, who are increasingly worried about the cost of education. Crucially, apprenticeships like FAME also put a focus on developing the kind of professional skills these students might not typically learn in college, such as resume-building, interview preparation, teamwork, communication and punctuality, to name a few. These are essential skills that we prize in the industry.

Those are just some components of a healthy all-of-the-above approach to ongoing manufacturing workforce challenges. Every business should think about these approaches, because there just isn't going to be a sudden realignment that transforms this job seekers' market into an employers' market. The MI's mission—and the mission of anyone concerned about the workforce development space—is to inspire, educate, and empower the next generation of manufacturing teams. These are the principles behind solving hiring challenges, and the principles that will deliver us the workforce of the future.

Carolyn Lee is the president of The Manufacturing Institute, the workforce development and education partner of the National Association of Manufacturers.





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